SUPPORTING DOCUMENT FOR THE HISTORICAL TANK CONTENT ESTIMATE FOR

B TANK FARM

WORK ORDER ER4945

Prepared for

Westinghouse Hanford Company

June 1994

Prepared by

ICF Kaiser Hanford Company
Richland, Washington

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7. Abstract

This Supporting Document provides historical in-depth characterization information gathered on B-Tank Farm, such as historical waste transfer and level data, tank physical information, temperature data, sampling data, and drywell and liquid observation well data for Historical Tank Content Estimate Report of the NE Quadrant at the Hanford 200 East Areas.

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Prepared by

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1.0 Introduction

1.1 Purpose

This document provides historical evaluations of the radioactive mixed wastes stored in the Hanford Site 200-East Area underground single-shell tanks (SSTs). A Historical Tank Content Estimate has been developed by reviewing the process histories, waste transfer data, and available physical and chemical characterization data from various Department of Energy (DOE) and Department of Defense (DOD) contractors.

The historical data will supplement information gathered from in-tank core sampling activities that are currently underway. A tank history review that is accompanied by current characterization data creates a complete and reliable inventory estimate. Additionally, historical review of the tanks may reveal anomalies or unusual contents that are critical to characterization and post characterization activities. Complete and accurate tank waste characterizations are critical first steps for DOE and Westinghouse Hanford Company safety programs, waste pretreatment, and waste retrieval activities.

1.2 Scope

The scope of this document is limited to the SSTs in the B Tank Farm of the northeast quadrant of the 200 East Area. For summarized characterization data on all SST's in the northeast quadrant, refer to the Historical Tank Content Estimate Report (Brevick 1994). The northeast and southeast quadrants represent an approximate geographical division of the 200-East Area tank farms. The division was made as follows:

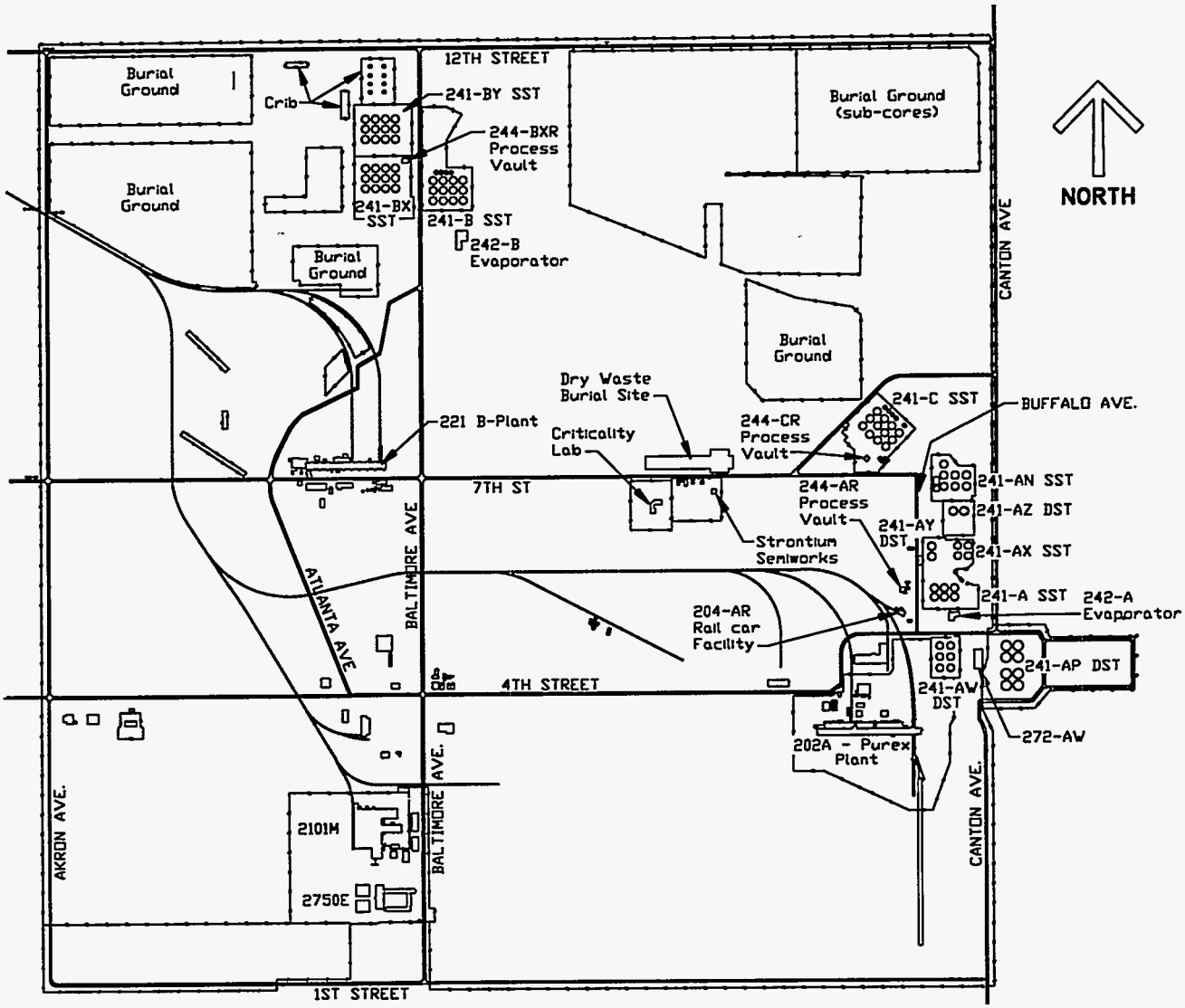
- NE Quadrant: A, AX, B, BX, BY, C
- SE Quadrant: AN, AZ, AP, AW, AY, SY

The following map depicts the 200-East Area.

1.3 Approach

This report is a compilation of work performed by ICF Kaiser Hanford Company, Los Alamos National Laboratories, and Westinghouse Hanford Company.

Westinghouse Hanford Company requested that ICF Kaiser Hanford Company review the history of the tanks in each of the four quadrants and incorporate the tank layering models and inventory estimates being developed by Los Alamos National Laboratories into the report. Historical waste transfer and level data, tank physical information, temperature data, sampling data, and drywell and liquid observation well data have been compiled for this report.



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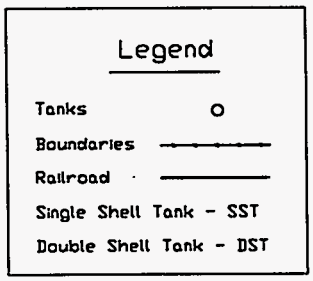


1.3.1 Surveillance Techniques for the Hanford Radioactive Mixed Waste Storage Tanks

Surveillance information is used for tank characterization. Tank integrity (i.e., sound, assumed leaker, assumed re-leaker) is investigated by comparing the changing liquid levels to liquid observation well data and drywell activity. Waste temperatures can be used to correlate the inventories of heat-generating radionuclides (^{137}Cs and ^{91}Sr) in the tanks. The instrumentation and methods used for tank surveillance are described in the following sections.

- **In-Tank Surface Levels**

Surface levels within the SSTs are monitored by instruments consisting of calibrated steel tapes with an electrode plummet on the end that will complete a circuit when it contacts a conducting surface (i.e., liquid). The surface level measurements are usually taken with Food Instrument Corporation gauges and manual tapes. The tank monitoring device, manufactured by the Food Instrument Corporation, automatically moves up and down and contacts the waste. The gauge is often set to the intrusion mode by placing the plummet a short distance above the waste. If an intrusion occurs in the tank, the Food Instrument Corporation gauge will record the event when the surface level rises to meet the plummet. The manual tapes are similar to the Food Instrument Corporation gauge, except that manual operation of the tape and manual recording of the readings are required. Some tanks contain both types of level monitoring devices. The measurements are recorded on a computer automated surveillance system (CASS).

- **Interstitial Liquid Level (Liquid Observation Wells)**

Food Insturment Corporation gauges and manual tapes are limited to surface level measurement; therefore, liquid observation wells in many tanks have been installed specifically to monitor the interstitial liquid level within the SSTs. The interstitial liquid is the liquid trapped within and underneath the solid waste. Fiberglass or TEFZEL-reinforced epoxy-polyester resin liquid observation well tubes (by E.I. du Pont de Numours and Company) are sealed on the bottom and vertically installed approximately 1 in. from the tank bottom. Gamma, neutron, and acoustic probes may be lowered into the liquid observation wells to determine the interstitial liquid levels within the tank. A gamma probe detects the difference between saltcake and saltcake containing liquid, based on the principle that the liquid is the primary source of gamma emissions. A neutron probe distinguishes between the existing dry saltcake, wet saltcake, and liquid phases. Distinct differences exist in the neutron count rates of each material type. An acoustic probe emits a pulse that is reflected off the interface between the outer wall of the liquid observation well and the waste. A fiberglass/liquid interface produces a minimal reflected pulse and a fiberglass/air interface produces a maximum pulse reflection. Wet saltcake will fall between the limits appropriately; therefore, interpretation of the records will determine the liquid level. Each probe scan is fully automatic and

successful scans are input to the computer automated surveillance system.

- **Internal Tank Temperatures (Thermocouples)**

Temperatures usually are recorded automatically in the Computer Automated Surveillance System (CASS). Temperatures are monitored with thermocouple trees that are comprised of stainless steel pipe with 4 to 18 thermocouples. Usually, the lowest sensor is located approximately 4 in. from the tank bottom and the other sensors progress up the tree at 2-ft intervals. More frequent temperature readings are available for a few select tanks due to an upgrade in the surveillance data acquisition system to the tank monitor and control system (TMACS) in 1991.

Generally, a single thermocouple sensor is sent down the liquid observation well to take semiannual readings in tanks that do not contain a thermocouple tree. The temperatures are recorded manually in degrees Fahrenheit and are entered into the surveillance analysis computer system (SACS) that is currently using the ORACLE database.

- **External Leak Detection (Drywells)**

Drywells are located around the circumference of each SST and throughout the tank farms to determine if tank wastes have leaked. The drywells are generally 6-in. diameter carbon steel pipe, between 75- and 250-ft deep. The wells are termed dry because they are not deep enough to reach ground water. Scan profiles of radiation or moisture in the soil as a function of well depth are obtained with gamma radiation or neutron sensors. Scintillation monitors, Geiger-Mueller instruments, and neutron sensors are used to monitor the drywells. Scintillation monitors are radiation detection instruments based on the principle that light pulses are produced in some materials when they are exposed to radiation. Geiger-Mueller instruments detect low-level beta and gamma radiation. Neutron probes are equipped with a neutron source and detector that determine if moisture is present in the soil. The frequency of and probe used for drywell monitoring are specified in a schedule from the "Waste Storage Tank Status and Leak Detection Criteria" (Welty 1989).

Drywell readings are recorded at 1-ft intervals. The peak readings and the depth of the readings are recorded on a summary sheet. If a drywell indicates a new or unusual increase in activity, a rerun is requested and the drywell is retested. The wells are sealed when they are not being tested.

The drywells described in this report have a 6-digit computer identification number: the first two digits denote the tank farm (i.e., A=10, AX=11, B=20, BX=21, BY=22, and C=30), the third and fourth are the last two digits of the tank number (i.e., 241-A-105 would be 10-05 and 00 indicates a non-specific tank), and the fifth and sixth describe the clockwise location of the well from due north. For example, the identification number of the first drywell for Tank 241-BY-102 would be 22-02-01.

Laterals (i.e., horizontal drywells) are positioned under some SSTs to detect radionuclides in the soil which could be indicative of tank leakage. The drywells are monitored by radiation detection probes and occasionally by a temperature probe. Laterals have 4-in. inside diameter steel pipes located 8 to 10 ft below the concrete base of the tank, and each tank has three laterals. Laterals are located only in the A Tank Farm and a portion of the SX Tank Farm.

- **In-Tank Photography**

In-tank photography is another waste volume determination method used to resolve in-tank measurement anomalies and determine tank integrity. Photographs can help determine sludge and liquid levels, provide a degree of corroboration with other waste management processes, and are a source of information on foreign objects contained in the tanks. The photos can be compared to see if tank wastes with similar histories have similar characteristics.

1.3.2 Approach and Development of Supporting Information Contained in the Historical Tank Content Estimate and Supporting Documents

Extensive information was gathered for each tank. This document contains a comprehensive data set on each tank, that are summarized in the Historical Tank Characterization Estimates.

- **Tank Level Histories**

The tank level histories are graphical representations of waste levels over the lifetime of a tank. They include information such as pH, in-tank photo dates, waste types, transfer data, and physical data. Information from the mid 1940s to 1980 was compiled from two Westinghouse Hanford Company documents (Anderson 1990 and Welty 1988). Data from 1977 to the present were obtained from the monthly waste status summary reports. The following Hanford Site operating contractors prepared summaries: Atlantic Richfield Hanford Company from 1973 to 1977, Rockwell Hanford Operations from 1977 to 1987, and Westinghouse Hanford Company from 1987 to present. Script files were imported from a spreadsheet to AutoCAD 12 to graph the surface level data. Liquid observation well data were obtained from the Westinghouse Hanford Company Tank Farm Surveillance group in a spreadsheet format. Additional information was gathered from various documents and comments were added directly to each drawing.

The liquid, solid, and interstitial liquid levels (liquid observation wells data) are shown on the tank level history graphs as volumes and tank elevations. The following formulas were used to relate the volumes to the respective elevation for each tank farm design:

FORMULAS

$$\frac{\textit{Total Gallons}}{2750\ \frac{\textit{Gallons}}{\textit{Inch}}} = \textit{Total Inches} \tag{1}$$

$$\frac{\textit{Total Gallons} - 12{,}500\ \textit{Gallons}}{2750\ \frac{\textit{Gallons}}{\textit{Inch}}} + 12\ \textit{Inches} = \textit{Total Inches} \tag{2}$$

$$\frac{\textit{Total Gallons} - 12{,}500\ \textit{Gallons}}{2750\ \frac{\textit{Gallons}}{\textit{Inch}}} = \textit{Total Inches} \tag{3}$$

$$\frac{\textit{Total Gallons} - 18{,}500\ \textit{Gallons}}{2750\ \frac{\textit{Gallons}}{\textit{Inch}}} + 12\ \textit{Inches} = \textit{Total Inches} \tag{4}$$

$$\frac{\textit{Total Gallons} - 590\ \textit{Gallons}}{196\ \frac{\textit{Gallons}}{\textit{Inch}}} + 6\ \textit{Inches} = \textit{Total Inches} \tag{5}$$

Equation No.	Applicable Tank Farms:	Tank Diameter
1	A, AN, AP, AW, AX, AY, AZ, SY	75 ft
2	BY, S, TX, TY	75 ft
3	B, BX, C, T, U	75 ft
4	SX	75 ft
5	B, C, T, U (200 Series)	20 ft

- **Temperature Plots**

There are two categories of temperature data, one or few temperature readings per day and thermocouple temperature data. The documentation used for the first category includes Waste Status Summary Reports (Roberts, R.E. 2/58 - 10/58, Thress, M.A. 11/58 - 2/59, Lentz, J.E. 3/59-12/60, and Roberts, R.E. 6/61 - 6/62), RHO-CD-1172, and HW-83906. The thermocouple temperature data were obtained from the Westinghouse Hanford Company ORACLE database commonly known as the Surveillance Analysis Computer System (SACS) and various retrieved hand-entered temperature data sheets. Temperature versus time plots were developed for both categories of temperature data. Historical temperature plots cover the time span between January 1957 and January 1973. The common temperature span used for these plots is 350 degrees. There are no tanks that have temperature data outside the sliding 350 degree temperature range.

No thermocouple information has been located prior to 1973. The thermocouple temperature information was parsed in an EXCEL spreadsheet and graphed to show each individual thermocouple probe. January of 1973 is then the starting date for all thermocouple plots. The temperature range for all tank thermocouple plots in all tank farms was kept to a 120 degree F span, except where the data exceeded this range. In the few tanks where the temperature span exceeds this sliding range the data are shown using the smallest temperature range possible. A consistent time frame and temperature range is essential in comparing temperature information from one tank to another. If documentation was available, thermocouple elevations were included in the plots for tanks currently containing thermocouple trees. Thermocouples are ordered from the bottom to the top of the tank. Therefore, a plot of thermocouple 1 over time would indicate the temperature near the bottom of the tank. In-tank temperature information is available in Appendix D.

- **Surface Level Plots**

The surface level data from 1991 to 1993 were obtained from the Westinghouse Hanford Company ORACLE database. The information was parsed in an EXCEL spreadsheet and graphed to show the waste level versus time. Current in-tank surface level information is available in Appendix E.

- **Drywell Plots**

The drywell information was obtained from the manual records of the Westinghouse Hanford Company Tank Farm Surveillance Group. Data from 1990 to the present were input into an EXCEL spreadsheet and graphed to show the peaks in counts/second (c/s) and the peak depths in feet (ft) versus the date on the same chart. Tank drywell information is available in Appendix F.

- **Tank Profiles and Other Drawings**

The drawings included in this report have been compiled from several sources including as-built drawings, the Waste Storage Tank Status and Leak Detection Criteria (Welty 1988), and the Riser Configuration Document for Single-Shell Waste Tanks (Alstad 1991).

The risers and penetrations throughout the tank dome are used for many purposes. Some risers were installed during the original tank construction and others were added later.

Through the years, sleeves or smaller risers were installed in many of the larger risers. For the riser configurations in this report, a tank may have a riser number followed by a letter which means that a larger riser was fitted with smaller sleeves. Depending on the intended use, the riser sleeves can be as large as 12 in. or as small as 4 in. For example, a saltwell pump and screen require a 12-in. riser but a thermocouple tree requires only a 4-in. riser. The tank profile drawings are in Appendix K.

- **Photographs**

The tank farm photos were labeled to indicate the relative position of each tank in the farm and arrows were added to show the cascade series of each tank farm.

The latest in-tank and tank farm photos were obtained from Pacific Northwest Laboratory. In-tank photos have been arranged to show the contents of each tank. The auxiliary equipment within each photo collage was identified if possible and labeled appropriately. The latest in-tank and tank farm photos are available in Appendix I.

- **Historical Sample Analysis Data**

The sampling data were obtained from the WHC Tank Waste and Retrieval Group. Tables were made for the samples that were taken prior to September 1989. The information was compiled in EXCEL to present the data in as similar a manner as possible. The tables include physical data, chemical analysis data by component, and radiological analysis data by component. Any other data included with the sample references are summarized as text. Tank historical sample analysis data are available in Appendix H.

1.3.3 Approach and Development of the Process-Based Historical Tank Content Estimate

The process-based historical tank content estimates presented in this report were taken from work being performed by Los Alamos National Laboratories. The tank content estimates are the primary source of tank characterization data until the tank characterization reports are completed. The tank characterization reports will incorporate current core sampling and analysis results with historical-based tank content estimates to present the most current evaluation of the tank waste constituents.

Generating historical tank content estimates involves management and evaluation of large quantities of data. Several smaller components of the data management effort make up the system of generating historical tank estimates. The components are described in the following sections.

- **Waste Status and Transaction Record Summary Database**

The waste status and transaction record summary database (i.e., transaction summary) is a database of all known waste transfer records. Historically, when waste was pumped from a process plant to tank or tank to tank, a record of the pumped waste volume and type was kept. The transaction summary is the recorded waste level of the solids and supernatant.

The waste status and transaction record summary database is being partitioned into four separate sections (i.e., quadrants). The waste status and transaction record summary database for the northeast quadrant is available in WHC-SD-WM-TI-615 Rev. 0 (Agnew 1994).

- **Tank Layering Model**

The tank layering model is derived from the waste status and transaction record summary database. The purpose of the tank layering model is to predict the waste types and volumes in each tank. The transaction summary database records the types of waste that enter each tank and the corresponding increase in the solids volume from each waste entry. Each waste type that increases the solids volume in the tank is recorded in the tank layering model. Therefore, the completeness and accuracy of the information in the tank layering model is directly related to the completeness and accuracy of the transaction summary database.

The tank layering model was created to develop historical tank content estimates. The results of the tank layering model are reported in this document. The tank layering model is presented graphically with the inventory estimate described below in Appendix K.

- **Defined Waste Types**

Early in the development of the historical tank content estimates, a need to compile the chemical compositions of all known waste types into one source document was recognized. This compilation was performed by Los Alamos National Laboratories. The Hanford defined waste document was developed independently of the waste status and transaction record summaries database and the tank layering model. However, the Hanford defined waste list will be used with the tank layering model to obtain the actual tank waste inventory estimates as described below.

The Hanford defined waste document gives the compositions for all known Hanford waste types that went into the double-shell and single-shell tanks. For more details of the methods used to develop these waste types, refer to the Hanford Defined Wastes Document (Agnew 1994).

- **Inventory Estimates**

The end result of combining the tank layer model and the Hanford defined waste types is the tank inventory estimate. When the volumes and compositions of each waste type in a particular tank are known from the tank layering model and the Hanford defined

wastes document, a calculation of the total chemical inventory in the tank is performed. The individual tank results are presented in tabular form in Appendix K.

The inventory estimates developed by Los Alamos National Laboratory are quality checked against existing data from current sample analyses, thermal and physical models, and historical records. The checking constitutes a large portion of the time required to develop the estimates. When estimates are checked against existing data, the models used may be reevaluated. Thus, the process of generating estimates will iterate and the associated errors will be reduced over time as the historical knowledge of the tank waste operations increases.

1.3.4 Assumptions

The quality of the historical information available for the tanks often requires that assumptions and judgement calls be made on the applicability and validity of the data. Some assumptions were used to interpret the data.

- **Temperature Data**

The lines joining the data points on the temperature plots were detached to show gaps in data of more than three years.

The single thermocouple tree in some tanks was removed and replaced with two trees. The original single thermocouple tree and tree 1 data were plotted on the same graph, and the tree 2 data were graphed separately.

No conclusion has been made on the status of thermocouples with less than 5 data points. In general, when there is thermocouple data with less than 5 data points, the data are retained on the temperature data sheets, but have not been plotted. Some possible explanations for the limited data are that the thermocouple failed, it was inoperable when readings were taken, or the operator misrepresented the number of thermocouples and the temperature data in the tank.

The thermocouples used in the trees were installed as purchased. There were no field calibrations before 1991. In 1991, a survey of Ferrocyanide Watch List thermocouple trees was conducted. The thermocouple tree probe temperatures were tested against probes inserted in liquid observation wells or by other methods as specified in Engineering Evaluation of Thermocouples in FeCN Watchlist Tanks, (Bussell 1992). Thermocouples, with equipment that could be repaired outside the tank, were made operable at this time.

It is assumed that the sinusoidal variances in the data can be attributed to seasonal and diurnal trends which are clear after 1991 due to an upgrade in thermocouple surveillance to a computerized data acquisition system, i.e., Tank Monitor and

Control System (TMACS). Also, in general, the temperatures decrease from the bottom to the top of the tanks.

All the temperature data received by ICF Kaiser Hanford Company was reviewed for suspect data points. Data that obviously deviate from the temperature trend for a any tank are marked as suspect and designated in the comment column as either "suspect data (low)" or "suspect data (high)". Typically, suspect data sharply deviates from the data trend 15 degrees F or more (See historical and thermocouple temperature data in Appendix D - Temperature Graphs and Data).

After review of the data, it was determined that some data was recorded in degrees Celsius rather than in degrees Fahrenheit as it was electronically received. The data are converted to Fahrenheit and evaluated against the rest of the data set. Where the converted data are found to be consistent with the temperature trend, they are designated in the comment column as "raw data - assumed degree C". Other delineations used to flag suspect data or substantiate the degree Celsius conversions are found from the Tank Waste Information Network System (TWINS) database, property of Battelle - Pacific Northwest Laboratory. Data recorded in degree C or input incorrectly and confirmed with TWINS are delineated in the comments column as: "degree C/TWINS confirm" and "wrong input/TWINS confirm", respectively (See historical and thermocouple temperature data in Appendix D - Temperature Graphs and Data).

In addition, some of the lines of data were flagged in the comment column by Westinghouse Hanford Company (WHC) before transmission of the data. Some of the WHC comment flags include "cass" or "SET#2 FROM CASS". It is assumed that "cass", an acronym for Computer Automated Surveillance System, applies to all the data taken on that particular day, and that "SET#2 FROM CASS" applies to the contiguous data designated under the TREE SET # column as 2 (See historical and thermocouple temperature data in Appendix D - Temperature Graphs and Data).

Sources of temperature data are located in the footnotes of both the temperature plots and data. Some Historical Temperature plots use data from Waste Status Summary Reports (Roberts, R.E. 2/58 - 10/58, Thress, M.A. 11/58 - 2/59, Lentz, J.E. 3/59-12/60, and Roberts, R.E. 6/61 - 6/62). If these reports are used, footnotes on the temperature plots indicate by including the source of data concisely as from "Waste Status Summary Reports" (See historical temperature plots in Appendix D - Temperature Graphs and Data).

- **Drywell Data**

The drywell data did not appear to have had a quality review; therefore, the following assumptions were made about the data:

-A data point is considered suspect if an apparent rerun has been performed.

-A data point is considered to be a rerun if the preceding data are erratic and the rerun is performed on the same day if monitored daily, within one or two days if monitored weekly, or within several days if monitored monthly or yearly.

-If suspect data were indeed relevant, the appropriate surveillance organizations would have followed the appropriate procedures to identify any problems.

- **Sampling Data**

The data obtained from the historical analytical information are understood to be widely variable in type, quality, and scope. The data range from process control data obtained from a grab sample on a few selected analytes to a total characterization suite performed on a core sample. There are no specific quantitative data quality criteria for the information incorporated into the historical tank content estimate. A qualitative assessment of the information sources is done during construction of the historical tank content estimate. The available data are assessed for suitability and consistency in the study and each data source is weighted appropriately for its contribution to the overall estimates.

When the sampling data were compiled, a sample was considered a solids sample if it was greater than 30% solids. Sludge/slurry samples were included.

- **Inventory Estimates**

Solid waste formations vary by type and are determined individually by examination of the historical fill records. Further refinement and bounding of the solids formation are provided by conformation to physically attainable systems (e.g., waste volumes contained in the tanks do not exceed the tank capacity and negative void fractions are not possible).

Waste stream compositions were based on process flow sheet information and previous analytical data.

Solids were evenly distributed throughout tank. The solids were assumed to be evenly distributed throughout the slurry during their transfer and their settling rate was assumed to be uniform throughout the tank.

Complete settling of the sludge occurred and the solids settled in a pseudo-pancake formation (i.e., flat layers conforming to the boundaries of the tank) which was a simplifying assumption. Localized mounding and pocketing in various areas of the tank may have occurred due to inlet/outlet phenomena (e.g., cascades and transfers from the floating suction pumps that remove or deposit sludge). This phenomenon would have affected only a small fraction of the tank area and does not impact the overall results of this study. However, spatial variability within physical configuration and process history is acknowledged. No method is currently available that would adequately model this discrepancy. An effort

is underway to develop this concept and incorporate it into the tank characterization process, but it is incomplete at this time.

Solids from a specifically designated waste type are homogeneous, which is a simplifying assumption. Variation and layering of the sludge due to component concentration differences between batches, precipitate particle size, and particle density were quite likely. The effect of these factors on the distribution of analytes within the solids is unknown; however, the effect was probably small and not detectable with the present sample collection and analysis process.

Solids compaction did not occur and was not accounted for in the study which is a simplifying assumption. Although compaction probably occurred in the history of the tanks because of the formation of additional solids layers on top of each other, the degree of compression was not known and, therefore, was not incorporated.

Density and other physical characteristics of the solids were determined by individual waste type using available information or were based on approximate physical analogues.

The capacity of the tanks was never exceeded during transfers. Tank capacity is dependent on fill status, fill order, tank location in a cascade, and tank type.

Leaking of the tanks was not incorporated during the time of the study but was accounted for at the end.

Cascades, tank transfers, and crib line effluents were normally free of particulate; therefore, the majority of solids were confined to their initial receiver tanks and were not cribbed or transferred extensively from tank to tank. This assumption based on cases of plugged cascade lines when appreciable amounts of solids tried to cascade, and the pumping equipment typically was not designed to transfer of substantial quantities of solids (except when sluicing or specifically transferring solids). Monitors on the crib discharge lines should have indicated significant solids contamination, and the tank farm operating procedures would have prevented solids discharges to the ground.

1.4 Historical Information Quality

The quality of historical data compiled for this report varied greatly. Some data came from published documentation. Other data were retrieved electronically from various Westinghouse Hanford Company databases. The quality of data used in the estimates is described in the following section.

- **Level Histories**

The level history narrative is designed to give a general description of the waste types contained in a specific tank from startup to the present. The history presents physical

characteristics of the waste such as waste pH values and the latest maximum temperature of the waste. It also presents information on when the tank was removed from service, if it was stabilized, the method of stabilization, if it ever leaked, and the current stabilization status. It is not designed to be a detailed summary of every waste type and transaction for that tank. The waste types are general and usually are given only for large transactions (i.e., if a waste is not of sufficient volume to significantly impact the total volume of the tank then it was not reported in the narrative). For a more complete record of transactions and types of wastes involved, see the waste status and transaction record summary (Agnew 1994).

The accuracy of the tank level histories relies on the completeness of the Westinghouse Hanford Company document "A History of the 200 Area Tank Farms" (Anderson 1990); the monthly Westinghouse Hanford Company, Atlantic Richfield Hanford Company, and Rockwell Hanford Operations waste summary reports; and the waste status and transaction record summary (Agnew 1994).

Surface level readings may be affected by several factors: plummet error, flushing water accumulation, and waste surface irregularities. Crystalline wastes (i.e., saltcake) can build up on the end of the plummet gradually and contact the waste which indicates a false surface level increase. Significant level discrepancies occur when the buildup breaks off or when the measuring instrument plummet is flushed to remove the saltcake buildups. Flushing the Food Instrument Corporation Gauge, manual tapes, or any other equipment may cause accumulated wash water to collect under the plummet which indicates a false increase in the overall volume of waste within the tank. Surface level readings often are difficult to obtain from tanks that have a relatively dry saltcake surface. Some tanks have crystalline buildup on in-tank equipment (i.e., pumps, thermocouples, liquid observation wells, and other protruding equipment). As the supernatant is pumped from the tanks, the crystalline structure may remain attached to the equipment and be suspended above the liquid. Therefore, an accurate surface level measurement would be difficult if the breakup of the crystalline structure was inconsistent and a nonuniform waste surface was created. Steel tapes that are bent or warped from operation or those discarded on the waste surface are other sources of altered surface level readings.

Routine measurements of solids and sludges in most SSTs were not reported in the Anderson document until 1965. The solids measurements are taken with a steel donut on a string and operators interpret the sludge level. The interpretation could introduce a wide range of variability in the recorded solids level. Sometimes estimates taken from photographic data and saltwell pumping activities are the only indications of the solids levels.

- **Liquid Observation Well Data**

The liquid observation well data were obtained electronically from the Westinghouse Hanford Company Surveillance Group. Some

discrepancies exist in the liquid observation well readings for tanks with liquid waste surfaces. The discrepancies were supposed to be addressed in a December 1993 rebaselining of the liquid observation well data. Agreement between the liquid observation well plots and the data obtained from the surveillance group has been verified; however, errors in the data prior to the exchange of information could still exist. The liquid observation well data were understood to be unverified prior to the exchange. Therefore, the data should be reviewed before being used for any design purposes or safety evaluations.

- **Temperature Readings**

The single-shell tank temperature profiles are provided by electronic data from Westinghouse Hanford Company. Agreement between the thermocouple plots and the data obtained from the surveillance group has been verified; however, errors in the data prior to the exchange of information could still exist. Thermocouples used in the thermocouple trees were purchased and installed according to the American Society of Testing and Materials (ASTM) standard. There were no field calibrations before 1991 when a survey of Ferrocyanide Watch List thermocouple trees was conducted and a few of the thermocouple trees were compared against a thermocouple probe inserted in a liquid observation well.

During a review of the plots, some thermocouples were found to have outlying data points and many of them have only one or two readings. The unusual readings may be the result of the thermocouples functioning on only one occasion, the operator misrepresenting the number of thermocouples in the tank, unnecessary thermocouples readings, or possible thermocouple failure.

Occasionally the operator would read the temperature in degrees celsius instead of degrees fahrenheit and would not indicate this on the data sheets. The thermocouple data were understood to be unverified prior to the exchange. An attempt has been made by ICF Kaiser Hanford to validate and verify the data, however, the data should be checked before being used for any design purposes or safety evaluations.

- **Surface Level Data**

The surveillance automated computer system data were obtained electronically from the Westinghouse Hanford Company Surveillance Group and were plotted. The data are actual surface levels recorded from the surveillance equipment. If the surveillance equipment in a particular tank riser was removed from service, the readings may show a level change when a new instrument and/or riser is used, especially if the waste surface shows severe heterogeneity.

Agreement between the plots and the data obtained from the surveillance group has been verified; however, errors in the data prior to the exchange of information could still exist. The surveillance automated computer system data were understood to be

unverified prior to the exchange. Therefore, the data should be reviewed before being used for any design purposes or safety evaluations.

- **Drywell Data**

The drywell information is received on data sheets for each drywell. If the readings are questionable, Westinghouse Hanford Company often will request a rerun of the drywell scan. Because the reruns are not indicated on the data sheets, it can be difficult to determine if the data sheet has been superseded. In some wells, several scans occurred on the same day with no explanation; therefore, the scan with the accepted results is not identifiable.

- **Riser Configuration**

The riser configuration was determined from the WHC Riser Configuration Document for Single-Shell Waste Tanks (Alstad 1991). The information was current as of June 1991; therefore, any changes made after that date would not be included.

- **Photographs**

The photo collages were made from the latest available in-tank photographs. In some tanks, photos have not been taken since the early 1970s. Some tanks had fogging problems in the vapor space which prevented use of the latest photos. Sometimes a review of the older photos was useful to determine the waste changes. Collages made from older photos may not be indicative of current tank contents, especially if the tank has been pumped since the last photo date.

- **Historical Sample Analysis Data**

The historical sample results only refer to sample and analysis information obtained before August 1989. The historical sample and analysis results have not been validated by the characterization program. When validation occurs, they will be reissued in a later revision of the Historical Tank Content Estimate report and supporting documentation. The sample data often were retrieved from memos that indicated the results of the sample analysis. The analytical methods, holding times, and quality control information are unavailable. The location at which the sample was taken was not provided which leads to integration of some uncertainty into the sampling results. The analytical scope performed in many cases was quite narrow which limited the available data set. However, the data set is the only available historical chemical characterization information.

1.5 Background NE Quadrant

The SSTs located on the Hanford Site near Richland, Washington were built between 1943 and 1964 to provide interim storage for high-level nuclear wastes. Processes such as plutonium separation from spent nuclear fuel and uranium metal recovery generated the millions of gallons of mixed radioactive hazardous waste solutions stored within these tanks.

Several waste tanks are on watch lists. The definition of a watch list tank is explained in a later section of this report. Wastes stored in the NE quadrant were generated mostly from Plutonium Uranium Extraction (PUREX) and a Bismuth Phosphate Plant (B Plant); however, some tanks in the quadrant received wastes from the other onsite separation processes. The separation processes went through many changes as new technologies became available. Liquid waste volumes were reduced by evaporators, in-tank solidification units, or chemical precipitation of radionuclides. The resulting supernatant was disposed of in the ground. Vaults were used for temporary storage or treatment of waste and they were the intermediate storage point for tank waste or waste awaiting further processing. A special rail car facility in the NE quadrant was used to unload onsite waste that was distributed to an evaporator, tanks, or processing facilities. The facilities were sources of the waste that exists in the SSTs of the NE quadrant.

1.5.1 Waste Generating Processes

Although not all of the processes listed below contributed waste directly to tanks in the NE quadrant, the waste they generated could have been indirectly transferred to the quadrant through tank to tank transfers. The plants and processes that generated waste now contained in the SSTs and the DSTs are presented in chronological order.

- **T Plant**

T Plant was the first-full scale separations plant at Hanford. It was constructed in 1944 and was used as a separation facility for irradiated production reactor fuel until 1956. The bismuth phosphate separation process used at T Plant was identical to the one used at B Plant. Since 1957, T Plant has been used as a decontamination and repair facility. The facility was modified in 1978 for storage of pressurized water reactor (PWR) core II fuel assemblies. T Plant provided facilities for decontamination, decomposition, repair, testing, shipping, and burial of contaminated tools and equipment from onsite and offsite locations.

The following wastes were sent to SSTs: waste solution from equipment decontamination efforts at T Plant, decontamination waste (DW), metal waste (MW) from the bismuth phosphate process, first-cycle (1C) decontamination waste from the bismuth phosphate process, and second-cycle (2C) decontamination waste from the bismuth phosphate process.

- **B Plant**

B Plant was constructed between August 1943 and February 1945. The bismuth phosphate process ran until 1952. One of the first plants built along with T Plant, B Plant was designed to separate plutonium from uranium and the bulk of fission products in irradiated fuel via the bismuth phosphate separation process. In 1968, B Plant became a waste fractionation plant and was retrofitted to remove cesium 137 and strontium 90 from PUREX acid

waste, high-level supernatant liquids, and sludge from self-boiling liquid wastes.

B Plant contained 40 processing cells that served several functions (e.g. equipment storage, radionuclide purification, liquid waste concentration, and solvent extraction). Cells 5, 23, 24 and 25 were used as liquid waste concentrators for the B Plant processing. Cell 23 of B Plant was used as a waste concentrator from July 28, 1967 to February 2, 1968. Because B Plant was being upgraded to a waste fractionation plant, the Cell 23 concentrator was running specifically to concentrate intermediate level waste in the single-shell tanks.

In 1974, the Waste Encapsulation and Storage Facility (WESF) was added to B plant to encapsulate strontium and cesium that was recovered from the B Plant process. The cesium capsules were leased commercially for irradiation of food, medical supplies, and lumber. The strontium and cesium capsules are stored in water basins for future retrieval. Currently most of B Plant is going through closure except for the plant sections that are needed to support the WESF mission. The closures result from a 1991 evaluation of the future B Plant mission.

The following B Plant waste streams were sent to SSTs: B Plant high-level waste (B), B Plant flush (BFSH), low-level waste from the waste fractionation plant (BL), complex concentrate (CC) or (CCPL), complexed waste (CPLX), fission products waste (FP), metal waste (MW), REDOX ion exchange waste processed at B Plant (RIX), ion exchange (IX), strontium sludge (SRS), cell 5 tank 6 waste (5-6), first-cycle waste (1C), and second-cycle waste (2C).

- **Bismuth Phosphate Process**

The B and T Plants used a bismuth phosphate extraction to remove plutonium from uranium fuel elements. The extraction waste that resulted was a metal waste that still contained 90% of the fission products and 99% of the original uranium. The metal waste was sent to specific tank cascades in the 200-East and 200-West Areas. First-cycle decontamination waste (1C), which contained approximately 10% of the fission products, was also stored in other underground waste tanks in the 200 Areas.

- **Plutonium Finishing Plant**

The Plutonium Finishing Plant (PFP or Z Plant), previously called Plutonium Recovery and Finishing Operations, began operation in late 1949 to process plutonium and prepare plutonium products. PFP operations included plutonium handling, plutonium reclamation, plutonium conversion, and decontamination and decommissioning.

Waste from this plant contained minor amounts of fission products and low concentrations of plutonium and other transuranic elements, but was high in metallic nitrates. Initially, the waste was discharged via cribs to soil columns, which absorbed the transuranic elements and retained them close to the point of

discharge. Later waste from Z plant was stored along with other waste in underground tanks.

The following waste was sent to tanks: waste from the Plutonium Reclamation Facility and the remote mechanical C line (Z).

- **Uranium Oxide Plant**

The 224-U Building was completed in 1944 as part of the U Plant complex. The building was converted to a UO_3 plant in 1951. The 224-UA building was constructed in 1957 with six installed calciners. The UO_3 plant was able to handle the uranyl nitrate hexahydrate (UNH) stream from REDOX, U Plant, and PUREX. The UO_3 plant shut down in 1972 and restarted in 1984 with the feed lines from REDOX and the U Plant canyon disconnected. Since 1984, there have been 17 campaigns at the plant that averaged 8 days each. The plant can calcine UNH much faster than the PUREX plant can produce it. Final deactivation was ordered for the plants in 1992. In April 1993, the UO_3 plant resumed operations to convert 200,000 gal of remaining UNH to uranium oxide powder. A final deactivation plan for the facility was prepared in the summer of 1993 and will be carried out in the next few years.

In the basic UO_3 process, calcining consisted of concentrating and heating liquid UNH until it was converted to a stable orange-yellow powder. The nitric acid in the UNH solution was also recovered in the same process. The UO_3 powder was the base material needed to manufacture uranium hexaflouride (UF_6) which is the primary feed material for gaseous diffusion plants in the United States.

- **REDOX**

The Reduction and Oxidation extraction (REDOX) plant was built between May 1950 and August 1951 and operated until July 1967. Uranium and plutonium were extracted from solid uranium metal slugs that were irradiated in the Hanford reactors or piles into a methyl isobutyl ketone (hexone) solvent by a continuous solvent extraction process. The REDOX process was the first at Hanford to recover both plutonium and uranium.

The waste stream which was slightly acidic contained fission products and large quantities of aluminum nitrate that were used to promote the extraction of plutonium and uranium. The waste was then neutralized and stored in SSTs.

The following wastes were sent to SSTs: REDOX process waste resulting from the dissolution of aluminum and zircaloy fuel element cladding, REDOX coating waste (CWR), REDOX high-level waste (R), and the supernatant liquid portion of waste generated by the REDOX process, REDOX supernatant (RSN). RSN is found above the sludge in the underground storage tanks.

- **U Plant**

U Plant (221-U) was built as one of three original bismuth phosphate process facilities although it was not used for that purpose. U Plant was modified extensively and used for the uranium recovery process. U Plant operated from 1952 to 1958. The main canyon at U Plant currently stores failed equipment.

Uranium in waste from the $BiPO_4$ process initially was stored in the SSTs. Later it was mined by sluicing, dissolved in nitric acid, and processed through a solvent extraction process. For every gallon of metal waste originally stored, the uranium extraction process yielded approximately 1.4 gal of UR waste. The waste volume increase made development of a technology that would reduce the volume of the stored waste a priority. This need resulted in the development/implementation of the ferrocyanide scavenging process.

The waste sent to the SSTs from U Plant was called tributyl phosphate (TBP). In reality it contained very little TBP; therefore, to eliminate confusion, it will be referred to as uranium recovery (UR) waste in this report.

- **Strontium Semiworks**

The strontium or hot semiworks processing facility (i.e., C Plant) was built in 1949 as a hot pilot plant for the REDOX process, but was later converted to a pilot plant for the PUREX process. In 1960, the plant was reactivated and used later as a process demonstration for the conversion of B Plant to a waste fractionation facility and was used to recover strontium 90, promethium 147, and cesium 144 from PUREX waste. The building and building site have been decontaminated and decommissioned.

The strontium semiworks waste sent to SSTs was known as hot semiworks (HS), strontium semiworks (SSW), and fission products waste (FP).

- **PUREX**

The Plutonium Uranium Extraction (PUREX) plant (i.e., A Plant) was an advanced solvent extraction process that used tributyl phosphate in a paraffin hydrocarbon solvent to recover uranium and plutonium from nitric acid solutions of irradiated uranium. PUREX was built between April 1953 and April 1955, it operated until 1972 when it was closed for 11 years. Two thorium campaigns were conducted in the PUREX plant between 1966 and 1971. The irradiated waste was similar to the PUREX waste but it contained thorium and uranium 233 rather than uranium and plutonium which was extracted from typical PUREX waste. It began operating again in November 1983 and was shut down in 1988 after a safety violation. The PUREX Plant was shut down several times between 1988 and 1990 for various reasons. In October 1990, the PUREX Plant was put in standby mode and was eventually identified for closure in December 1992 by Secretary of Energy James Watkins.

The following PUREX waste streams were sent to SSTs: cladding waste (CW) or (CWP), organic solvent wash waste (OWW), neutralized PUREX plant acid waste (P), low-level waste from PUREX (PL), PUREX sludge supernatant liquid (PSS), organic wash waste using sodium carbonate (CARB), cesium feed (CF), and concentrated neutralized high-level waste (1WW).

1.5.2 Waste Management Operations

This section describes the different waste concentrating methods used in the 200 Areas. Evaporating, concentrating, and scavenging are all methods used to reduce liquid volumes or precipitate solids out of the supernatant solutions. The operations are presented in chronological order.

- **242-T Evaporator**

The 242-T Evaporator was built in the early 1950s to reclaim nonboiling waste storage capacity in existing tanks. The evaporator was shut down in the summer of 1955 and modified for tributyl phosphate scavenging, although scavenging was never performed in this evaporator. The 242-T Evaporator restarted in 1965 and operated until 1976. Tank 241-TX-118 was the feed tank for thE evaporator.

The following wastes were sent to tanks from the 242 T Evaporator: Slurry product from the evaporator bottoms (EB), evaporator feed (EF), and terminal liquor (TL).

- **242-B Evaporator**

The 242-B Evaporator was built south of the B Tank Farm and started operating in December 1951. It received feed waste until November 1954 and was shut down in September 1955. The evaporator was never reactivated. Tanks 241-B-105 and -106 were used as the bottoms and feed tank respectively. The evaporator operated at atmospheric pressure.

- **Ferrocyanide Scavenging**

Ferrocyanide scavenging was developed to reduce waste volumes. The ferrocyanide flow sheet was first tested in U Plant in October 1953. In-farm scavenging was completed in March 1956 and December 1957 for the 200-West and 200-East Areas respectively. The ferrocyanide scavenging program was designed to remove fission products such as ^{137}Cs (half life: 28.6 yr) and ^{90}Sr (half life: 30.2 yr) from the UR and 1C wastes as a precipitate. Because the ^{90}Sr was essentially insoluble in the neutralized UR waste, the strontium compounds would precipitate as phosphates, sulfates, or hydrated oxides when the acidic waste was neutralized. However, common cesium compounds are quite soluble even at alkaline pHs. Development of the nickel ferrocyanide scavenging process provided a relatively simple process to precipitate ^{137}Cs and enhance the precipitation of ^{90}Sr. The precipitating chemicals were added in stainless steel process vessels with agitation (i.e. U Plant, T Plant, or the CR vault) and the waste slurry was routed

to specific SSTs for settling. After the ^{137}Cs and ^{90}Sr precipitates settled, the clarified supernatant was sampled and disposed of in cribs. After the ^{137}Cs and ^{90}Sr precipitates settled, the clarified supernatant was sampled and disposed of in cribs.

- **In-Tank Solidification**

The primary function of the in-tank solidification systems was to concentrate the nonboiling waste directly inside of specially designed tanks that would produced a saltcake slurry. Each in-tank solidification system included a heat exchanger for water evaporation and a series of bottoms tanks. The first in-tank solidification unit (ITS #1) operated with an airlift circulator through Tank 241-BY-102 and the second in-tank solidification unit (ITS #2) operated with a similar circulator through Tank 241-BY-112. Tank 241-BY-112 contained a 4,000 kW electric immersion heater. Tank 241-BY-101 contained an in-tank solidification prototype that was used only for demonstration purposes. In-tank solidification units 1 and 2 began operating in 1965 and 1968, respectively. In 1971 in-tank solidification unit 1 became the cooler for in-tank solidification unit 2. Both units were shut down in 1974.

- **REDOX Concentrator**

The REDOX concentrator was used for volume reduction of dilute 200-West Area tank farm wastes by removing water. The concentrator received tank farm wastes from July 28, 1967 until June 30, 1972. Cell D in the REDOX process was the concentration and neutralization section of the plant.

- **242-S Evaporator/Crystallizer**

The 242-S Evaporator/Crystallizer began operating in November 1973 and shut down in 1981. It was designed as a reduced pressure (i.e., partial vacuum) evaporator/crystallizer. Aqueous salt wastes were converted in the evaporator to salt crystals for storage in underground tanks in the S and SX Tank Farms.

The following waste types were sent to SSTs from the 242-S Evaporator: non-complexed waste concentrated until the solution was nearly saturated with sodium aluminate known as double-shell slurry feed (DSSF), slurry product from the evaporator bottoms (EB), evaporator feed (EF), Hanford defense residual liquor (HDRL), partial neutralized feed waste (PNF), and terminal liquor (TL).

- **242-A Evaporator/Crystallizer**

Construction of the 242-A Evaporator/Crystallizer was completed in 1976. The evaporator began operation in March 1977 with a design life of 10 years. In 1987, design changes were developed to extend the facilities operating life by 10 years. The evaporator was shut down in April 1989 because of regulatory issues and restarted in May 1994 after extensive modifications.

The following evaporated wastes were sent to SSTs: evaporator bottoms from B Plant low-level waste feed (BLEB), non-complexed waste concentrated in evaporators known as double-shell slurry feed

(DSSF), evaporator feed (EF) or (EVAP), evaporator bottoms (EB), and terminal liquor (TL).

1.5.3 Miscellaneous Waste Sources and Equipment

There are various other sources of waste on the Hanford Site, as well as other material added to the tanks. Some wastes are from the 300 Area, 100 Area production reactors, various laboratories, and catch tanks. Unique contents added to SSTs included laboratory wastes, diatomaceous earth, Portland cement, shroud tubes, ceramic balls, experimental fuel elements, and relatively small amounts of enriched uranium, plutonium, cobalt, and natural uranium.

The following wastes contribute to SST waste: diatomaceous earth (DE), Hanford defense residual liquor (HDRL), Hanford laboratory operations (HLO), filtered Hanford water (H_2O), phosphate decontamination waste from N reactor (N), and non-complexed waste (NCPL).

- **Critical Mass Lab**

The critical mass lab was used to develop data on the factors that are necessary to make a criticality or self-sustained nuclear reaction occur. Because plutonium is the key radioactive element on the Hanford Site, the research was based on plutonium criticality safety in various fuel cycles. This facility was located next to the strontium semiworks and ran from the early 1950s to the early 1980s. The plutonium used in the lab was reprocessed in PUREX.

- **244-AR,-BXR, and-CR Process Vaults**

There are three process vaults in the NE quadrant: the AR Vault, the BXR Vault, and the CR Vault. The vaults were composed of several process vessels or tanks used to prepare the waste for treatment or storage. Specific wastes from tanks can be pumped temporarily to the vaults and the wastes can be sent directly to desired tanks or processing facilities later.

The AR Vault was designed and constructed between 1964 and 1968 and is located next to the A and AX Tank Farms. The AR Vault has been in standby mode since 1978.

The 244-BXR Vault is located south of the 241-BX Tank Farm and was constructed between 1950 and 1951. The BXR Vault began operating in 1952 and became inactive in 1956. The waste in the vault was difficult to handle, so the vault was high-pressure steam jetted in 1976. The vault was interim isolated after 1976 and interim stabilized in March 1985. Tank BXR-004 was removed in 1963.

The CR Vault was constructed in 1952 and is located next to the C Tank Farm. Saltwell waste from the C Tank Farm is interim stored in the CR Vault. The 244-BXR and -CR Vaults were constructed to aid in the recovery of uranium from bismuth

phosphate metal waste. The CR Vault received waste from the Strontium Semiworks Plant en route to the 241-C Tank Farm.

- **204-AR and 204-S Railroad Car Facilities**

The 204-AR rail car unloading facility was built in 1981 and replaced the 204-S rail car unloading facility. The facilities were built for unloading radioactive liquid waste tank cars.

Liquids or slurries from the 1314-N Building in the 100 Area and the 340 Building in the 300 Area are unloaded at the 204-AR unloading facility.

1.5.4 Timeline

The following timeline represents the times and spans of different events that occurred during the lifetime of major Hanford plants in the 200-East and 200-West Areas. The plants were the main contributors of waste currently contained in SSTs. The following list of abbreviations and corresponding meanings are used on the timeline:

PUREX: Plutonium uranium extraction process

UO_3: Uranium trioxide

PFP: Plutonium finishing plant

RG-RB: Rubber glove - remote button line

RMA: Remote mechanical "A" line

RSE: Recuplex solvent extraction

RMC: Remote mechanical "C" line

PRF: Plutonium reclamation facility

PCB: Polychlorinated biphynels

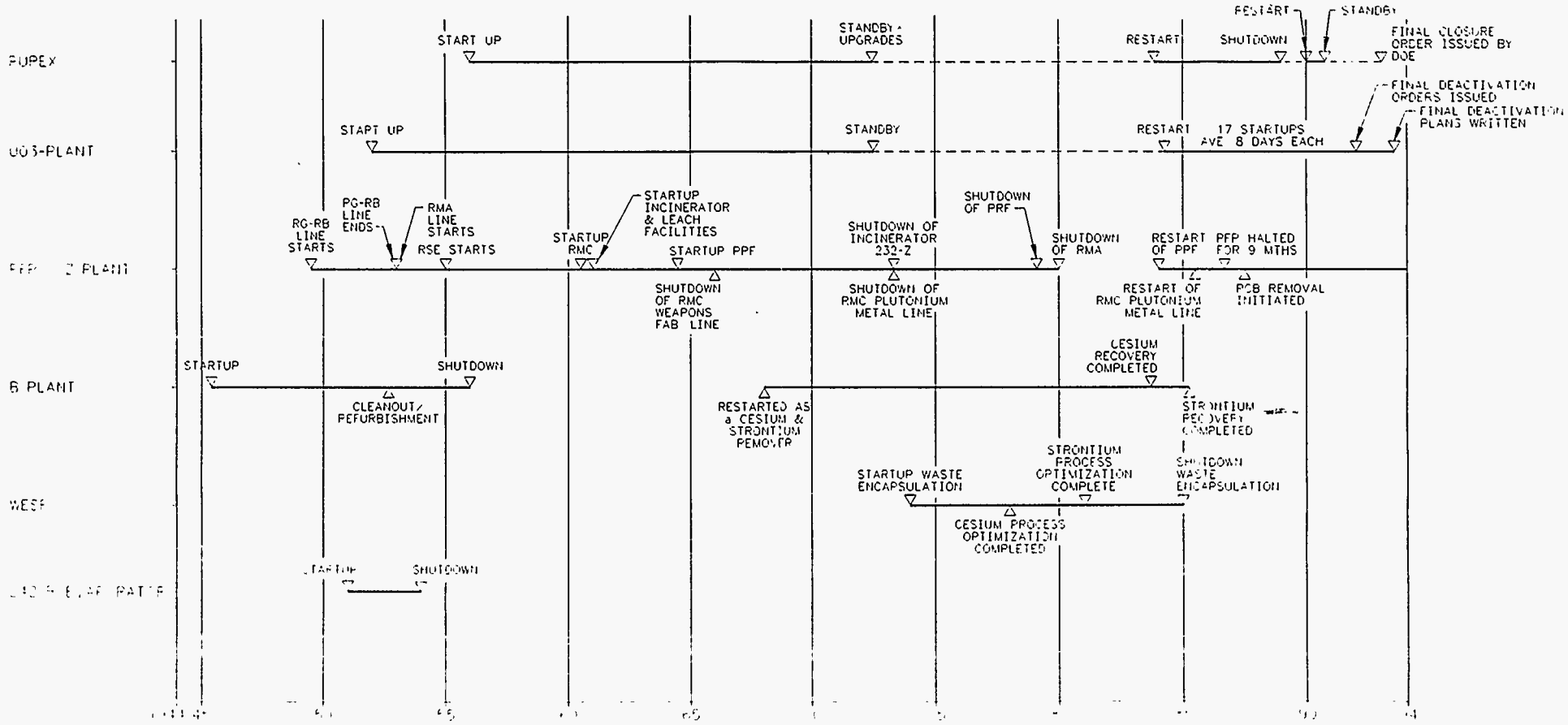
WESF: Waste encapsulation and storage facility

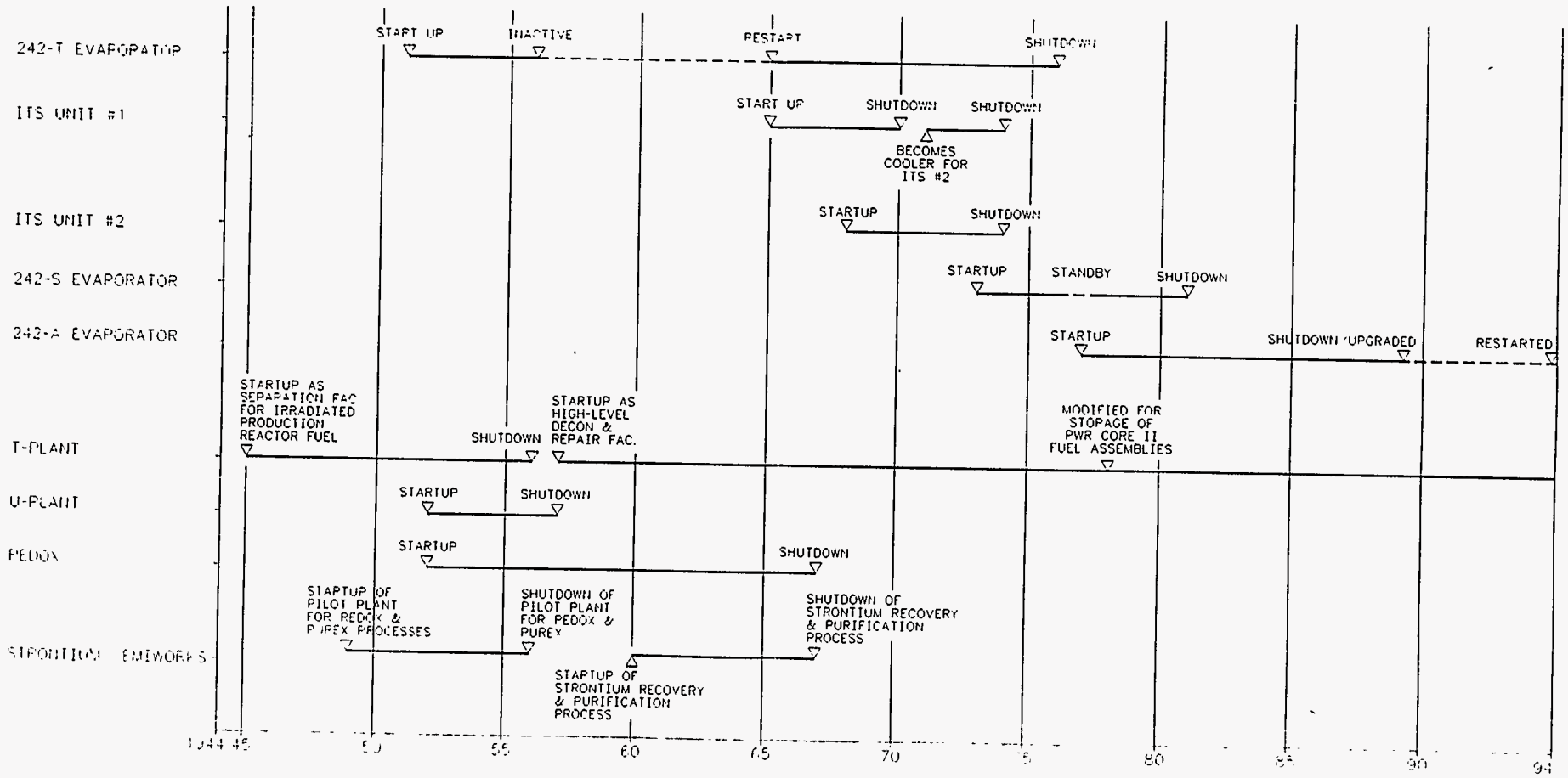
ITS: In-tank solidification (units 1 and 2)

PWR: Pressurized water reactor

REDOX: Reduction oxidation process

PROCESSES PRODUCING WASTE CONTAINED IN 200 AREA TANK FARMS




242-T EVAPORATOR
START UP
INACTIVE
RESTART
SHUTDOWN
ITS UNIT #1
START UP
SHUTDOWN
SHUTDOWN
BECOMES COOLER FOR ITS #2
ITS UNIT #2
STARTUP
SHUTDOWN
242-S EVAPORATOR
STARTUP
STANDBY
SHUTDOWN
242-A EVAPORATOR
STARTUP
SHUTDOWN UPGRADED
RESTARTED
T-PLANT
STARTUP AS SEPARATION FAC FOR IRRADIATED PRODUCTION REACTOR FUEL
SHUTDOWN
STARTUP AS HIGH-LEVEL DECON & REPAIR FAC.
MODIFIED FOR STORAGE OF PWR CORE II FUEL ASSEMBLIES
U-PLANT
STARTUP
SHUTDOWN
REDOX
STARTUP
SHUTDOWN
STRONTIUM RECOVERY
STARTUP OF PILOT PLANT FOR REDOX & PUREX PROCESSES
SHUTDOWN OF PILOT PLANT FOR REDOX & PUREX
SHUTDOWN OF STRONTIUM RECOVERY & PURIFICATION PROCESS
STARTUP OF STRONTIUM RECOVERY & PURIFICATION PROCESS
1944 45
50
55
60
65
70
75
80
85
90
94

1.6 Safety Issues

The safety issues that effect the tanks can be divided into two groups: watch list and non-watch list. The watch lists are listings of the tanks believed to pose potential safety hazards to the environment and the public. Non-watch list issues are of concern because they may impact the environment.

1.6.1 Watch List Safety Issues

Issues in these tanks were identified as "issues/situations that contain most necessary conditions that could lead to worker (onsite) or offsite radiation exposure through an uncontrolled release of fission products" under Public Law 101-510 , Section 3137, of the National Defense Authorization Act of Fiscal Year 1991 (i.e., the Wyden Amendment). As of October 1993, 45 SSTs and 6 double-shell tanks are on a watch list. In the NE quadrant, 21 of the 66 SSTs are on a watch list. The four watch list designations described in this report are: ferrocyanide, hydrogen/flammable gas, organic salts, and high-heat load. The following sections provide a general description and criteria of the different watch lists. For a more complete explanation, refer to the Hanford Site Tank Farm Facilities Interim Safety Basis (WHC 1993).

- **Ferrocyanide**

  A tank containing or believed to contain greater than 1,000 gram moles of ferrocyanide (dry basis) is on the Ferrocyanide Watch List.

- **Hydrogen and Flammable Gas**

  Most tanks were placed on the Hydrogen/Flammable gas Watch List because of the potential to contain flammable gases rather than the verified presence of hazardous concentrations. Hydrogen/Flammable Gas Watch List tanks have been identified as unreviewed safety questions due to the concern of a flammable gas burn resulting in a radiological release.

- **Organic Salts**

  Tanks containing or believed to contain more than the equivalent of 10% by weight of sodium acetate or 3 wt% total organic carbon (TOC) on a dry basis received a watch list designation as in the Tank Farm Surveillance and Waste Status Summary Report (Hanlon 1993).

- **High-Heat Loads**

  Tanks with a heat load greater than 40,000 Btu/hr are designated as high-heat load tanks. Tank 241-C-106 is the only high-heat load tank on the High-Heat Load Watch List.

A tank that does not appear on a watch list but has a heat load less than 40,000 Btu/hr is considered a low-heat load tank by default.

The following table lists the tanks in the NE quadrant that appeared on a watch list as of October 1993. A current list is published monthly in the Tank Farm Surveillance and Waste Status Summary Report (Hanlon 1993).

NE Quadrant Watch List Tanks

Tank	Category	Tank	Category
A-101	Hydrogen	BY-108	Ferrocyanide
AX-101	Hydrogen	BY-110	Ferrocyanide
AX-103	Hydrogen	BY-111	Ferrocyanide
B-103	Organic Salts	BY-112	Ferrocyanide
BX-102	Ferrocyanide	C-103	Organic Salts
BX-106	Ferrocyanide	C-106	High-Heat Load
BY-103	Ferrocyanide	C-108	Ferrocyanide
BY-104	Ferrocyanide	C-109	Ferrocyanide
BY-105	Ferrocyanide	C-111	Ferrocyanide
BY-106	Ferrocyanide	C-112	Ferrocyanide
BY-107	Ferrocyanide		

1.6.2 Non-Watch List Safety Issues

Tank leaks are a safety hazard because of the potential chemical and radioactive liquid releases to the ground. Corrosion is the main cause of tank leaks and stabilization, integrity, and intrusion prevention are discussed in the corrosion section of this report. Criticality, tank bumps, and toxic vapor releases are other safety issues that do not require a watch list designation and/or continual monitoring under the Wyden Amendment.

- **Corrosion**

Corrosion is believed to be caused by localized or general reduction in SST mild carbon liner thickness. Localized liner thickness reduction is caused by three types of corrosion: pitting corrosion, stress corrosion cracking , and crevice cracking. General liner thickness reduction may be caused by uniform corrosion.

The SSTs were removed from service on or before November 21, 1980 and no longer accept wastes. When the SSTs are deactivated, an effort is made to minimize potential leaks into the earth by reducing the liquid waste contained in the SSTs. Primary stabilization is the first deactivation process of removing the supernatant or free liquid above the solid wastes within the SSTs. Supernatant is removed by turbine or jet pumps in a saltwell system, low-volume submersible pumps, or in situ drying. In

saltwell systems, the liquid is pumped from the waste through a pipe screen in a manner similar to ground water pumping. Tanks with less than 50,000 gal of drainable interstitial liquid and less than 5,000 gal of supernatant liquid are known as interim stabilized tanks. Liquid waste is sent to the evaporator/crystallizer concentrating facilities and the concentrated waste is deposited into double-shell tanks (DSTs).

Eventually, SSTs will be interim stabilized and prepared for intrusion prevention (formerly known as interim isolation). Stabilization efforts will be completed prior to final closure of the SSTs. Partial isolation of the tanks includes sealing the piping and risers that are not required for pumping or other stabilization methods. Intrusion prevention is the total physical and administrative effort involved in sealing inactive storage tank accesses against liquid additions while still allowing for long-term surveillance.

There are 67 assumed/confirmed leaking SSTs in the 200 East and West Areas with 32 in the NE quadrant. The remaining 34 tanks in the NE quadrant are sound. There are 51 interim stabilized tanks in the NE quadrant and 15 noninterim stabilized tanks. Intrusion prevention is in place for 46 SSTs in the NE quadrant, and 20 tanks are at the partial interim isolation stage.

- **Criticality**

Criticality is an inadvertent self-sustained nuclear chain reaction. Studies have concluded that a nuclear criticality accident in the tank farms is probably not an imminent risk. However, definitive knowledge of the fissile material inventory and distribution within the tanks is lacking. Therefore, criticality remains a safety issue. The key criticality radionuclide on the Hanford Site is plutonium. A fissile material criticality prevention specification of 125 kg has been placed on the tanks. An unusual occurrence report involving nuclear criticality was filed in June 1991 for Tank 241-C-104. An inventory of 56 kg was calculated later which indicated a low probability for criticality. Criticality is considered an unreviewed safety question but is not affected by the Wyden Amendment according to the Hanford Site Tank Farm Facilities Interim Safety Basis (WHC 1993).

- **Tank Bumps**

Tank bumps have been an issue at Hanford since 1953 with the last bump occurring in 1968. The A Tank Farm is known to have had tank bumps. Tank bumps occur when heat from the hotter solid waste in the lower portion of the tank is suddenly transferred to a near boiling supernatant. Mixing can be achieved by "roll over" or sudden restart of airlift circulators which results in rapid fluid vaporization and a sudden internal tank pressurization that causes a bump. The three documented bumps that have occurred were due to airlift circulator failure followed by rapid startup of the airlift circulators which causes rapid mixing. Two key factors have been identified to control bumping: liquid and solid temperatures must be maintained as far away from the local boiling point as possible

and airlift circulators and ventilation systems must be operated as designed. A tank bump is extremely unlikely if airlift circulators and vent flow rates are maintained at 500 to 1,000 ft^3/min per tank and 50 ft^3/min to the airlift circulators, according to the Hanford Site Tank Farm Facilities Interim Safety Basis (WHC 1993).

- **Toxic Vapor Releases**

The safety concern of toxic vapor releases have been analyzed recently at Hanford. Odors have been released from the C Tank Farm in the NE quadrant and from Tank 241-SY-101. Tank 241-C-105 has experienced releases that have resulted in worker exposure. If toxic vapors are determined to exist in a tank, three safety recommendations should be followed: determine a release rate, determine offsite and onsite exposure concentrations, and determine if the release is a spray effect. The entire issue of toxic gas releases at the tank farms has just begun to be understood, Hanford Site Tank Farm Facilities Interim Safety Basis (WHC 1993).

2.0 B Tank Farm

2.0.1 B Tank Farm History

The 241-B Tank Farm was constructed between 1943 and 1944 and is located east of Baltimore Avenue and north of the B Evaporator in the 200-East Area. The B Tank Farm contains twelve 100 series; 530,000-gal; 75-ft diameter single-shell tanks and four 200 series; 55,000 gal; 20-ft diameter single-shell tanks. Built as a first generation, the B Tank Farm was designed for nonboiling waste tanks with a maximum fluid temperature of 220°F. The cascade overflow lines connect a series of three tanks. Because the tanks are in a three-by-four arrangement, there are four groups of cascading tanks. A cascade group consists of three tanks in step configuration. The cascade overflow height is approximately 188 in. from the tank bottom. There are tie lines between the smaller 55,000-gal tanks. The tie lines are at the same elevation which allowed these tanks to overflow and equalize tank volumes.

All 16 SSTs, including the four smaller tanks in the B Tank Farm, contain non-complexed waste. Although none of the B Tank Farm tanks are on a watch list, 15 of them are on the Low-Heat Load List. A 1993 color aerial photograph of the B Tank Farm shows the tank orientation, a diversion box, and a north arrow. The arrows between tanks represent the cascade overflow lines and the flow direction.

The B Tank Farm was constructed using certified vendor and information file 73550 under project 9536. The B,C,T, and U Tank Farms were built at the same time under the same specifications and project. The cylindrical tanks are 75 ft in diameter and designed to house nonboiling radioactive waste. Four tanks are 20 ft in diameter with the same basic design as the twelve larger tanks. The tanks have an operating depth of 17 ft. Similar to all other single-shell tanks, the B Tank Farm tanks were designed with a primary steel liner and a concrete dome with various risers. The tanks are set on a reinforced concrete foundation.

Various sealants and coatings were used to prevent tank intrusions and leaks. A three-ply cotton fabric waterproofing was applied over the foundation and steel tank. Four coats of primer paint were sprayed on exposed interior tank surfaces. Each tank was covered with approximately 7 ft, 3 in. of overburden. Tank ceiling domes were covered with three applications of magnesium zincfluosilicate wash. Lead flashing was used to protect the joint where the steel liner meets the concrete dome. Asbestos gaskets were used to seal the manholes in the tank dome.

2.0.1.1 B Tank Farm Waste History

The B Tank Farm received waste from B Plant, first-and second-cycle waste, and evaporator bottoms waste. Tanks 241-B-102, -103, -106, -108, -109, and -112 were modified to accept in-tank solidification waste evaporator bottoms. Tanks 241-B-101, -102,

and -103 were sluiced in 1953 for uranium recovery. Sluiced waste was sent to the 244-BXR process vault. After deactivation, liquid was pumped from Tanks 241-B-102, -105, -107, and -110 to Tank 241-B-102.

2.0.1.2 B Tank Farm Temperature History

Each B tank contains one thermocouple tree that is designed to hold between 12 and 17 thermocouple probes. Tank 241-B-103 is the only tank on the Organic Salts Watch List for critical temperature data monitoring. The tank was added to the Organic Salts Watch List officially in January 1991 and is monitored weekly. Temperatures for the remaining tanks in the B Tank Farm are monitored semiannually.

2.0.1.3 B Tank Farm Integrity

The twelve 530,000-gal tanks and the four 550,000-gal tanks in the B Tank Farm are out of service. As of July 1993, Tanks 241-B-102, -104, -106, -108, -109, and -202 are categorized as sound and Tanks 241-B-101, -103, -105, -107, -110, -111, -112, -201, -203, and -204 are assumed leakers. Tank integrity surveillance methods include liquid observation wells, surface level measurements, and leak detection wells (drywells). If a discrepancy is observed as a result of the surveillance activities; notification, reporting, documentation, and investigation of the surveillance anomaly (data outside the criteria limits, changing trend, or departure from steady state) is conducted in accordance with the appropriate procedure. Generally, the first plan of action is to determine if the discrepancy is caused by something other than a tank leak or intrusions.

Tanks 241-B-104 and -105 have liquid observation wells that are used to monitor the interstitial liquid level. The maximum deviation from the established baseline is a 0.3-ft increase or a 0.4-ft decrease. The interstitial liquid level is monitored weekly with a neutron probe and on request with a gamma probe.

Surface level monitoring for manual measurement devices in the B Tank Farm is conducted daily or quarterly. The maximum allowable deviations from the established baseline are a 1- or 2-in. increase; a 1-, 2-, or 3-in. decrease; or a no criterion decrease, depending on the tank. The no criterion designation was established for waste tanks containing sludge with little or no solution. For these tanks, a surface level decrease is not a valid means of leak detection because the level may decrease due to sludge slumpage (especially during saltwell pumping), tape flushes, exposed sludge, or a perforation at the point of probe contact. Tanks that have a saltcake surface and are equipped with an automatic Food Instrument Corporation gauge may have a 10-in. decrease criteria which was established to alert operating personnel if the gauge unwinds in search of a conductive liquid surface.

The B Tank Farm has 52 leak detection wells that were drilled from 1944 to 1974. Seven drywells are not tank-specific. Drywells 20-00-01 and 20-00-05 have readings greater than the 50 c/s background radiation. The drywells are monitored monthly, yearly, or on request with scintillation, shielded scintillation, and Geiger-Mueller probes. Action criteria for monitoring increased activity with the scintillation and shielded scintillation probes are as follows: if the normal readings are less than 200 c/s, the readings must double and exceed 200 c/s; if the normal readings are greater than 200 c/s, the readings must double. Action criteria for monitoring increased activity with the Geiger-Mueller probe are as follows: if the normal readings are in between 16 and 1,000 c/s, the readings must triple; if the normal readings are greater than 1,000 c/s, the readings must double. Drywells associated with assumed leaking tanks are monitored for contamination migration. The criteria limits only apply where new radiation peaks occur. If increasing drywell activity has not exceeded the action criteria, appropriate personnel will determine if increased monitoring is required.

The figure of the B Tank Farm layout including the peak drywell, tank integrity information, and tank status information are in Appendix F. The drywell information is based on data collected prior to 1986 and on current data from January 1990 to the present. Graphical representations of the current active drywells mentioned above follow the B Tank Farm figure. Each graph includes the peak c/s, the depth at which the peak occurred, and the date of the reading.

2.0.1.4 B Tank Farm Historical Sample Analysis Data

Waste samples have been analyzed at different times in the past to characterize SST contents (i.e., supernatant, sludge, and/or saltcake). Data have been compiled for this study from samples obtained from the late 1950s to September 1989.

2.0.2 Current Status of B Tank Farm

Tank 241-B-103 was added to the Organic Salts Watch List officially in January 1991. Organic Salts tanks are a safety concern because high organic concentrations in the tanks could support an exothermic reaction at elevated temperatures and, thus, have potential to release high-level waste. Organic Salts Watch List tanks must be monitored for temperature on a weekly basis. Low-Heat Load tanks (i.e., <40,000 Btu/hr) include Tanks 241-B-101, -102, -104, -105, -106, -107, -108, -109, -110, -111, -112, -201, -202, -203, and -204. Low-Heat Load tanks are monitored for temperature semiannually. The total volume of waste in the B Tank Farm is 2,058,000 gal: 15,000 gal of supernatant; 770,000 gal of saltcake; 130,000 gal of unknown solids; and 1,143,000 gal of sludge.

2.0.2.1 B Tank Farm In-Tank Photographs

The B Tank Farm is one of the oldest first generation tank farms. Built in 1943-44, the B Tank Farm consists of twelve 530,000-gal tanks and four 55,000-gal tanks. Typical tanks contain 11 to 13 risers, one through the center of the tank dome and five each on opposite sides of the tank. The other 1-3 risers are scattered on the dome. The photos are usually taken from one of the side risers and the camera is aimed toward the other side. The latest in-tank photos for the B Tank Farm date from February 1975 to October 1988. Most of the photos provide a current representation of the tank contents because, except where noted, no pumping activity has occurred since the photo was taken.

2.1 Tank 241-B-101

2.1.1 241-B-101 Tank History

2.1.1.1 Waste History Tank 241-B-101

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). From May of 1945 to October 1945, Tank 241-B-101 was filled with metal waste. The tank cascaded between 1945 and 1953. From the second quarter of 1945 to the second quarter of 1953, the tank contained metal waste. In the first quarter of 1953, the tank was processing feed for U Plant. On December 28, 1953, sluicing for uranium recovery was completed in Tank 241-B-101. From the fourth quarter of 1953 to the second quarter of 1963, the tank contained evaporative bottoms waste. In the third quarter of 1957, in-farm scavenged feed was sent to the CR process vault. In the second quarter of 1960, wastewater leaked into the pipe encasement which drained to Tank 241-B-101. In the fourth quarter of 1963, the tank received coating waste. Beginning in the fourth quarter of 1963 and until the fourth quarter of 1968, the tank contained evaporative bottoms waste and coating waste. From the second quarter of 1969 until the fourth quarter of 1974, the tank contained B Plant low-level waste and evaporator bottoms waste. Tank 241-B-101 contained evaporator bottoms waste in the second quarter of 1969. In 1974, the tank was declared an assumed leaker after leaking approximately 8,000 gal and was removed from service. A saltwell was installed in Tank 241-B-101 in 1975, a level adjustment was made in 1976, and the tank was declared inactive in 1977. Presently, the tank waste is classified as non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-101 received metal waste from the second quarter of 1945 until the first quarter of 1946. From the second quarter of 1960 until the first quarter of 1970, the tank received wastewater. The tank received B Plant high-level waste from the second quarter of 1969 until the second quarter of 1970. From the third quarter of 1970 until the first quarter of 1973, the tank received B Plant low-level waste.

The P-10 pump (a saltwell pump) was removed from Tank 241-B-101 in 1978. Interim stabilization was completed after the supernatant pumping was completed (with a flex and float pump) in March 1981. Intrusion prevention was completed in May 1981 and a level adjustment was made in April 1982. In-tank photographs were taken on the following dates: two in 1975, September 1977, and May 1983. Two pH readings are listed on sketch ES-TKS-E11: 9.3 in May 1955 and 13.9 in May 1965. The current maximum temperature reading from July 1993 is 108° F. Sketch ES-TKS-E11, which shows a graphical representation of the Tank 241-B-101 level history, and the historical waste level data used to make it are in Appendix C.

2.1.1.2 Temperature History 241-B-101

The single thermocouple tree in Tank 241-B-101 has 17 thermocouple probes in riser 9. Elevations are available for all thermocouple probes except 13 through 17. In-tank temperature readings from the tank in-service date to 1974 are sporadic. Thermocouples 1 through 11 have similar readings that span from May 1974 to 1993. Readings from thermocouples 12 through 14 show trends similar to the the first 11 thermocouples, and span from 1974 through 1987. Data for thermocouples 15 and 16 are available from 1984 to 1986. Only one data point is available for thermocouple 17. Review of the Tank 241-B-101 level history indicates that from 1974 to 1975, thermocouple probe 1 was in or near the solids level, thermocouples 3 through 7 were in or near the liquid level, and thermocouples 8 through 17 were in the vapor space. Thereafter, thermocouple 1 was in or near the solids level and the rest were in the vapor space.

The average temperature of the first recorded data for thermocouples 1 through 14 is 117°F. A sum of the squares regression line fit for thermocouples 1 through 12 starting in 1974 shows a 0.02 overall slope ± 11.8°F with an average r square value of 0.001. A regression analysis on thermocouples 13 and 14 is not an accurate assessment of the data due to the concentration of data points between 1974 and 1976 and the sparseness of other data points throughout the time period. Not enough data points exist for thermocouples 15 through 17 to give any conclusive information about in-tank temperature trends. Thermocouples 1 and 2 recorded temperatures 15 to 20°F higher than other thermocouples in the tank from May 1974 to the present. From May 1974 to the present, the median temperature is 95°F with a minimum of 40°F and a maximum of 137°F. Tank 241-B-101 is on the low-heat load non-watch list and is scheduled to be monitored semi-annually in January and July.

Plots of thermocouple readings for Tank 241-B-101 are in Appendix D.

2.1.1.3 Integrity of Tank 241-B-101

Tank 241-B-101 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-101 surface level is monitored with a Food Instrument Corporation gauge through riser 8. Liquid waste volume is determined by a photographic evaluation and the solid waste volume is determined by a Food Instrument Corporation gauge. The gauge is set in the intrusion mode for a 1-in. increase. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted quarterly. The maximum allowable increase from the 36.7-in. baseline is 2 in. There is no criterion for a decrease. Data are not available for a surface level plot due to the Food Instrument Corporation gauge setting.

Tank 241-B-101 does not have a liquid observation well.

Six drywells are identified for Tank 241-B-101. Drywells 20-01-01 (active prior to 1990, current readings > 200 c/s), 20-01-05 (no longer active), 20-01-06 (active prior to 1990, current readings > 200 c/s) , and 20-01-07 (no longer active) have or had readings greater than the 50 c/s background radiation.

Graphical representations of the active drywells from January 1990 to the present are in Appendix F. Each graph includes the peak c/s (some wells have multiple peaks), the depth at which the peak occurred, and the date of the reading.

2.1.1.4 Historical Sample Analysis Data for Tank 241-B-101

The analysis results for one sludge sample from Tank 241-B-101 are included in this report. The sample was received on January 5, 1976 and was analyzed in February 1976. The sludge sample had the consistency of soft mud and was dark brown. Particle size distribution of sample solids showed 90 weight percent between 5 and 50 μm. A heat generation rate, based on $^{89+90}Sr$ and ^{137}Cs was calculated at 2.01 x 10^{-2} watts/liter of sludge. The complete analysis is in Appendix H.

2.1.2 Current Status of Tank 241-B-101

Tank 241-B-101 entered service in May 1945 and currently stores 113,000 gal of waste. The waste is comprised of 10,000 gal of unknown waste; 28,000 gal of sludge; and 75,000 gal of saltcake with no pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-101 is equipped to cascade to Tank 241-B-102 and is first in the three-tank cascade flow series. The following plan view and tank cross-section depict the approximate waste level and riser configuration. Tank 241-B-101 has 12 risers and one 12-in. riser (no.2) is available for use.

2.1.2.1 Waste Layer Volume Approximation for Tank 241-B-101

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.1.2.2 In-Tank Photograph 241-B-101

The 1975 picture of the Tank 241-B-101 interior in Appendix I indicates a solid rough black surface with no visible liquid. The photos are blurry or out-of-focus but most of the details are visible. Major equipment items have been identified and labelled. The tank contains about 112,000 gal of waste which corresponds to a depth of approximately 3.5 ft. The level was adjusted and supernatant was pumped from this tank after these photographs were taken; therefore, the photograph does not represent the current tank contents.

2.1.3 Synopsis Tank 241-B-101

(To be completed)

2.2 Tank 241-B-102

2.2.1 241-B-102 Tank History

2.2.1.1 Waste History Tank 241-B-102

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). The Tank 241-B-102 is a low-heat load tank. The tank does not contain a liquid observation well. Liquid waste volumes are determined by a photographic evaluation and the solid waste volume is determined by a Food Instrument Corporation gauge. The tank contains 18,000 gal of sludge, 10,000 gal of saltcake, and 4,000 gal of supernatant. Tank 241-B-102 was equipped to cascade to Tank 241-B-103.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-102 received wastewater from the fourth quarter of 1975 until the second quarter of 1972. During the third quarter of 1963 the tank received PUREX cladding waste.

From October to December 1945, Tank 241-B-102 was filled with metal waste and was full in. December 1945. The tank cascaded between 1945 and 1953. From the fourth quarter of 1945 to the third quarter of 1953, the tank contained metal waste. In the first quarter of 1953, the tank was processing feed for the U Plant. In the fourth quarter of 1953, the tank received evaporator bottoms from Tank 241-B-105. In the third quarter of 1957, in-farm scavenged feed was sent to the CR process vault. From the fourth quarter of 1953 to the fourth quarter of 1962, the tank contained evaporator bottoms waste. Between the second quarter of 1963 and the fourth quarter of 1968, the tank contained evaporator bottoms waste and coating waste. In the first and second quarters of 1969, the tank contained evaporative bottoms waste. The tank contained B Plant low-level waste and evaporator bottoms waste from the third quarter of 1969 to the second quarter of 1970. The tank contained B Plant low-level waste and ion exchange waste from the third quarter of 1970 to the first quarter of 1972. The tank contained evaporator bottoms waste, B plant low-level waste, and ion exchange waste from in the second quarter of 1972 until the second quarter of 1976. The tank was an interstitial liquid storage tank from the second quarter of 1975 to the second quarter of 1977. From the third quarter of 1976 to the first quarter of 1978, the tank contained dilute evaporator feed waste. In the first quarter of 1978, the tank was termed an evaporator feed receiver. In the third quarter of 1978, a level adjustment was made and the tank became inactive. Presently, the tank waste is classified as non-complexed.

In August 1985, a level adjustment was made and interim stabilization was achieved after saltwell pumping was complete. In September 1985, intrusion prevention was completed. In-tank photographs were taken on the following dates: September 1973, two

in 1977, April 1980, May 1983, and two in 1985. Four pH readings are listed on the level history: 9.1 in May 1955, 9.2 in September 1957, 11.8 in May 1965, and 9.9 in October 1975. The current maximum temperature reading from July 1993 is 63° F. Sketch ES-TKS-E12, which shows a graphical representation of the Tank 241-B-102 level history and the historical waste level data used to make it are in Appendix C.

2.2.1.2 Temperature History 241-B-102

The single thermocouple tree in Tank 241-B-102 has 12 thermocouple probes to monitor the waste temperature through riser 4. Elevations are available for all the thermocouple probes. Presently, no data are available prior to September 1974. All the thermocouples have similar data that span from September 1974 to July 1993. No data are available from 1985 to 1989, although two thermocouple trees were in the tank in August 1985. Review of the Tank 241-B-102 level history indicates that in 1974, thermocouple probes 1 through 6 were in the liquid, and thermocouples 7 through 12 were in the vapor space. Beginning the second quarter of 1975 and thereafter, all the thermocouples were in the vapor space.

The mean temperature of the first recorded data was 72°F. A sum of the squares regression for all the thermocouples starting in 1974 shows a slightly negative near zero slope ± 12.5°F with an average r square value of 0.01. From May 1974 to present, the median temperature is 68°F with a minimum of 50°F and a maximum of 107°F. Because Tank 241-B-102 is a low-heat load tank, it is scheduled for temperature monitoring semiannually in January and July.

Plots of the thermocouple readings in Tank 241-B-102 are in Appendix D.

2.2.1.3 Integrity of Tank 241-B-102

Tank 241-B-102 is categorized as sound and is interim stabilized with intrusion prevention completed. The Tank 241-B-102 surface level is monitored with a Food Instrument Corporation gauge through riser 1. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted daily. The maximum allowable deviations from the established 7.1-in. baseline are a 2-in. increase and a 1-in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has remained steady and the readings range between 7.2 and 7 in.

Tank 241-B-102 does not have a liquid observation well. Five drywells are identified for Tank 241-B-102, none of them have or had readings greater than the 50 c/s background radiation.

2.2.1.4 Historical Sample Analysis Data for Tank 241-B-102

Analysis results have been reported for two samples from Tank 241-B-102: one from June 1973 and one from October 1975. Both samples were from the supernatant liquid in the tank. The liquid was described in 1975 as yellow and cloudy. Complete results are in Appendix H.

2.2.2 Current Status of Tank 241-B-102

Tank 241-B-102 entered service in October 1945 and currently stores 32,000 gal of waste. The waste is comprised of 4,000 gal of supernatant; 24,000 gal of saltcake; and 4,000 gal of sludge with no pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as sound with interim stabilization and intrusion prevention completed. Tank 241-B-102 is equipped to cascade to Tank 241-B-103 and is second in the three-tank cascade series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-102 has 10 risers.

2.2.2.1 Waste Layer Volume Approximation for Tank 241-B-102

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.2.2.2 In-Tank Photograph 241-B-102

The assembled 1985 photographs of the Tank 241-B-102 interior indicates a thin, translucent orange liquid over a brown solid waste surface (see Appendix I). The tank contains approximately 32,000 gal of waste which corresponds to a depth of approximately 1 ft. The picture is somewhat blurred and incomplete. Chunks of wood are part of the debris directly under the camera. The rings near the debris are formed by condensation dripping from the end of a riser. The photographs may have been taken before supernatant was pumped from this tank; therefore, the photograph may not represent the current tank contents.

2.2.3 Synopsis Tank 241-B-102

(To be completed)

2.3 Tank 241-B-103

2.3.1 241-B-103 Tank History

2.3.1.1 Waste History Tank 241-B-103

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-103 was filled with metal waste from December 1945 to March 1946. The tank received cascade waste from Tank 241-B-102 from the fourth quarter of 1945 until the first quarter 1952. In the first quarter of 1953, the tank was processing feed for U-Plant. From the fourth quarter of 1945 to the fourth quarter of 1953, the tank contained metal waste. In the fourth quarter of 1953, the waste was transferred to Tank 241-BY-102. The tank contained water used in sluicing in the fourth quarter of 1953. In the third quarter of 1957, in-farm scavenged feed was sent to the CR process vault. The tank contained evaporator bottoms waste from the first quarter of 1954 to the second quarter of 1963. In the fourth quarter of 1963, the tank received coating waste. From the fourth quarter of 1963 to the first quarter of 1968, Tank 241-B-103 contained evaporator bottoms waste and coating waste. In the second quarter of 1969, Tank 241-B-103 contained coating waste and organic wash waste. From the first quarter of 1970 until the third quarter of 1971, the tank contained ion exchange waste. In the fourth quarter of 1971, Tank 241-B-103 contained B Plant low-level waste and ion exchange waste. The tank contained water waste from the second quarter of 1972 to the first quarter of 1973. In the first and second quarters of 1973, Tank 241-B-103 contained ion exchange waste. Tank 241-B-103 contained various types of waste from the fourth quarter of 1973 to the forth quarter of 1975. The tank contained dilute evaporator feed in the first and second quarters of 1977. In 1978, Tank 241-B-103 was pronounced an assumed leaker after leaking approximately 8,000 gal. The tank was declared inactive in 1978 and presently contains non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-103 received PUREX cladding waste from the third quarter of 1963 until the second quarter of 1964. From the second quarter of 1969 until the second quarter of 1976, the tank received wastewater.

The P-10 pump was removed in 1978 and level adjustments were made in May 1982 and January 1984. Interim stabilization was achieved after supernatant pumping in February 1985. Another level adjustment was performed in February 1985. In September 1985, intrusion prevention was completed. In-tank photographs were taken on the following dates: September 1973, August 1977, February 1980, May 1983, February 1985, and October 1988. Four pH readings are listed on the level history: 9.6 in May 1955, 11.8 in May 1965, 12.0 in May 1975, and 12.4 in October 1975. The current maximum temperature reading from October 1993 is 66° F. Sketch ES-TKS-E13, which shows a graphical representation of the Tank 241-B-103 level

history, and the historical waste level data used to make it are in Appendix C.

2.3.1.2 Temperature History 241-B-103

The single thermocouple tree in Tank 241-B-103 has 13 thermocouple probes to monitor the waste temperature through riser 4. Elevations are available for all thermocouple probes. Very few in-tank temperature readings are available from the tank in-service date to September 1974. Thermocouples 1 through 12 have very similar temperature readings that span from October 1973 to the present. Limited data are available for thermocouples 13 and 14. Two data points are available for thermocouple 13 and only one data point is available for thermocouple 14. No readings are available between February 1984 and January 1990, although two thermocouple trees were detected in the tank in October 1988. Review of the Tank 241-B-103 level history indicates that from September 1974 to April 1977, thermocouple probes 1 through 7 were in or near the liquid level, and thermocouples 8 through 14 were in the vapor space. From April 1977 until January 1985, thermocouple 1 was in or near the liquid level and the rest were in the vapor space. Thereafter, all the thermocouples appear to have been in the vapor space.

The mean temperature of the first data taken for thermocouples 1 through 12 was 76.5°F. A sum of the squares regression line fit for the first 12 thermocouples starting in 1974 shows a slightly negative near zero slope ± 4.3°F with an average r square value of 0.075. Not enough data are available for thermocouples 13 and 14 to do an accurate regression and variability analysis. Annual temperature undulations are apparent after January 1991. From September 1974 to present, the median temperature is 61.7°F with a minimum of 40°F and a maximum of 83°F. Tank 241-B-103, an Organic Salts Watch List tank, has a weekly temperature monitoring requirement.

Plots of the thermocouple readings for Tank 241-B-103 are in Appendix D.

2.3.1.3 Integrity of Tank 241-B-103

Tank 241-B-103 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-102 surface level is monitored with a Food Instrument Corporation gauge through riser 1. The gauge is set in the intrusion mode for a 1-in. increase. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted quarterly. The maximum allowable increase from the 17.4-in. baseline is 2 in. There is no criterion for a decrease. Data are not available for a surface level plot due to the Food Instrument Corporation gauge setting.

Tank 241-B-103 does not have a liquid observation well. Five drywells are identified for Tank 241-B-103. Drywells 20-03-03 and

20-03-06 (both no longer active) had readings greater than the 50 c/s background radiation.

2.3.1.4 Historical Sample Analysis Data for Tank 241-B-103

Analysis results have been reported for two samples from Tank 241-B-103: one in May 1975 and one in October 1975. Both samples were analyzed in October and appear to have been liquid which was described as yellow and containing no solids. Complete analysis results are in Appendix H.

2.3.2 Current Status of Tank 241-B-103

Tank 241-B-103 entered service in December 1945 and currently stores 59,000 gal of waste. The waste is comprised of 3,000 gal of sludge and 56,000 gal of saltcake with no pumpable liquid remaining. The tank is on the Organic Watch List as of January 1991, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-103 is third in the three-tank cascade flow series. Tank 241-B-103 was not equipped to cascade to another tank. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-103 has 10 risers and one 12-in. riser, no. 2, available for use.

2.3.2.1 Waste Layer Volume Approximation for Tank 241-B-103

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.3.2.2 In-Tank Photograph 241-B-103

The 1988 picture of the Tank 241-B-103 interior is hazy so the waste surface is somewhat undefined (see Appendix I). It appears that there is a black sludge surface with little pools of supernatant. Picture quality is adequate to permit identification of equipment and nozzles and those which are visible have been labelled. The temperature probe in the background is encrusted with solids about halfway between the waste surface and the riser. The tank contains approximately 59,000 gal of waste which converts to a depth of about 2 ft. There have been no changes in the tank which would affect the waste since these photographs were taken; therefore, the picture should be representative of the current tank contents.

2.3.3 Synopsis Tank 241-B-103

(To be completed)

2.4 Tank 241-B-104

2.4.1 241-B-104 Tank History

2.4.1.1 Waste History Tank 241-B-104

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-104 was filled with second-cycle waste from August 1946 and was full in February 1947. The tank cascaded to Tank 241-B-105 off and on from the first quarter of 1947 until the third quarter of 1950. From the third quarter of 1946 to second quarter of 1951, the tank contained second-cycle waste. In July and August 1948, waste was transferred to a crib from the tank. In March 1949, Tank 241-B-104 was filled again. In the second quarter of 1950, the tank waste was transferred to a crib. From the first to the third quarters of 1952, the tank contained first-cycle waste. The tank was partially supernatant-pumped but not down to the sludge during the third quarter of 1952. On December 4, 1952, Tank 241-B-104 began to fill again with evaporator bottoms waste. From the fourth quarter of 1952 until the third quarter of 1974, the tank contained evaporator bottoms. In the third quarter of 1953, the tank received U Plant waste and evaporator bottoms waste. In the fourth quarter of 1953, the tank received first-cycle sludge and U Plant evaporator bottoms waste. The tank received drainage from a diversion box in the third quarter of 1954. From the third quarter of 1975 to the fourth quarter of 1976, the tank was salt-filled. From the second quarter of 1976 through the second quarter of 1977, the tank was saltwell pumped. During the fourth quarter of 1977 and the first quarter of 1978, a saltwell was installed in Tank 241-B-104. The tank was declared inactive in 1978. Presently, the tank contains non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-104 received second-cycle waste from the third quarter of 1946 until the second quarter of 1950. During the third quarter of 1950 the tank received first-cycle waste. From the fourth quarter of 1952 until the fourth quarter of 1953, the tank received saltcake waste from the 242-B Evaporator. The tank received wastewater from the third quarter of 1954 until the second quarter of 1972.

A P-10 pump was installed in the third quarter of 1978 and a level adjustment was made in January 1984. In June of 1985, the tank was declared interim stabilized after it was saltwell-pumped. A level adjustment was made in June 1985, and intrusion prevention was completed in September 1985. Liquid observation well data were plotted that represent the supernatant level. The data follow close to the supernatant level data plotted from the manual tape surface level gauge readings. In-tank photographs were taken on the following dates: July 1974, January 1980, May 1983, two in 1985, and October 1988. One pH reading of 7.9 is listed on the level history in October 1975. The current maximum temperature

reading from July 1993 is 66° F. Sketch ES-TKS-E14, which shows a graphical representation of the Tank 241-B-104 level history, and the historical waste level data used to make it are in Appendix C.

2.4.1.2 Temperature History 241-B-104

Tank 241-B-104 contains a single thermocouple tree with 12 thermocouple probes in riser 5. Specific thermocouple elevations are not available. No data are currently available prior to 1975. Thermocouples 1 through 11 have very similar readings that span from 1975 to 1993. Only three data points from 1974 to 1979 are available for thermocouple 12. No data are available from 1982 to 1989, although a thermocouple tree was detected in October 1988.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 63°F. A sum of the squares regression line fit for the first 11 thermocouples starting in 1975 shows an overall zero slope ± 11.4°F with an average r square value of 0.02. There is one outlying point in July 1989 of approximately 121°F apparent for thermocouples 1 through 11. From April 1975 to present, the median temperature is 66°F with a minimum of 52°F and a maximum of 122°F. Tank 241-B-104 is a low-heat load tank and has a semiannual temperature monitoring requirement for January and July.

Plots of the thermocouple readings for Tank 241-B-104 are in Appendix D.

2.4.1.3 Integrity of Tank 241-B-104

Tank 241-B-104 is categorized as sound and is interim stabilized with intrusion prevention completed. The Tank 241-B-102 surface level is monitored quarterly with a manual tape through riser 8. The maximum allowable increase from the 132-in. baseline is 2 in. There is no criterion for a decrease. A figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has remained steady and the readings range between 132 and 131.75 in.

The Tank 241-B-104 liquid observation well is located in riser 6. The interstitial liquid level is monitored weekly with a neutron probe and on request with a gamma probe. The maximum allowable deviations from the established baseline are a 0.3-ft decrease or a 0.4-ft increase. Sketch ES-TKS-E14 in Appendix C has a graphical representation of the liquid observation well data.

Two drywells are identified for Tank 241-B-104; however, neither of them have or had readings greater than the 50 c/s background radiation.

2.4.1.4 Historical Sample Analysis Data for Tank 241-B-104

None available or applicable.

2.4.2 Current Status of Tank 241-B-104

Tank 241-B-104 entered service in August 1946 and currently stores 371,000 gal of waste. The waste is comprised of 1,000 gal of supernatant; 61,000 gal of saltcake; 90,000 gal of unknown waste; and 219,000 gal of sludge with 40,000 gal of pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as sound with interim stabilization and intrusion prevention completed. Tank 241-B-104 is equipped to cascade to Tank 241-B-105 and is first in the three-tank cascade flow series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-104 has 10 risers with two 12-in. risers (no. 2 and no. 3) available for use.

2.4.2.1 Waste Layer Volume Approximation for Tank 241-B-104

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.4.2.2 In-Tank Photograph 241-B-104

The 1988 photographic montage of the Tank 241-B-104 interior indicates a thin, bright yellow liquid covering part of the surface of an off-white salt-like waste material (see Appendix I). The tank contains about 372,000 gal of waste which corresponds to a depth of almost 11 ft. The debris in the bottom of the picture contains: sludge measurement weights, old sample bottles, and some old level measurement tapes. The white spot to the left of the debris is the result of the camera flash. There have been no changes in the tank which would affect the waste since these photographs were taken; therefore, the picture should be representative of the current tank contents.

2.4.3 Synopsis Tank 241-B-104

(To be completed)

2.5 Tank 241-B-105

2.5.1 241-B-105 Tank History

2.5.1.1 Waste History Tank 241-B-105

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-105 began operating in February 1947 and was filled with second-cycle waste from Tank 241-B-104 via the cascade line by August 1947. The tank either received cascade from Tank 241-B-104 or cascaded to Tank 241-B-106 from the first quarter of 1947 until the third quarter of 1950. From the first quarter of 1947 to the second quarter of 1950, the tank contained second-cycle waste. During the third and fourth quarters of 1948 and the second quarter of 1950, the waste was pumped to a crib. The tank was declared empty in 1950. The tank contained first-cycle waste during the second quarter of 1952. From the third quarter of 1952 to the second quarter of 1972, the tank contained evaporator bottoms waste. From the first quarter of 1953 to the third quarter of 1954, Tank 241-B-105 was considered an active bottoms tank. A P-10 pump was installed in April 1972. From the third quarter of 1975 to the third quarter of 1976, the tank was salt-filled. Tank 241-B-105 was considered inactive and primary stabilized in the first quarter of 1978. Presently, The tank contains non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-105 received saltcake waste from the 242-B Evaporator from the fourth quarter of 1952 until third quarter of 1954. From the second quarter of 1972 until the second quarter of 1973, the tank received wastewater.

Tank 241-B-105 was declared an assumed leaker in 1978 with a leak volume of approximately 8,000 gal. Interim stabilization and a level adjustment occurred in December 1984. Intrusion prevention was completed in October 1985. Liquid observation well data that represent the interstitial liquid level were plotted. Interstitial liquid levels prior to 1986 are unknown. In-tank photographs were taken on the following dates: June 1973, June 1975, September 1979, January 1981, February 1982, December 1984, and May 1988. The current maximum temperature reading from July 1993 is 66° F. Sketch ES-TKS-E15, which shows a graphical representation of the Tank 241-B-105 level history, and the historical waste level data used to make it are in Appendix C.

2.5.1.2 Temperature History 241-B-105

The single thermocouple tree in Tank 241-B-105 has 13 thermocouple probes to monitor the waste temperature through riser 15. Thermocouple elevations are not available for these probes. No data are currently available prior to 1976. Thermocouples 1 through 11 have similar temperature readings that span from 1976 to 1993. Five data points are available for thermocouple 12 and one

is available for thermocouple 13. No data is available from April 1982 to July 1989, although 3 thermocouple trees were detected in May 1988.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 65°F. A sum of the squares regression line fit for the first 11 thermocouples starting in 1976 shows an overall zero slope ± 10.4°F with an average r square value of 0.1. A regression and variability analysis is not valid for thermocouple 12 because a large amount of error is induced from the few data points available and an outlying data point common to the first 11 thermocouples. The average temperature of the outlier in July 1989 is 106°F. Not enough data are available for a regression or variability analysis on thermocouple 13. From April 1976 to present, the median tank temperature is 67°F with a minimum of 51°F and a maximum of 107°F. Tank 241-B-105 is a low-heat load tank with a semiannual temperature monitoring requirement for January and July.

Plots of the thermocouple readings for Tank 241-B-105 are in Appendix D.

2.5.1.3 Integrity of Tank 241-B-105

Tank 241-B-105 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-102 surface level is monitored quarterly with a manual tape through riser 14. Liquid waste volume is determined by a photographic evaluation, and the solid waste volume is determined by a manual tape surface level gauge and a photographic evaluation. The maximum allowable increase from the 45-in. baseline is 2 in. There is no criterion for a decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has an increasing trend and the readings have steadily increased from 41.5 in. during the first quarter of 1991 to 42.5 in. during the fourth quarter of 1993.

The Tank 241-B-105 liquid observation well is located in riser 5. The interstitial liquid level is monitored weekly with a neutron probe and on request with a gamma probe. The maximum allowable deviations from the baseline value are a 0.3-ft decrease and a 0.4-ft increase. Sketch ES-TKS-E15 in Appendix C is a graphical representation of the liquid observation well data.

One drywell is identified for Tank 241-B-105. Drywell 20-05-06 was active prior to 1990 and currently has readings greater than 200 c/s. A graphical representation of the drywell data for the active drywell from January 1990 to the present are in Appendix F. The graph includes the peak c/s, the depth at which the peak occurred, and the date of the reading.

2.5.1.4 Historical Sample Analysis Data for Tank 241-B-105

A waste analysis for Tank 241-B-105 was conducted in June 1976. The solids in the sample were about 80 to 85% water soluble. Analysis by X-ray diffraction indicated a mixture of sodium nitrate and sodium phosphate with variable amounts of sodium carbonate, sodium sulfate, and aluminum oxide. The sample was 45.7% water and the solids portion was described as "whitish-yellow large hard chunks with smaller brown crystals intermixed." A table presenting the complete results of this analysis is in Appendix H.

2.5.2 Current Status of Tank 241-B-105

Tank 241-B-105 entered service in January 1947 and currently contains 306,000 gal of waste. The waste is comprised of 278,000 gal of saltcake; and 28,000 gal of sludge with no supernatant or pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-105 is equipped to cascade to Tank 241-B-106 and is second in the three-tank cascade flow series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-105 has 12 risers, and three are available for use: 12-in. risers No. 3, 6, and 7.

2.5.2.1 Waste Layer Volume Approximation for Tank 241-B-105

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.5.2.2 In-Tank Photograph 241-B-105

The 1988 assembled photographs from Tank 241-B-105 interior have produced one of the more interesting pictures from inside a tank (see Appendix I). It appears that a large part of the white salt crust has broken through to produce a large hollow which is filled with a variety of structures. It is likely that the crust was hollow underneath before the crust broke through. The photos are all very clear and distortion is minimal providing a good picture of all the equipment and debris in the tank. The tank contains about 306,000 gal of waste which converts to a depth of approximately 9 ft. There has not been any activity in the tank since the photographs were taken; therefore, the picture should be representative of the current tank contents.

2.5.3 Synopsis Tank 241-B-105

(To be completed)

2.6 Tank 241-B-106

2.6.1 241-B-106 Tank History

2.6.1.1 Waste History Tank 241-B-106

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-106 was filled with second-cycle waste from August 1947 to May 1948. The tank received waste via the cascade overflow from Tank 241-B-105 from the third quarter of 1947 until the second quarter of 1950. From the third quarter of 1947 until the first quarter of 1950, the tank contained second-cycle waste. During December 1948, the first quarter of 1949, and the first and second quarters of 1950, waste was transferred to a crib. From the third quarter of 1950 to the first quarter of 1951, the tank was designated as the future 242-B Evaporator feed tank. From the second quarter of 1952 to the first quarter of 1953, the tank contained first-cycle waste. The tank contained evaporator bottoms waste in the second quarter of 1953. On December 14, 1951, the 242-B Evaporator started. From the third quarter of 1952 to the third quarter of 1954, the tank was an evaporator feed tank. From the third quarter of 1953 to the third quarter of 1959, the tank contained U Plant waste. Scavenged feed was pumped from Tank 241-B-106 to Tank 241-C-101 during the fourth quarter of 1957. The tank contained U Plant waste and Hanford laboratory operations waste from the fourth quarter of 1959 to the third quarter of 1968. From the fourth quarter of 1968 to the second quarter of 1969, the tank contained waste from U-Plant and Battelle Pacific Northwest Laboratory. From the third quarter of 1969 to the first quarter of 1971, the tank contained only Pacific Northwest Laboratory waste. From the second quarter of 1971 until the second quarter of 1974, the tank contained 224-U waste and Battelle Pacific Northwest Laboratory waste. From the third quarter of 1974 to the second quarter of 1976, Tank 241-B-106 contained several waste types. In the fourth quarter of 1974, the tank was hooked to an exhauster. The tank contained dilute evaporator feed from the fourth quarter of 1976 until the second quarter of 1977. The tank was declared inactive in 1978. Presently, the tank contains non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-106 received wastewater from the second quarter of 1959 until the second quarter of 1971.

In the fourth quarter of 1978, the P-10 pump was removed. A level adjustment was made in December 1978. In 1979, Tank 241-B-106 was determined to be primary stabilized. Interim stabilization was completed with supernatant pumping and a level adjustment was made in March 1985. In October 1985, intrusion prevention was completed. In-tank photographs were taken on the following dates: several in 1975, September 1977, October 1978, January 1981, October 1983, and February 1985. Two pH readings are listed on the level history: 8.8 in October 1957 and 9.5 in October 1975. The

current maximum temperature reading from July 1993 is 62° F. Sketch ES-TKS-E16, which shows a graphical representation of the Tank 241-B-106 level history, and the historical waste level data used to make it are in Appendix C.

2.6.1.2 Temperature History 241-B-106

The single thermocouple tree in Tank 241-B-106 has 13 thermocouple probes to monitor the waste temperature through riser 4. Elevations are available for all the thermocouple probes. No data are currently available prior to 1974. Thermocouples 1 and 2 have similar temperature readings that span from 1974 to 1982. Thermocouples 3 through 12 have similar temperature trends that span from 1974 to 1993. Thermocouple 13 has one recorded measurment and it was taken in March 1980. There is a gap in temperature readings from February 1984 until July 1989; however, a thermocouple tree was in the tank in February 1985. Review of the Tank 241-B-106 level history indicates that from September 1974 to January 1976, thermocouples 1 and 2 were in or near the solids level, thermocouples 3 and 4 were in or near the liquid level, and thermocouples 5 through 13 were in the vapor space. Thereafter, thermocouples 1 and 2 were in or near the solids level and the rest were in the vapor space.

The mean temperature of the first recorded data for thermocouples 1 through 12 was 64°F. A sum of the squares regression line fit for the first 12 thermocouples starting in 1974 shows an overall zero slope ± 10.6°F with an r square value of 0.004. There is an outlying point in July 1989 of approximately 106°F. From September 1974 to present, the median tank temperature is 64°F with a minimum of 43°F and a maximum of 107°F. Tank 241-B-106 is a low-heat load tank and is scheduled to be monitored semiannually in January and July.

Plots of the thermocouple readings for Tank 241-B-106 are in Appendix D.

2.6.1.3 Integrity of Tank 241-B-106

Tank 241-B-106 is categorized as sound and is interim stabilized with intrusion prevention completed. The Tank 241-B-102 surface level is monitored with a Food Instrument Corporation gauge through riser 1. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted daily. The maximum allowable deviations from the 38.9-in. baseline are a 2-in. increase and a 3-in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has remained steady and the readings range between 39.6 and 38 in. The plot shows erratic data points during the third quarter of 1993 that are attributed to a mechanical malfunction during the automatic operation of the Food Instrument Corporation gauge.

An occurrence report was issued in 1978 when the liquid level exceeded the decrease criteria.

Tank 241-B-106 does not have a liquid observation well. Four drywells are identified for Tank 241-B-106. Drywell 22-06-06 was active prior to 1990 and currently has readings greater than the 200 c/s.

A graphical representation of the active drywell from January 1990 to the present is in Appendix F. The graph includes the peak c/s, the depth at which the peak occurred, and the date of the reading.

2.6.1.4 Historical Sample Analysis Data for Tank 241-B-106

A waste analysis was conducted for Tank 241-B-106 in December 1975. The sample was yellow and contained no solids. When the sample was cooled to 5°C, 2% solids were precipitated. A table presenting the results of this analysis is in Appendix H.

2.6.2 Current Status of Tank 241-B-106

Tank 241-B-106 entered service in September 1947 and currently stores 117,000 gal of waste. The waste is comprised of 1,000 gal of supernatant and 116,000 gal of saltcake with no supernatant or pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as sound with interim stabilization and intrusion prevention completed. Tank 241-B-106 is third in the three-tank cascade flow series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-106 has 10 risers and three 12-in. risers (nos. 2, 3, and 7) are available for use.

2.6.2.1 Waste Layer Volume Approximation for Tank 241-B-106

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.6.2.2 In-Tank Photograph 241-B-106

The 1985 assembled photographs of the Tank 241-B-106 interior indicates a thin liquid surface over reddish-brown saltcake (see Appendix I). The picture is hazy (blue tones) but the equipment was identified and labelled. The tank contains about 117,000 gal of waste which converts to slightly more than 3 ft deep. The white spot at the bottom center of the photo is a result of the camera flash. Although a spare inlet nozzle is shown on two pictures, only one nozzle exists. The photographs were taken before the supernatant was pumped from the tank; therefore, the picture may not represent the current waste surface.

2.6.3 Synopsis Tank 241-B-106

(To be completed)

2.7 Tank 241-B-107

2.7.1 241-B-107 Tank History

2.7.1.1 Waste History Tank 241-B-107

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-107 was filled with first-cycle waste from May 1945 to October 1945. The tank cascaded between 1945 and 1946 and again in 1963. From the second quarter of 1945 to the second quarter of 1951, the tank contained first-cycle waste. Between the second quarter of 1952 and the second quarter of 1963, the tank contained evaporator bottoms waste. In the third quarter of 1952, the tank was considered an active bottoms tank. During the second quarter of 1953, the tank received re-evaporated bottoms waste. From the third quarter of 1953 to the first quarter of 1954, the tank waste was classified as first-cycle re-evaporated bottoms waste. In the third quarter of 1954, the tank waste was pumped to a ditch. The tank received U Plant waste and evaporator bottoms waste in the first quarter of 1955. In the third quarter of 1957, in-farm scavenged feed was sent from Tank 241-B-107 to Tank 241-C-101. During the third quarter of 1963, the tank received coating waste. From the fourth quarter of 1963 to the fourth quarter of 1964, the tank contained coating waste. Between the second quarter of 1965 and the second quarter of 1969, the tank contained first-cycle waste, evaporator bottoms waste, and coating waste. In 1972, a P-10 pump was installed in Tank 241-B-107. The tank was assumed to be a suspect leaker in the first quarter of 1973. The tank was removed from service in the second quarter of 1975. In the first quarter of 1977, saltwell pumping was completed. The tank was declared inactive in 1978. Presently, the tank contains non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-107 received first-cycle waste from the second quarter of 1945 until the second quarter of 1946. From the third quarter of 1952 until the fourth quarter of 1954; the tank received saltcake waste from the 242-B Evaporator. During the third quarter of 1963 the tank received PUREX cladding waste. From the second quarter of 1972 until the fourth quarter of 1974 the tank received wastewater.

In the first quarter of 1978, a saltwell was installed in the tank. In the third quarter of 1978, a P-10 pump was removed from the tank. From the first quarter of 1977 to the second quarter of 1979, the tank integrity was questionable. The tank was primary stabilized in 1979. After leaking approximately 8,000 gal, Tank 241-B-107 was declared an assumed leaker in 1980. In the first quarter of 1980, a level adjustment was made. Partial isolation was completed in 1982 and a level adjustment was performed in April 1982. Interim stabilization was completed after saltwell pumping and a level adjustment was made in March 1985. In October 1985,

intrusion prevention was completed. In-tank photographs were taken on the following dates: March 1970, July 1974, February 1979, April 1980, May 1981, April 1982, December 1984, and February 1985. Two pH readings are listed on the level history: 10.2 in July 1945 and 8.9 in September 1957. The current maximum temperature reading from July 1993 is 137° F. Sketch ES-TKS-E17, which shows a graphical representation of the Tank 241-B-107 level history, and the historical waste level data used to make it are in Appendix C.

2.7.1.2 Temperature History 241-B-107

Tank 241-B-107 contains one thermocouple tree with 13 thermocouple probes in riser 3. Thermocouple elevations are not available and no data are available prior to 1975. Thermocouples 1 and 2 have similar readings that span from May 1975 to January 1982. Thermocouples 3 through 11 have readings similar to the first two thermocouples that span from May 1975 to July 1993. Six data points are available for thermocouple 12 but only 3 are available for thermocouple 13. There is a gap in data from January 1982 until July 1989; however, a thermocouple tree was in the tank in February 1985.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 70°F. A sum of the squares regression line fit for the first 11 thermocouples starting in 1975 shows an overall zero slope ± 9.8°F with an average r square value of 0.03. There is an outlying point in July 1989 of 122°F common to thermocouples 3 through 11. Not enough data are available to do an accurate regression analysis of thermocouples 12 and 13. From May 1975 to present, the median temperature is 65°F with a minimum of 50°F and a maximum of 124°F. Tank 241-B-107 has a semiannual temperature monitoring requirement in January and July.

Plots of the thermocouple readings for Tank 241-B-107 are in Appendix D.

2.7.1.3 Integrity of Tank 241-B-107

Tank 241-B-107 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-107 surface level is monitored quarterly with a manual tape through riser 8. The maximum allowable increase from the 55-in. baseline is 2 in. There is no criterion for a decrease. A figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has remained steady with the readings ranging from 54.5 to 55 in.

Tank 241-B-107 does not have a liquid observation well. Four drywells are identified for Tank 241-B-107. Drywells 22-07-02 (active prior to 1990, current readings > 200 c/s), 22-07-05, and 22-07-11 (both no longer active) have or had readings greater than the 50 c/s background radiation.

A graphical representation of the active drywell from January 1990 to the present is in Appendix F. The graph includes the peak c/s, the depth at which the peak occurred, and the date of the reading.

2.7.1.4 Historical Sample Analysis Data for Tank 241-B-107

A waste analysis was conducted for Tank 241-B-107 in April 1976. The sludge sample received in January 1976 was yellowish-brown and soft with crystal-like chunks throughout. The solids in the sludge are about 30 percent water soluble. The analysis indicated that the solids were essentially a mixture of sodium phosphate, sodium sulfate, sodium nitrate, aluminum oxide, and small amounts of sodium nitrite and iron hydroxide. The table presenting the results of this analysis is in Appendix H.

2.7.2 Current Status of Tank 241-B-107

Tank 241-B-107 entered service in May 1945 and currently stores 165,000 gal of waste. The waste is comprised of 1,000 gal of supernatant; 164,000 gal of sludge; and no supernatant with 7,000 gal of pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-107 is equipped to cascade to Tank 241-B-108 and is first in the three-tank cascade series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-107 has 11 risers and four are available for use: three 12-in. risers (nos. 2, 6, and 7), and one 4-in. riser (no. 5).

2.7.2.1 Waste Layer Volume Approximation for Tank 241-B-107

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.7.2.2 In-Tank Photograph 241-B-107

The 1988 photographic montage of the Tank 241-B-107 interior shows an off-white to dark brown sludge surface with pools of supernatant (see Appendix I). The tank contains about 165,000 gal of waste which corresponds to a depth of approximately 4.5 ft. Overall picture quality is very good (favors the blue tones) and the equipment was identified and labelled. The discarded temperature probe has been cut off. Typically, when temperature probe were removed, radiation measurements were taken, and when the radiation limit was reached, the section still remaining in the tank was cut off and dropped into the tank. The photographs were taken before the supernatant was pumped from the tank: therefore, the picture may not represent the current waste surface.

2.7.3 Synopsis Tank 241-B-107
(To be completed)

2.8 Tank 241-B-108

2.8.1 241-B-108 Tank History

2.8.1.1 Waste History Tank 241-B-108

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-108 was filled with first-cycle waste from the fourth quarter of 1945 to January 1946. The tank was receiving and transferring waste via the cascade lines between 1945 and 1946 and in 1963. From the fourth quarter of 1945 to the second quarter of 1951, the tank contained first-cycle waste. Between the second quarter of 1952 until the second quarter of 1963, the tank contained evaporator bottoms waste. On November 30, 1952, Tank 241-B-108 cascaded to Tank 241-B-109. In the first quarter of 1953, the tank was an active bottoms tank. During the third quarter of 1954, waste was pumped to a ditch. In the first quarter of 1955, the tank received U Plant waste and evaporator bottoms waste. In the third quarter of 1957, in-farm scavenged feed was sent from Tank 241-B-108 to Tank 241-C-101. From the second quarter of 1952 to the second quarter of 1963, the tank contained evaporator bottoms waste. Between the fourth quarter of 1963 and the first quarter of 1969, the tank contained evaporator bottoms waste and coating waste. The tank contained ion exchange waste from the fourth quarter of 1969 until the second quarter of 1972. The tank was suspected to be leaking the fourth quarter of 1973. From the second quarter of 1974 to the second quarter of 1976, the tank contained evaporator bottoms waste. Beginning in the fourth quarter of 1976 until the third quarter of 1977, the tank waste was diluted evaporator feed. In 1978, the tank was inactive. Presently, the tank contents are classified as non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-108 received saltcake waste from the 242-B evaporator from the fourth quarter of 1951 until the second quarter of 1953. During the third quarter of 1963, the tank received PUREX cladding waste.

Supernatant pumping and interim stabilization were completed and a level adjustment was made in May 1985. In October 1985, intrusion prevention was completed. In-tank photographs were taken on the following dates: October 1973, two in 1975, January 1976, September 1977, January 1980, October 1983, and May 1985. Two pH readings are listed on the level history: 12.0 in May 1956 and 10.3 in December 1971. The current maximum temperature reading from July 1993 is 62° F. Sketch ES-TKS-E18, which shows a graphical representation of the Tank 241-B-108 level history, and the historical waste level data used to make it are in Appendix C.

2.8.1.2 Temperature History 241-B-108

The single thermocouple tree in Tank 241-B-108 has 12 thermocouple probes to monitor the waste temperature through riser 5. Elevations are available for all the thermocouple probes. No data are currently available prior to 1974. Thermocouples 1, 3 through 6, and 8 through 12 have similar temperature readings that span from 1974 to 1993. Two data points are available for thermocouple 2: one in September 1974 and another in January 1979. Limited temperature data from 1974 to 1980 are available for thermocouple 7. There is a gap in temperature readings from February 1984 to July 1989; however, a thermocouple tree was detected in the tank in August 1985. Review of the Tank 241-B-108 level history indicates that from September 1974 to July 1977, thermocouple probes 1 and 2 were in or near the solids level and thermocouples 3 through 12 were in the vapor space. From July 1977 to April 1985, thermocouple 1 was in or near the solids level, thermocouple 2 was in or near the liquid level, and the remaining probes were in the vapor space. Thereafter, only thermocouple 1 was in the solids level and the remaining thermocouples were in the vapor space.

The mean temperature of the first recorded readings taken was 69°F. A sum of the squares regression line fit for thermocouples 1 and 3 through 12 starting in 1974 shows a slightly negative near zero slope ± 10°F with an average r square value of 0.07. An outlying data point of approximately 101°F is apparent for thermocouples 1, 3 through 6, and 8 through 12 in July 1989. Not enough data are available for an accurate regression and variability analysis on thermocouple 2. From September 1974 to present, the median temperature for the probes is 66°F with a minimum of 50°F and a maximum of 102°F. Tank 241-B-108 has a semiannual temperature monitoring requirement in January and July.

Plots of the thermocouple readings for Tank 241-B-108 are in Appendix D.

2.8.1.3 Integrity of Tank 241-B-108

Tank 241-B-108 is categorized as sound and is interim stabilized with intrusion prevention completed. The Tank 241-B-108 surface level is monitored with a Food Instrument Corporation gauge through riser 8. The gauge is set in the intrusion mode for a 1 in. increase. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted quarterly. The maximum allowable increase from the 30.3-in. baseline is 2 in. There is no criterion for a decrease. Data are not available for a surface level plot due to the Food Instrument Corporation gauge setting.

Tank 241-B-108 does not have a liquid observation well. Five drywells are identified for Tank 241-B-108. Drywell 22-08-02 had activity prior to 1990 with current readings less than 200 c/s.

A graphical representation of the active drywell from January 1990 to the present is in Appendix F. The graph includes the peak c/s, the depth at which the peak occurred, and the date of the reading.

2.8.1.4 Historical Sample Analysis Data for Tank 241-B-108

No data are available or applicable.

2.8.2 Current Status of Tank 241-B-108

Tank 241-B-108 entered service in 1945 and currently stores 94,000 gal of waste. The waste is comprised of 60,000 gal of saltcake and 34,000 gal of sludge with no supernatant or pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as sound with interim stabilization and intrusion prevention completed. Tank 241-B-108 is equipped to cascade to Tank 241-B-109 and is second in the three-tank cascade flow series. The plan view and tank cross-section that depicts the approximate waste level and riser configuration are in Appendix G. Tank 241-B-108 has 11 risers and three 12-in. risers (nos. 3, 6, and 7) are available for use.

2.8.2.1 Waste Layer Volume Approximation for Tank 241-B-108

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.8.2.2 In-Tank Photograph 241-B-108

The 1985 assembled photographs of the Tank 241-B-108 interior indicate a light brown waste material matrix with an excess of a white chemical component interspersed uniformly throughout the matrix (see Appendix I). The surface appears dry. The red areas may be some of the plastic fixing agent (fabri-form) that is used to hold contamination in place during equipment removal. The tank interior and equipment is clearly visible in this picture. The tank contains about 94,000 gal of waste which corresponds to approximately a 2.5 ft depth. The waste level base line was adjusted as a result of the photograph, and since this was the last recorded adjustment, this picture may represent the current tank surface.

2.8.3 Synopsis Tank 241-B-108

(To be completed)

2.9 Tank 241-B-109

2.9.1 241-B-109 Tank History

2.9.1.1 Waste History Tank 241-B-109

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-109 started filling with first-cycle waste in January 1946 and received Tank 241-B-108 cascade waste in 1946. The tank was filled in April 1946 and contained first-cycle waste until the first quarter of 1952. From the first quarter of 1952 until the second quarter of 1963, the tank stored evaporator bottoms waste. In the third quarter of 1954, the waste was pumped to a ditch and the tank was refilled. In the third quarter of 1957, in-farm scavenged feed was pumped from Tank 241-B-109 to Tank 241-C-101. In the fourth quarter of 1963, the tank received coating waste and contained it until the fourth quarter of 1971. The tank contained ion exchange waste from the fourth quarter of 1969 until the fourth quarter of 1963. From the first quarter of 1974 until the second quarter of 1976, the tank contained 244-B Plant waste, ion exchange waste, and evaporator bottoms waste. The waste was classified as evaporator feed concentrate or residual liquor from the third quarter of 1976 until the third quarter of 1977. The tank was declared inactive in 1978. Presently, the tank waste is classified as non-complexed.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-109 received saltcake waste from the 242-B Evaporator from the second quarter of 1952 until the third quarter of 1954. From the fourth quarter of 1952 until the first quarter of 1960, the tank received wastewater. The tank received PUREX cladding waste during the fourth quarter of 1963.

Tank 241-B-109 was declared interim stabilized in April 1985 after supernatant pumping was completed. A level adjustment was made in April 1985 and intrusion prevention was completed in October 1985. In-tank photographs were taken on the following dates: October 1973, several in 1975, July 1977, April 1978, February 1980, February 1981, October 1983, and April 1985. Three pH readings are listed on the level history: 11.9 in May 1965, 10.7 in December 1971, and 12.5 in November 1975. The current maximum temperature reading from July 1993 is 61° F. Sketch ES-TKS-E1, which shows a graphical representation of the Tank 241-B-109 level history, and the historical waste level data used to make it are in Appendix C.

2.9.1.2 Temperature History 241-B-109

The single thermocouple tree in Tank 241-B-109 has 12 thermocouple probes to monitor the waste temperature through riser 1. Elevations are available for all the thermocouple probes. No data are currently available prior to 1974. The thermocouples have

similar readings that span from 1974 to 1993. No data are available from February 1984 to July 1989, although a thermocouple probe was detected in April 1985.

Review of the Tank 241-B-109 level history indicates that from April 1974 to October 1975, there was a liquid level spike where thermocouples 1 and 2 were in or near the solids level, thermocouples 3 through 6 were in or near the liquid level, and thermocouples 7 through 12 appear to have been in the vapor space. From October 1975 to April 1977, there was a temporary liquid increase where thermocouples 1 and 2 were in or near the solids level, thermocouples 3 and 4 were in or near the liquid level, and the rest appear to have been in the vapor space. Thereafter, thermocouples 1 and 2 were in or near the solids level and the remaining thermocouples appear to have been in the vapor space.

The mean temperature of the first recorded readings was 72°F. A sum of the squares regression line fit for the data starting in 1974 shows a slightly negative, near zero slope ± 9°F with an average r square value of 0.14. From April 1974 to the present, the median temperature from all probes over the time span of available data is 69°F with a minimum of 53°F and a maximum of 104°F. Tank 241-B-109 has a semiannual temperature monitoring requirement in January and July.

Plots of the thermocouple readings in Tank 241-B-109 are in Appendix D.

2.9.1.3 Integrity of Tank 241-B-109

Tank 241-B-109 is categorized as sound and is interim stabilized with intrusion prevention completed. The Tank 241-B-109 surface level is monitored quarterly with a manual tape through riser 3. The maximum allowable increase from the 42-in. baseline is 2 in. There is no criterion for a decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level readings for the past 3 years have increased steadily 41 in. during the first and second quarters of 1991 to 41.5 in. during the third and fourth quarters of 1993.

Tank 241-B-109 does not have a liquid observation well. Three drywells are identified for Tank 241-B-109. None of the drywells have or had readings greater than the 50 c/s background radiation.

2.9.1.4 Historical Sample Analysis Data for Tank 241-B-109

A waste analysis was conducted for Tank 241-B-109 in November 1975. The sample was a yellow liquid and when it cooled to 5°C, no solids precipitated. A table presenting the results of this analysis is in Appendix H.

2.9.2 Current Status of Tank 241-B-109

Tank 241-B-109 entered service in January 1946 and currently stores 127,000 gal of waste. The waste is comprised of 30,000 gal of unknown waste; 13,000 gal of sludge; and 84,000 gal of saltcake with no pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated and is categorized as sound with interim stabilization and intrusion prevention completed. Tank 241-B-109 is third in the three-tank cascade series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-109 has 11 tank dome risers and two 12-in. risers, (no. 2 and no. 7) are available for use.

2.9.2.1 Waste Layer Volume Approximation for Tank 241-B-109

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.9.2.2 In-Tank Photograph 241-B-109

The 1985 photographic montage of the Tank 241-B-109 interior indicates a primarily black mottled surface and a smaller amount of a white solid salt like material with no visible liquid (see Appendix I). The tank contains about 127,000 gal of waste which corresponds to a depth of approximately 3.5 ft. The waste level base line was adjusted as a result of the photograph, and since this was the last recorded adjustment, this picture may represent the current tank contents.

2.9.3 Synopsis Tank 241-B-109

(To be completed)

2.10 Tank 241-B-110

2.10.1 241-B-110 Tank History

2.10.1.1 Waste History Tank 241-B-110

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-110 started to fill with second-cycle waste from May 1945 until the third quarter of 1952. The tank cascaded between 1945 and 1953. The tank was filled in December 1945; however, the second-cycle waste was cribbed in 1950. After receiving more second-cycle waste, the tank began cascading and received cell 5-6 waste, first-cycle and second-cycle waste, and evaporator bottoms waste from B Plant flushes until the fourth quarter of 1956. The supernatant from the tank was cribbed in the second quarter of 1954. Between the first quarter of 1957 and the second quarter of 1963, the tank received cell 5-6 waste. From the fourth quarter of 1963 until the third quarter of 1968, the tank received fission product waste. During 1968 and the first two quarters of 1969, the tank received evaporator bottoms waste. Beginning in the fourth quarter of 1968, the tank received and contained B Plant low-level waste until the fourth quarter of 1971. Ion exchange waste began to fill the tank from the second quarter of 1969 until the second quarter of 1972. The tank became a suspect leaker in the first quarter of 1973 and was removed from service in the second quarter of 1975. Presently, the tank contains non-complexed waste.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-110 received second-cycle waste from the second quarter of 1945 until the first quarter of 1953. From the fourth quarter of 1961 until the fourth quarter of 1963, the tank received decontamination waste. The tank received PUREX high-level waste from the second quarter of 1964 until the third quarter of 1967. During the first quarter of 1968, the tank received saltcake waste from the in-tank solidification units. During the third quarter of 1969 the tank received cesium recovery waste. From the second quarter of 1970 until the fourth quarter of 1974, the tank received wastewater.

Saltwell pumping began in 1972 and was completed in 1978. The tank was declared inactive in 1978 and was assumed to be leaking in 1984 with a leak volume of 10,000 gals. Interim stabilization was completed in December 1984, a level adjustment was made in April 1985, and intrusion prevention was in place in October 1985. In-tank photographs were taken on the following dates: July 1974, September 1979, January 1981, December 1984, and March 1988. There were two pH readings: 9.6 in July 1945 and 7.2 in January 1947. The current maximum temperature reading from July 1993 is 68° F. Sketch ES-TKS-E20, which shows a graphical representation of the Tank 241-B-110 level history, and the historical waste level data used to make it are in Appendix C.

2.10.1.2 Temperature History 241-B-110

The single thermocouple tree in Tank 241-B-110 contains 12 thermocouple probes to monitor the waste temperature through riser 8. Elevations are not available for this tank. No data are currently available prior to 1975. Thermocouples 1 through 4 have similar temperature readings that span from 1975 to 1982. Thermocouples 5 through 11 show the same trends as the first 4 thermocouples and span from 1975 to 1993. Only three data points are available for thermocouple 12. No data are available from April 1982 to July 1989; however, a thermocouple tree was detected in the tank in March 1988.

The mean temperature of the first recorded data for thermocouples 1 through 8 was 79°F. A sum of the squares regression line fit for the first 11 thermocouples starting in 1975 shows an overall zero slope ± 10.83°F with an average r square value of 0.002. The data shows distinct 5 to 10°F high and low variations around the average temperature. There is an outlying data point in July 1989 of approximately 105°F. Not enough data points exist in thermocouple 12 for an accurate regression and variability analysis. From May 1975 to present, the median temperature from all the probes over the time span is 75°F with a minimum of 55°F and a maximum of 121.2°F. Tank 241-B-110 requires semiannual temperature monitoring in January and July.

Plots of the thermocouple data for Tank 241-B-110 are in Appendix D.

2.10.1.3 Integrity of Tank 241-B-110

Tank 241-B-110 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-110 surface level is monitored quarterly with a manual tape through riser 5 and a photographic evaluation. The maximum allowable increase from the 85.25-in. baseline is 2 in. There is no criterion for a decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. Surface level monitoring was out of compliance from January of 1993 to November of 1993. Data for the plot was obtained before the surface level monitoring resumed. The surface level has remained steady with the readings ranging from 87.25 to 85 in. On January 2, 1994, a reading of 85.5 in. was obtained (not shown on plot).

Tank 241-B-110 does not have a liquid observation well. Four drywells are identified for Tank 241-B-110. Drywells 20-10-02 (active prior to 1990, current readings > 200 c/s), 20-10-07 (active prior to 1990, current readings > 200 c/s), 20-10-09 (active prior to 1990, current readings < 200 c/s), and 20-10-12 (active prior to 1990, current readings > 200 c/s) have readings greater than the 50 c/s background radiation. Graphical representations of the active drywells from January 1990 to the present is in Appendix F. Each graph includes the peak c/s (some

wells have multiple peaks), the depth at which the peak occurred, and the date of the reading.

2.10.1.4 Historical Sample Analysis Data for Tank 241-B-110

No data are available or applicable.

2.10.2 Current Status of Tank 241-B-110

Tank 241-B-110 entered service in May 1945 and currently stores 246,000 gal of non-complexed waste. The waste is comprised of 1,000 gal of supernatant; 245,000 gal of sludge; and no saltcake with 17,000 gal of pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-110 is equipped to cascade to Tank 241-B-111 and is first in the three-tank cascade series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-110 has 12 risers and four are available for use: three 12-in. risers (nos. 3, 6, and 7) and one 4-in. riser (no. 4).

2.10.2.1 Waste Layer Volume Approximation for Tank 241-B-110

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.10.2.2 In-Tank Photograph 241-B-110

The 1988 assembled photographs of the Tank 241-B-110 interior indicates a dry, cracked, brown solid surface (see Appendix I). The photos are very hazy which obscures many details (especially toward the far side of the tank). All visible equipment has been identified and labelled. The tank contains about 246,000 gal of waste which converts to slightly more than 7 ft deep. No waste has been added to or removed from this tank since these photos were taken; therefore, the picture should represent the current tank contents.

2.10.3 Synopsis Tank 241-B-110

(To be completed)

2.11 Tank 241-B-111

2.11.1 241-B-111 Tank History

2.11.1.1 Waste History Tank 241-B-111

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-111 was filled with second-cycle waste from December 1945 to April 1946. The tank received and/or transferred waste in the cascade lines between 1945 and 1954. From the fourth quarter of 1945 to the third quarter of 1952, the tank contained second-cycle waste. Waste was cribbed in the second quarter of 1950 and in July 1950, Tank 241-B-111 was filled again. In the second quarter of 1954, supernatant waste was cribbed. From the fourth quarter of 1952 until the third quarter of 1954, the tank contained cell 5-6 waste, first-cycle waste, second-cycle waste, and evaporator bottoms waste. During 1953, the tank received B Plant flushes. In the second and third quarters of 1954, Tank 241-B-111 contained several wastes. Between the fourth quarter of 1954 and the second quarter of 1955, the tank contained evaporator bottoms waste. From the second through fourth quarters of 1956, the tank contained cell 5-6 waste, first-cycle waste, and second-cycle waste. Between the second quarter of 1956 and the second quarter of 1957, the tank received B plant flush water. Tank 241-B-111 contained cell 5-6 waste from the first quarter of 1957 to the second quarter of 1963. From the fourth quarter of 1963 to the fourth quarter of 1967, the tank contained fission product waste. In the fourth quarter of 1967 and the first quarter of 1968, the tank contained cell 23 concentrated bottoms recycle, fission product waste, and evaporator bottoms waste. From the fourth quarter of 1967 until the first quarter of 1968, Tank 241-B-111 contained fission product waste and evaporator bottoms waste. From the second quarter of 1968 to the third quarter of 1969, the tank contained evaporator bottoms waste. Between the third quarter of 1969 and the second quarter of 1976, the tank contained evaporator bottoms waste and ion exchange waste. In the second quarter of 1976, the tank was removed from service. The tank waste was classified as dilute evaporator feed in the fourth quarter of 1976. During the second and third quarters of 1977, the tank was inactive with a minimum heel. In 1978, Tank 241-B-111 was considered an assumed leaker after leaking approximately 8,000 gal. The tank was inactive in 1978. Presently, the tank waste is classified as non-complexed.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-111 received wastewater from the second quarter of 1957 until the second quarter of 1970. From the fourth quarter of 1961 until the second quarter of 1962,the tank received decontamination waste. The tank received PUREX high-level waste from the second quarter of 1965 until the third quarter of 1967. From the third quarter of 1969 until the second quarter of 1970 the tank received cesium recovery waste.

A level adjustment was made in January 1984. In June 1985, supernatant was pumped, the tank was declared interim stabilized, and a level adjustment was made. In October 1985, intrusion prevention was completed. In-tank photographs were taken on the following dates: November 1978, April 1981, May 1984, and June 1985. There were two pH readings: 6.5 in January and 10.2 in December 1971. The current maximum temperature reading from July 1993 is 86° F. Sketch ES-TKS-E21, which shows a graphical representation of the Tank 241-B-111 level history, and the historical waste level data used to make it are in Appendix C.

2.11.1.2 Temperature History 241-B-111

Tank 241-B-111 contains a single thermocouple tree with 12 thermocouples to monitor the waste temperature through riser 8. There are no specific thermocouple probe elevations for this tank. No data are available prior to 1975. All the thermocouples have similar temperature readings that span from 1975 to 1993. No data are availabel from April 1983 to July 1989, although a thermocouple tree was present in June 1985.

The mean temperature of the first recorded data from thermocouples 1 through 11 was 85°F. A sum of the squares regression line fit of all the thermocouples shows a slightly negative, near zero slope ± 9.4°F with an average r square value of 0.13. Distinct 5 to 10°F high and low variations around the average temperature are unique to this data. From April 1975 to the present, the median temperature is 81°F with a minimum of 55°F and a maximum of 98°F. Tank 241-B-111 is a low-heat load non-watch list tank with a semiannual temperature monitoring requirement for January and July.

Plots of the thermocouple readings for Tank 241-B-111 are in Appendix D.

2.11.1.3 Integrity of Tank 241-B-111

Tank 241-B-111 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-111 surface level is monitored with a Food Instrument Corporation gauge through riser 1. The gauge is set in the intrusion mode for a 1-in. increase. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted quarterly and the maximum allowable increase from the 84.4-in baseline is 2 in. There is no criterion for a decrease. Data are not available for a surface level plot due to the Food Instrument Corporation gauge setting.

Tank 241-B-111 does not have a liquid observation well. One drywell is identified for Tank 241-B-111. Drywell 20-11-09 was active prior to 1990 and currently has readings less than 200 c/s.

A graphical representation of the active drywell from January 1990 to the present is in Appendix F. The graph includes the peak

c/s, the depth at which the peak occurred, and the date of the reading.

2.11.1.4 Historical Sample Analysis Data for Tank 241-B-111

No data are available or applicable.

2.11.2 Current Status of Tank 241-B-111

Tank 241-B-111 entered service in November 1945 and currently stores 237,000 gal of non-complexed waste. The waste is comprised of 1,000 gal of supernatant; 236,000 gal of sludge; and no saltcake with 16,000 gal of pumpable liquid remaining. The tank is identified as a low-heat load tank , is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-111 is equipped to cascade to Tank 241-B-112 and is second in the three-tank cascade flow series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-111 has 11 risers and three are available for use: two 12-in. risers (no. 3 and no. 6), and one 4-in. riser (no. 4).

2.11.2.1 Waste Layer Volume Approximation for Tank 241-B-111

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.11.2.2 In-Tank Photograph 241-B-111

The 1985 assembled photographs of the Tank 241-B-111 interior indicates a very dark brown sludge surface with pockets of supernatant (see Appendix I). The photographs are strongly biased from blue tones which making it difficult to determine waste surface attributes. The tank contains about 237,000 gal of waste which converts to a depth of approximately 7 ft. Equipment which is visible has ben identified and labelled. The recirculating dip tube was cut off at the dome and sealed. The waste level base line was adjusted as a result of the photograph, and since this was the last recorded adjustment, this picture may represent the current tank contents.

2.11.3 Synopsis Tank 241-B-111

(To be completed)

2.12 Tank 241-B-112

2.12.1 241-B-112 Tank History

2.12.1.1 Waste History Tank 241-B-112

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-112 was filled with second-cycle waste from April 1946 to August 1946. From the second quarter of 1946 to the third quarter of 1952, the tank contained second-cycle waste. The waste was cribbed in the second quarter of 1948, the first and fourth quarters of 1950, and the first quarter of 1951. From the second quarter of 1951 until the second quarter of 1954, the tank continually overflowed to a crib. From the fourth quarter of 1952 to the fourth quarter of 1956, Tank 241-B-112 contained cell 5-6 waste, first-cycle waste, and second-cycle waste. Between the first quarter of 1957 and the second quarter of 1963, the tank contained cell 5-6 waste. In the first three quarters of 1957, the tank was contaminated with evaporator bottoms waste. In the fourth quarter of 1957, scavenged feed was sent to Tank 241-C-101. In the fourth quarter of 1960, Tank 241-B-112 indicated an unexplained decrease in waste. Between the fourth quarter of 1963 and the third quarter of 1967, the tank contained fission product waste. The tank contained cell 23 concentrated feed in the fourth quarter of 1967. From the fourth quarter of 1968 until the first quarter of 1969, the tank contained B Plant low-level waste and evaporator bottoms waste. The tank contained evaporator bottoms waste in the second quarter of 1969. From the third quarter of 1969 to the fourth quarter of 1972, the tank contained evaporator bottoms waste and ion exchange waste. Between the first quarter of 1973 and the second quarter of 1976, the tank contained evaporator bottoms waste. The evaporator bottoms waste consisted of bottoms and recycle from the in-tank solidification process in the BY Tank Farm. The tank contained evaporator feed concentrate in the third and fourth quarters of 1976 and the first and second quarters of 1977. The tank was inactive in 1978 but was declared an assumed leaker after leaking approximately 8,000 gal of waste. The tank waste is presently classified as non-complexed.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-112 received decontamination waste during the fourth quarter of 1962. From the second quarter of 1969 until the first quarter of 1972, the tank received wastewater.

Interim stabilization was completed after supernatant pumping, and a level adjustment was made in May 1985. Intrusion prevention was completed in June 1985. In-tank photographs were taken on the following dates: April 1974, October 1975, December 1979, October 1983, and May 1985. Three pH readings, 9.3 in May 1955, 11.2 in November 1971, and >14.0 in June 1976. The current maximum temperature reading from July 1993 is 63° F. Sketch ES-TKS-E2,

which shows a graphical representation of the Tank 241-B-112 level history, and the historical waste level data used to make it are in Appendix C.

2.12.1.2 Temperature History 241-B-112

Tank 241-B-112 has a single thermocouple tree with 12 thermocouple probes to monitor the waste temperature through riser 1. Elevations are available for all the thermocouple probes. No data are available prior to 1974. Thermocouples 1, 3, and 5 through 12 have similar temperature readings that span from 1974 to 1993. Thermocouples 2 and 4 have only 6 temperature measurements for this period. No date are available from from June 1983 to July 1989, although a thermocouple tree was noted to be present in May 1985. Review of the Tank 241-B-112 level history indicates that from September 1974 to July 1977, thermocouples 1 through 5 were in or near the liquid level and thermocouples 6 through 12 were in the vapor space. After July 1977, all of the thermocouple probes appear to have been in the vapor space.

The mean temperature of the first daily readings recorded was 77°F. A sum of the squares regression line fit for thermocouples 1, 3, and 5 through 12 starting in 1974 shows a slightly negative, near zero slope ± 10°F with an average r square value of 0.22. Thermocouples 2 and 4 have very few data points over a very small time period which renders regression and variability analysis inaccurate. From September 1974 to the present, the median probe temperature over the time span of available data is 76°F with a minimum of 56°F and a maximum of 101°F. Tank 241-B-112 is a low-heat load tank with a semiannual temperature monitoring requirement for January and July.

Plots of the thermocouple readings for Tank 241-B-112 are in Appendix D.

2.12.1.3 Integrity of Tank 241-B-112

Tank 241-B-112 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-112 surface level is monitored with a Food Instrument Corporation gauge through riser 4. If the Food Instrument Corporation gauge fails, manual field measurements will be conducted quarterly. The maximum allowable deviations from the 7.6-in. baseline are a 2-in. increase and a 2-in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level plot depicts an increasing trend with the readings ranging from 7.3 to 7.5 in. during the first quarter of 1991 and increasing from 7.8 to 7.9 in. during the fourth quarter of 1993.

Tank 241-B-112 does not have a liquid observation well. Five drywells are identified for Tank 241-B-112. Drywells 20-12-03 (no longer active) and 20-12-06 (active prior to 1990, current readings

< 200 c/s) have or had readings greater than the 50 c/s background radiation.

A graphical representation of the active drywell from January 1990 to the present is in Appendix F. The graph includes the peak c/s, the depth at which the peak occurred, and the date of the reading.

2.12.1.4 Historical Sample Analysis Data for Tank 241-B-112

No tabular data are available. A report written in November 1983 regarding pumping of supernatant from tanks stated that Tank 241-B-112 contained 8,800 gal of supernatant which needed to be pumped out. The liquid supernatant was described as clear and there was a small amount of solid waste around the edge of the tank.

2.12.2 Current Status of Tank 241-B-112

Tank 241-B-112 entered service in April 1946 and currently stores 33,000 gal of waste. The waste is comprised of 3,000 gal of supernatant; 16,000 gal of saltcake; and 14,000 gal of sludge with no pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-112 is third in the three-tank cascade flow series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank-B-112 has 11 tank dome risers and three 2-in. risers (nos. 2, 3, and 7) are available for use.

2.12.2.1 Waste Layer Volume Approximation for Tank 241-B-112

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.12.2.2 In-Tank Photograph 241-B-112

Most of the photographs which make up the 1985 montage for Tank 241-B-112 interior are not clear enough to allow interpretation of details. The best photos indicate a layer of dark supernatant covering a brown/black sludge. The tank contains approximately 33,000 gal of waste which in this tank converts to just under 1 ft in depth. The waste level base line was adjusted as a result of the photograph, and since this was the last recorded adjustment, this picture may represent the current tank contents.

2.12.3 Synopsis Tank 241-B-112

(To be completed)

2.13 Tank 241-B-201

2.13.1 241-B-201 Tank History

2.13.1.1 Waste History Tank 241-B-201

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-201 began filling with 224 Evaporator waste in 1952 and was actively cascading to a crib. The tank received 224 waste and metal waste from the last quarter of 1952 until the third quarter of 1953. From the fourth quarter of 1953 until the third quarter of 1974, the tank contained 224 Evaporator waste. The tank was identified as a suspect leaker in the first quarter of 1973. Presently, the tank waste is classified as non-complexed.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-201 received wastewater during the fourth quarter of 1974.

Saltwell pumping began in 1974 and was completed in 1975. In the second quarter of 1975, Tank 241-B-201 was removed from service. The tank integrity was questionable in the first quarter of 1977 and again in 1979. The tank was declared inactive and was primary stabilized in the first quarter of 1978. A P-10 pump was removed from the tank in 1978. A level adjustment occurred in 1979 and in April 1982. Tank 241-B-201 was considered an assumed leaker in 1980 with an assumed leak of 1,200 gal. Intrusion prevention and interim stabilization were completed in May 1981. In-tank photographs were taken on the following dates: two in 1974, September 1977, February 1980, February 1982, and November 1986. The current maximum temperature reading from July 1993 is 60° F. Sketch ES-TKS-E23, which shows a graphical representation of the Tank 241-B-201 level history, and the historical waste level data used to make it are in Appendix C.

2.13.1.2 Temperature History 241-B-201

The single thermocouple tree has 12 thermocouple probes to monitor the waste temperature. Thermocouple probe elevations are not available for this tank. The thermocouples have similar temperature readings that span from 1975 to 1993. No readings were taken between April 1978 and July 1989; however, two thermocouple trees were detected in the tank in November 1986.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 63°F. A sum of the squares regression line fit for the data shows a slight decrease in temperature with a moderate amount of variability. There is an outlying data point of approximately 108°F in July 1989. The median temperature from all the probes over the time span of available data is 62°F with a minimum of 53°F and a maximum of 112°F. Tank

241-B-201 has a semiannual temperature monitoring requirement for January and July.

Plots of thermocouple readings for Tank 241-B-201 are in Appendix D.

2.13.1.3 Integrity of Tank 241-B-201

Tank 241-B-201 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-201 surface level is monitored daily with a manual tape through riser 8. The maximum allowable deviations from the 157-in. baseline (established on October 31, 1993) are a 2-in. increase and a 3 in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. Since October 31, 1993, the surface level readings have ranged between 151.5 and 157.25 in., and two readings have violated the surface decrease limits (i.e., 151.5 and 152 in.). The 5.25-in. required addition to the CASS reading was not done, although it is necessary because the new surface level tape is too short. The two readings are within the acceptable range when the 5.25-in. are added.

Tank 241-B-201 has no liquid observation well or drywells.

2.13.1.4 Historical Sample Analysis Data for Tank 241-B-201

A waste analysis for Tank 241-B-201 was conducted in December 1978. The sample was black and had the consistency of soft grease. The table presenting the results of the analysis is in Appendix H.

2.13.2 Current Status of Tank 241-B-201

Tank 241-B-201 was constructed in 1943-44 and currently stores 29,000 gal of waste. The waste is comprised of 1,000 gal of supernatant and 28,000 gal of sludge with no pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-201 is not in a cascade series. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-201 has 8 risers and two 12-in. risers, no. 2 and no.7, are available for use.

2.13.2.1 Waste Layer Volume Approximation for Tank 241-B-201

Most tank features in this 1986 assembled photographs are indistinct or hazy (see Appendix I). It appears that the waste is composed of a reddish-brown sludge. Some equipment has be identified and labelled. The tank contains about 29,000 gal of waste which corresponds with a depth of approximately 12.5 ft. No waste has been added to or removed from this tank since these photographs were taken; therefore, the picture should represent the

current tank contents. The 1977 picture shows the tank interior more clearly.

2.13.2.2 In-Tank Photograph 241-B-201

The Tank 241-B-201 photo in Appendix I shows a supernatant surface over a reddish-brown sludge. The tank contains about 29,000 gal of waste which converts to approximately 12.5 ft deep. The haziness of the photo is a result of poor film quality.

2.13.2.3 Synopsis Tank 241-B-201

(To be completed)

2.14 Tank 241-B-202

2.14.1 241-B-202 Tank History

2.14.1.1 Waste History Tank 241-B-202

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-202 began filling with 224 waste in 1951 and was actively cascading to a crib from the first quarter of 1951 until the second quarter of 1955. The tank received 224 waste and metal waste from the last quarter of 1952 to the third quarter of 1953. From the fourth quarter of 1953 to the second quarter of 1976, the tank contained 224 waste. The tank received cell 5-6 water and cascaded to a crib in the fourth quarter of 1954. In the third quarter of 1955, the tank received B Plant flush water and cascaded to a crib. During the third quarter of 1976, use of Tank 241-B-202 was restricted. The tank was considered inactive during the first quarter of 1978. Presently, the tank waste is classified as non-complexed.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-202 received B Plant high-level waste during the second quarter of 1962.

A level adjustment was made in April 1982 and again in January 1984. The tank was interim stabilized in May 1985. Intrusion prevention was in place in June 1985. In 1990, adjustments were made due to past inconsistencies. In-tank photographs were taken on the following dates: two in 1977, February 1980, May 1983, May 1985, and November 1986. There were two pH readings: 9.9 in November 1971 and 9.5 in October 1975. The current maximum temperature reading from July 1993 is 61° F. Sketch ES-TKS-E24, which shows a graphical representation of the Tank 241-B-202 level history, and the historical waste level data used to make it are in Appendix C.

2.14.1.2 Temperature History 241-B-202

The single thermocouple tree has 12 thermocouple probes to monitor the waste temperature. Thermocouple probe elevations are not available at this time. Thermocouples 1 through 11 have similar readings that span from 1975 to 1993. Thermocouple 12 has five data points in the same temperature range as the others. Although two thermocouple trees were in the tank in May 1985, only one thermocouple probe reading was recorded (April 1982) between April 1979 and July 1989.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 72°F. A sum of the squares regression line fit for the data shows a slight temperature decrease with a moderate amount of variability. An outlying data point of 108°F is present in July 1989. The median probe

temperature over the time span of available data is 63°F with a minimum of 51°F and a maximum of 110°F. Tank 241-B-202 has a semiannual temperature reading requirement for January and July.

Plots of the thermocouple readings for Tank 241-B-202 are in Appendix D.

2.14.1.3 Integrity of Tank 241-B-202

Tank 241-B-202 is categorized as sound and is interim stabilized with intrusion prevention completed. The Tank 241-B-202 surface level is monitored with a manual tape through riser 8 on a daily basis. Liquid waste volume is determined by a photographic evaluation and solid waste volume is determined by a manual tape surface level gauge. The maximum allowable deviations from the 145.25-in. baseline are a 2-in. increase and a 3-in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has a positive trend. The surface level during the first quarter of 1991 was 144 in. and had steadily increased to 145.5 in. by the fourth quarter of 1993.

An occurrence report was issued in February 1993 due to the increasing surface level exceeding the criteria. A new photograph package was initiated in May 1993 to investigate the possibility of intrusion. A temporary 145.25-in. baseline value was established to remove the tank from the alert list.

Tank 241-B-202 does not have a liquid observation well or drywells.

2.14.1.4 Historical Sample Analysis Data for Tank 241-B-202

Two waste analyses for Tank 241-B-202 were conducted: one in December 1975 and the other in December 1978. In 1975, a clear liquid was sampled that contained no solids even when cooled to 5°C. The sample taken in 1978 was black with the consistency of soft grease. The two tables presenting the results of these analyses are in Appendix H.

2.14.2 Current Status of Tank 241-B-202

Tank 241-B-202 was constructed in 1943-44 and currently stores 27,000 gal of waste. The waste is comprised entirely of sludge with no pumpable liquid remaining. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as sound with interim stabilization and intrusion prevention completed. Tank 241-B-202 is not in a cascade flow series, but was connected to Tank 241-B-203 with a tie line. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-202 has 9 risers and four are available for use: three 12-in. risers (nos. 2, 3, and 6), and one 4-in. riser (no. 5).

2.14.2.1 Waste Layer Volume Approximation for Tank 241-B-202

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.14.2.2 In-Tank Photograph 241-B-202

The 1985 assembled photographs of the Tank 241-B-202 interior indicates a dark orange supernate with a bright yellow sludge waste surface (see Appendix I). The tank contains about 27,000 gal of waste which corresponds with a depth of approximately 11.5 ft. The camera flash is clearly visible to the left of the temperature probe. A level adjustment was done in 1990; therefore, this picture may not correspond with the current tank interior. The 1977 picture shows the tank interior more clearly.

2.14.3 Synopsis Tank 241-B-202

(To be completed)

2.15 Tank 241-B-203

2.15.1 241-B-203 Tank History

2.15.1.1 Waste History Tank 241-B-203

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-203 began filling with 224 waste in 1952. The tank was receiving waste from Tank 241-B-204 and transferring waste to Tank 241-B-202, via the lines between the tanks, from the second quarter of 1952 until the first quarter of 1953. The tank was also actively cascading to a crib during this time. The tank received 224 B Plant waste and metal waste from the fourth quarter of 1952 to the third quarter of 1953. From the fourth quarter of 1953 to the second quarter of 1976, the tank contained 224 waste. In the third quarter of 1976, tank use was restricted with no intention for reuse. In 1977, the tank was inactive and a level adjustment was made. Presently, the waste is classified as non-complexed.

Tank 241-B-203 has no primary additions according to the "Waste Status and Transaction Record Summary" (Agnew 1994) report.

Tank 241-B-203 was declared an assumed leaker in 1983. A level adjustment was made in January 1984 and the tank was interim stabilized in June 1984. Intrusion prevention was in place in June 1985. A level adjustment was made in April 1990. In-tank photographs were taken on the following dates: July 1977, March 1979, February 1980, September 1981, July 1983, and November 1986. There is a pH reading of 10.2 in November 1971. The current maximum temperature reading from July 1993 is 62° F. Sketch ES-TKS-E25, which shows a graphical representation of the Tank 241-B-203 level history, and the historical waste level data used to make it are in Appendix C.

2.15.1.2 Temperature History 241-B-203

Tank 241-B-203 contains a single thermocouple tree with 12 thermocouple probes to monitor the waste temperature. Thermocouple probe elevations are not available at this time. Thermocouples 1 through 11 have similar temperature readings that span from 1975 to 1993. Thermocouple 12 has only four data points from 1975 to 1982. Although two thermocouple trees were in the tank in November 1986, only one thermocouple probe reading was recorded (April 1982) between April 1979 and July 1989.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 72°F. A sum of the squares regression line fit for the data shows a slight decrease in temperature with a small to moderate amount of variability. There is an outlying point of approximately 109°F in July 1989. The median probe temperature over the time span of available data is 63°F with a minimum of 48°F and a maximum of 110°F. Tank 241-B-203

is scheduled for semiannual temperature readings in January and July.

Plots of the thermocouple readings for Tank 241-B-203 are in Appendix D.

2.15.1.3 Integrity of Tank 241-B-203

Tank 241-B-203 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-203 surface level is monitored daily with a manual tape through riser 8. Liquid waste volume and solid waste volume are determined by a photographic evaluation and manual tape surface level gauge. The maximum allowable deviations from the 260-in. baseline value are a 2-in. increase and a 2-in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years has remained steady with the reading ranging between 260.5 and 259.75 in. The plot indicates an inaccurate data point with an apparent rerun.

Tank 241-B-203 has no liquid observation well or drywells.

2.15.1.4 Historical Sample Analysis Data for Tank 241-B-203

Three waste analyses for Tank 241-B-203 were conducted between December 1978 and January 1983. The 1978 sample was black with the consistency of soft grease. The December 1982 sample contained approximately 10% brown settled solids when received. The solids were 25% by weight water-soluble. After acid dissolution, analysis by X-ray emission indicated that the major solids components were bismuth, barium, lanthanum, and iron. Manganese was a minor component. Diffraction analysis indicated that the solids were non-crystalline in structure. The water-soluble fraction was believed to be nitrates, and the acid- fraction was believed to be the oxide forms of metallic salts. Four tables presenting the results of these analyses are in Appendix H.

2.15.2 Current Status of Tank 241-B-203

Tank 241-B-203 was constructed in 1943-44 and currently stores 51,000 gal of waste. The waste is comprised of 1,000 gal of supernatant, and 50,000 gal of sludge with no saltcake or pumpable liquid. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-203 is not in a cascade flow series but was connected to Tank 241-B-202 and -204 with tie lines. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-203 has 9 risers and four are available for use: three 12-in. risers (nos. 2, 3, and 6), and one 4-in. riser (no. 5).

2.15.2.1 Waste Layer Volume Approximation for Tank 241-B-203

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.15.2.2 In-Tank Photograph 241-B-203

The 1986 assembled photographs of the Tank 241-B-203 interior indicate a thin supernate surface with dark brown sludge underneath (see Appendix I). The tank contains approximately 51,000 gal of waste which converts to a depth of a little over 21 ft. Because of the high waste level and the flat dome, the photos were taken horizontally across the tank; therefore, both the waste surface and tank dome appear in the montage. The inlet nozzle and temperature probe were overexposed because they were too close to the flash. A level adjustment was done in 1990 as a result of the photographs; therefore, this picture may not correspond with the current tank interior. The 1977 picture shows the tank interior more clearly.

2.15.3 Synopsis Tank 241-B-203

(To be completed)

2.16 Tank 241-B-204

2.16.1 241-B-204 Tank History

2.16.1.1 Waste History Tank 241-B-204

The waste history narrative in the following paragraph is from "A History of the 200 Area Tank Farms" (Anderson 1990). Tank 241-B-204 began filling with 224 waste in 1952. The tank received waste from Tank 241-B-203 via the tie line and was actively cascading to a crib from the second quarter of 1952 until the first quarter of 1953. The tank received 224 B Plant waste and metal waste from the fourth quarter of 1952 to the third quarter of 1953. From the fourth quarter of 1953 to the second quarter of 1976, the tank contained 224 waste. From the second quarter of 1978 to the present, the tank waste was classified as non-complexed. Tank 241-B-204 was removed from service during the first quarter of 1976 with no intention for reuse. During the first quarter of 1977, tank use was restricted and at the beginning of 1978 the tank was considered inactive. Presently, the waste is classified as non-complexed.

The waste histroy narrative of the primary additions that follow in this paragraph are from the "Waste Status and Transaction Record Summary" (Agnew 1994). Tank 241-B-204 received 224 waste from the second quarter of 1952 until the first quarter of 1953.

A level adjustment was completed in April 1982 and in April 1990. Tank 241-B-204 was considered an assumed leaker in 1984 with an assumed leak of 400 gal. The tank was interim stabilized in June 1984 and intrusion prevention was in place in June 1985. In-tank photographs were taken on the following dates: July 1977, October 1979, May 1983, June 1984, and October 1987. A pH reading of 10.3 in November 1971. The current maximum temperature reading from July 1993 is 62°F. Sketch ES-TKS-E26, which shows a graphical representation of the Tank 241-B-204 level history, and the historical waste level data used to make it are in Appendix C.

2.16.1.2 Temperature History 241-B-204

Tank 241-B-204 contains a single thermocouple tree with 12 thermocouple probes to monitor the waste temperature. Thermocouple probe elevations are not available at this time. Thermocouples 1 through 11 have similar temperature readings that span from 1975 to 1993. Only three recorded data points are available for thermocouple 12. No data are available from April 1982 to July 1989, although a thermocouple tree was present in October 1987.

The mean temperature of the first recorded data for thermocouples 1 through 11 was 70°F. A sum of the squares regression line fit for thermocouples 1 through 11 shows a slight temperature decrease with a small to moderate amount of variability. Not enough data for thermocouple 12 are available for an accurate regression and variability analysis. There is an

outlying data point of approximately 108°F in July 1989. The median probe temperature over the time span of available data is 62°F with a minimum of 45°F and a maximum of 110°F. Tank 241-B-204 has a semiannual temperature reading requirement in January and July.

Plots of the thermocouple readings for Tank 241-B-204 are in Appendix D.

2.16.1.3 Integrity of Tank 241-B-204

Tank 241-B-204 is categorized as an assumed leaker and is interim stabilized with intrusion prevention completed. The Tank 241-B-204 surface level is monitored daily with a manual tape through riser 8. Liquid waste volume is determined by a photo evaluation and solid waste volume is determined by a manual tape surface level gauge. The maximum allowable deviations from the 256.5-in. baseline are a 2-in. increase and 2-in. decrease. The figure that graphically represents the surface level measurements from January 1991 to the present is in Appendix E. The surface level for the past 3 years remained steady with the readings ranging between 256 and 256.25 in.

Tank 241-B-204 has no liquid observation well or drywells.

2.16.1.4 Historical Sample Analysis Data for Tank 241-B-204

A waste analysis for Tank 241-B-204 was conducted in December 1978. The sample was black with the consistency of soft grease. The table presenting the results of this analysis is in Appendix H.

2.16.2 Current Status of Tank 241-B-204

Tank 241-B-204 was constructed in 1943-44 and currently stores 50,000 gal of non-complexed waste. The waste is comprised of 1,000 gal of supernatant and 49,000 gal of sludge with no saltcake or pumpable liquid. The tank is identified as a low-heat load tank, is passively ventilated, and is categorized as an assumed leaker with interim stabilization and intrusion prevention completed. Tank 241-B-204 is not in a cascade flow series but is connected to Tank 241-B-203 with a tie line. The plan view and tank cross-section that depict the approximate waste level and riser configuration are in Appendix G. Tank 241-B-204 has 9 risers and three are available for use: two 12-in. risers, no. 2 and no. 6, and one 4-in. riser, no. 5.

2.16.2.1 Waste Layer Volume Approximation for Tank 241-B-204

A comparative analysis of all layer approximations for the entire Tank Farm and the data used to derive the tank layer approximations are located in Appendix K.

2.16.2.2 In-Tank Photograph 241-B-204

The 1987 photographic montage of the Tank 241-B-204 interior indicates a thin supernatant surface with a dark orange sludge underneath it (see Appendix I). Picture quality is poor and the tank details are hazy. The tank contains approximately 50,000 gal of waste which converts to a depth of a little over 21 ft. The inlet nozzle and temperature probe were overexposed because they were too close to the flash. Some tank equipment was identified labelled. A level adjustment was done in 1990; therefore, this picture may not correspond with the current tank interior. The 1977 picture shows the tank interior more clearly.

2.16.3 Synopsis Tank 241-B-204

(To be completed)

GLOSSARY

0.17	Transaction flag key-monthly volumes derived from semiannual reports.
0.33	Transaction flag key-monthly volumes derived from quarterly reports.
1	Monthly report.
1AYIN	See Waste Abbreviations.
1AZIN	See Waste Abbreviations.
1C	See Waste Abbreviations.
1CEB	See Waste Abbreviations.
1CS	See Waste Abbreviations.
1st Generation Tank	The original tank design encompassing Tank Farms B, C, T, U (excluding the 200 series tanks), and BX. These tanks have an operating capacity of 530,000 gal, a 75-ft diameter, a 12-in. dish bottom, and a 4-ft knuckle. Also see Type II tanks.
222-B	See Facilities.
222-C	See Facilities.
222-T	See Facilities.
222-U	See Facilities.
224	See Waste Abbreviations.
224-F	See Waste Abbreviations.
231Z	See Waste Abbreviations.
242-A	See Facilities.
242-B	See Facilities.

242-S	See Facilities.
242-T	See Facilities.
2AYIN	See Waste Abbreviations.
2AZIN	See Waste Abbreviations.
2C	See Waste Abbreviations.
2nd Generation Tank	Same as original tank design (1st generation, or type II) except the operating capacity was increased to 758,000 gal. Also see Type III tanks.
2SYIN	See Waste Abbreviations.
3	Quarterly report.
3AWIN	See Waste Abbreviations.
3rd Generation Tank	The first generation of the type IV tanks, contains the SX Tank Farm only. These tanks have a 1,000,000 gal operating capacity, a 75-ft diameter, a 14.875-in. dish bottom, and no knuckle. Also see Type IV tanks.
4th Generation Tank	The second generation of the type IV tanks, contains the A Tank Farm only. These tanks are the same as the 3rd generation except they have a flat bottom. Also see Type IV tanks.
5	See Waste Abbreviations.
5-6#	Cells 5 and 6 from B-Plant.
5AWIN	See Waste Abbreviations.
5th Generation Tank	The third generation of the type IV tanks, contains the AX Tank Farm only. These tanks are the same as the 4th generation with the addition of grid drain slots beneath the steel liner bottom.
6	Semiannual report.

6AWIN	See Waste Abbreviations.
A Plant (PUREX)	See Facilities.
A1 SLTCK	See LANL Defined Waste List.
A2 SLTSLRY	See LANL Defined Waste List.
Active Tank	A tank that contains more than 33,000 gal of waste and/or is still involved in waste management operations.
Active Drywell	Drywell in which radiation readings of greater than 50 counts/second are detected. To be considered active, the readings must be consistent as to depth and radiation level for repeated readings.
ADD	Add primary waste from process.
ADJ	Adjustment to waste amount-see CORR.
AGE, AGING	Waste Abbreviation.
Aging Waste	High-level, first-cycle solvent extraction waste from the PUREX Plant (NCAW).
Airlift Circulator	The airlift circulators are installed in tanks used to age wastes. The circulators promote mixing of the supernate and prevent agglomeration of radionuclides. By maintaining motion within the body of liquid, the circulators minimize superheat buildup and, consequently, minimize bumping.
Annulus	A vessel space in the form of a ring; the space between concentric walls.
AR Vault	A structure containing tanks and chemical processing equipment that is used for waste processing or storage operations.
AR	See LANL Defined Waste List.

Assumed Leaker	A waste storage tank for which surveillance data, in the past, has indicated a loss of liquid attributed to a breach of integrity.
Assumed Re-leaker	A designation that exists after a tank has been declared an "assumed leaker" and then the surveillance data indicate a new loss of liquid attributed to a breach of integrity.
Assumed Leaking Tank	In 1984, the criteria designations of "suspect leaker," "questionable integrity," "confirmed leaker," "declared leaker," "borderline," and "dormant" were merged into one category now reported as "assumed leaker."
B SLTCK	See LANL Defined Waste List.
B	See Waste Abbreviations.
B Plant (222-B)	See Facilities.
B860N	See Waste Abbreviations.
Background Radiation	Radioactivity from naturally occurring sources; primarily radiation from cosmogenic and naturally occurring radionuclides.
Baseline	A reference; for example, a specified liquid level or radiation level against which new information is compared.
BFSH	See Waste Abbreviations.
BL	See Waste Abbreviations.
BLEB	See Waste Abbreviations.
BLIX	See Waste Abbreviations.
BLIXB	See Waste Abbreviations.
BNW	Battelle Northwest Laboratory.
BNW	See Waste Abbreviations.

BPDCC	See Waste Abbreviations.
BPDCS	See Waste Abbreviations.
BPDCV	See Waste Abbreviations.
BPFPS	See Waste Abbreviations.
BPLCS	See Waste Abbreviations.
BPLDC	See Waste Abbreviations.
BPLDN	See Waste Abbreviations.
Bumping, Tank Bump	A tank bump occurs when solids overheat in the lower portion of the tank. The hot solids rapidly transfer heat to the liquid, some of which quickly vaporizes. The sudden pressurization caused by vapor generation is called a "bump".
BVCLN	See Waste Abbreviations.
BY SLTCK	See LANL Defined Waste List.
C Plant (222-C)	See Facilities.
C PLANT	See SSW.
Caisson	An underground structure used to store high-level waste; typical designs include corrugated metal or concrete cylinders, 55-gal drums welded end-to-end, and vertical steel pipes below grade.
Calcine	To heat a substance to a high temperature, but below its melting point, causing loss of volatile constituents such as moisture; refers also to the material produced by this process.
CARB	See Waste Abbreviations.
CAS	Cascade-see SET and END. This process filled three tanks with one pump using overflow siphoning. Normal use was with

	a sequence of tanks such as 101, 102, 103, or 110, 111, 112.
Cascade	Eleven of the single-shell tank farms (all except the AX Tank Farm) were equipped with overflow lines between tanks. The tanks were connected in series and were placed at different elevations creating a downhill gradient for liquids to flow from one tank to another.
CASS	Acronym for Computer Automated Surveillance System.
Catch Tanks	Small capacity single-shell tanks associated with diversion boxes and diverter stations. The tanks are designed to receive any transfer line cleanout, spills or leakage from the boxes, or leakage from the adjacent pipe encasement.
CAW	Current acid waste; this is PUREX acid HLW.
CC	See Waste Abbreviations.
CCGL	See Waste Abbreviations.
CCGR	See Waste Abbreviations.
CCPL	See Waste Abbreviations.
CCPLX	See Waste Abbreviations.
CCW	Concentrated customer waste.
CDF	Composition data file or transaction flag key-unit volume assumed to make stream active.
CE	See Waste Abbreviations.
CELL 23	Waste from cell 23 at B-Plant. Cell 23 contained an evaporator.
CEM	See Waste Abbreviations.

CF	See Waste Abbreviations.
CON	See Waste Abbreviations.
COND	Condensate-see EVAP, EB.
Condensate	Liquid formed from cooling vapors.
Conductivity Probe	A device that completes an electrical circuit when contacted by a conductive material.
Confirmed or Storage Declared Leaker	The designation of any underground waste tank where the data are considered sufficient to support a conclusion with 95 percent confidence that the tank has leaked.
COOL	Change in waste volume due to cooling. See CORR.
CORR	Correction to waste amount-see ADJ, LEAK, COOL.
CP	See Waste Abbreviations.
CPLX	See Waste Abbreviations.
CR Vault	Facility located adjacent to C Farm, used for scavenging campaign following uranium recovery. Ferrocyanide was added to tank supernatants in CR Vault and the slurry was returned to C-Farm.
Crib	A linear excavation approximately 15 ft in depth, with a perforated pipe in the bottom. The ditch is backfilled with broken rock or other loose material and then covered by soil and by a liquid impermeable membrane; the pipe is then used to distribute intermediate level liquid wastes along the crib.
Crust	A hard surface layer that has formed on top of the liquid in many waste tanks that contain concentrated solutions.
CSFD	See Waste Abbreviations.

CSR	See Waste Abbreviations.
CST	See Waste Abbreviations.
CSWLE	See Waste Abbreviations.
CSWLW	See Waste Abbreviations.
CTW	Caustic waste for makeup.
CW	See Waste Abbreviations
CWP	See Waste Abbreviations.
CWP/ZR	See Waste Abbreviations.
CWP2	See LANL Defined Waste List.
CWR	See Waste Abbreviations.
CX70	See Waste Abbreviations.
D	Transaction Flag Key-Amount by difference.
DBP	Dibutyl phosphate.
DC	See Waste Abbreviations.
DCS	Acroynm for dilute caustic solutions
DE	Acronym for diatomaceous earth that was added to Tanks 241-BX-102, -SX-113, -TX-106, and -U-104 from 1970 to 1972.
DE	See LANL Defined Waste List.
Deliquescent	A solid that is capable of absorbing moisture from the air and becoming a liquid.
Desiccant	A drying agent such as diatomaceous earth.
Diatomaceous Earth	Diatomite, a light friable siliceous material, derived chiefly from diatom (algae) remains that is added to selected underground waste storage tanks

	to absorb and, thereby, immobilize residual liquids (i.e help to stabilize the tank).
DBP	Dibutyl phosphate.
DIL	Dilution
DILFD	Dilute feed
Ditch	A linearly oriented excavation often used for the temporary diversion or disposal of process waste streams.
Diversion Box	A below grade concrete enclosure containing the remotely maintained jumpers and spare nozzles for the routing of waste solution to storage tank farms.
DN/PT	See Waste Abbreviations.
DN/PD	See Waste Abbreviations.
DN	See Waste Abbreviations.
Double-Shell Tank	The newer underground waste storage tanks consisting of a concrete shell and two concentric carbon steel liners with an annular space between the liners.
Double-Shell Slurry	Waste that exceeds the sodium aluminate saturation boundary in the evaporator without exceeding receiver tank composition limits. For reporting purposes, DSS is considered a solid.
Double-Shell Slurry Feed (DSSF)	Waste concentrated just before reaching the sodium aluminate saturation boundary in the evaporator without exceeding receiver tank composition limits. This form is not as concentrated as DSS.
Drywell	A steel casing, generally 6 inches in diameter drilled into the ground to various depths, and used to insert monitoring instruments for measuring the presence of radioactivity or moisture

	content.
Drywell (in-tank)	A sealed casing within a tank that is attached to a riser. It is used to insert experimental equipment, such as neutron or acoustical probes, to determine the level of drainable interstitial liquor.
DSS	See Waste Abbreviations.
DSSF	See Waste Abbreviations.
DUMM	See Waste Abbreviations.
DUMMY	See Waste Abbreviations.
DW	See Waste Abbreviations.
DWBIX	See Waste Abbreviations.
E	Transaction flag key-waste transferred through evaporator.
EB	See Waste Abbreviations.
EDTA	Ethylenediaminetetraacetic acid.
EF	See Waste Abbreviations.
EFD	See Waste Abbreviations.
END	Disconnect Cascaded Tanks, see CAS, Set.
Environs	Surrounding area, vicinity.
EV	Evaporation.
EVAP	See Waste Abbreviations.
EVAPF	See Waste Abbreviations.
Evaporator Feed	Any waste liquid that can be concentrated to form saltcake; e.g., low heat waste, dilute interstitial liquor, aged waste, and other radioactive waste solutions.

Evaporator-Crystallizer	242-A and 242-S waste concentration facilities that operate at a reduced pressure (vacuum) and are capable of producing a slurry containing about 30 volume percent solids at a specific gravity of greater than 1.6.
EVS	Partial neutralization in the 242-S Evaporator.
EVT	HEDTA destruction in the 242-B or 242-T Evaporators.
FD	See Waste Abbreviations.
FECN	Ferrocyanide wastes created during a scavenging campaign in 1953-57. See SCAV, POO, TOO.
Ferrocyanide	An ion composed of iron and cyanide with the chemical formula of $Fe(CN)^{-4}_{6}$.
FIC	A Food Instrument Corporation automatic liquid level gauge based on a conductivity probe. At Hanford, they are electrically connected to a computer for data transmission, analysis, and reporting. Local readings may also be obtained from a dial.
First- And Second-Cycle Decontamination Wastes	Waste contained 10 percent of the original fission product activity and 2 percent of the products. By-product cake solution was mixed with product waste and neutralized with 50 percent caustic. The waste contained a mixture of suspended solids, hydroxides, carbonate and phosphate, scavenger metals, chromium, iron, sodium, and silicofluoride.
FLSH	See Waste Abbreviations.
FP	Fission Product Waste. Waste produced at B Plant and Hot Semiworks in campaigns for Cs and Sr recovery during the 1960s. Cs was removed from PUREX supernatant and Sr was removed from

	PUREX sludge; both were removed from acidic waste.
FP	See Waste Abbreviations.
GA	Gain to tank.
Gamma Ray	Electromagnetic radiation sometimes emitted by the nuclei of radioactive substances during decay, similar in nature to X-rays.
GAS	Slurry growth as a result of gas generation.
GM Instrument	Instrument for detecting low-level beta and gamma radiation using a Geiger-Mueller tube.
GROUP	A group of tanks where ITS averaged the supernatant phases-see ITS.
Gunite	A building material consisting of a mixture of cement, sand, and water that is sprayed onto a mold.
H_2O	Water.
HDRL	See Waste Abbreviations.
HEAT	A tank correction, see CORR, COOL.
HEDTA	N hydroxy-ethylenediaminetriacetic acid.
Heel	The amount remaining in a vessel or container after most of the contents have been removed.
Hexone	Methyl isobutyl ketone, an organic solvent used in the REDOX solvent extraction process. Also known as Isobutyl methyl ketone, Methyl isobutyl ketone, 4-Methyl 2-pentanone, MIBK.
High-Level Waste	Waste from the fuel reprocessing operations in separations plants.
Historical Information	All information obtained from material

	referenced in published documentation and unpublished sources. Unpublished sources include electronically retrieved data (i.e. temperatures, liquid observation well, sampling, and surface level) and photographs.
HLO	See Waste Abbreviations.
HLO	Hanford Laboratory Operations.
HLW	See Waste Abbreviations.
HOT-SEMI	See HS, SSW.
HS	See Waste Abbreviations.
HS	Hot Semi-Works. A pilot facility that had a variety of operations. C Plant.
HWVP	Dilute, non-complexed waste from the vitrification plant.
I&S	Tank isolated and stabilized.
Inactive Tank	A tank that has been removed from liquid-processing service, has been pumped to less than 33,000 gal of waste, and is waiting to be, or is in the process of being, stabilized and interim isolated. Includes all tanks not in active or active-restricted categories. Otherwise inactive contingency spares that would be used if an active tank failed are also included.
INST	Change in tank level due to change in instrumentation.
Interim Isolated	An administrative designation reflecting the completion of the physical effort required to minimize the addition of liquids into an inactive storage tank, process vault, sump, catch tank, or diversion box.
Interim Stabilized	A tank which contains less than 50,000 gallons of drainable interstitial liquid

	and has less than 5,000 gallons of supernatant liquid. If the tank was jet pumped to achieve interim stabilization, then the jet pump flow must also have been at or below 0.05 gallons per minute before interim stabilization is completed.
Interstitial Liquor	The liquid that fills the interstices or the void volume in the solid material in a waste tank.
Interstitial	The volume within a solid matrix made up of the crevices, cracks, and void spaces.
Intrusion Mode FIC Setting	The FIC probe is positioned a short distance above the waste surface. If the surface level of the waste in the tank increases, thereby touching the probe tip, a positive indication is received.
Intrusion Prevention	This is an administrative designation reflecting the completion of the physical effort required to minimize the addition of liquid into an inactive storage tank, process vault, catch tank, sump, or diversion box.
ISO	Tank is interim-isolated.
ITS	The In-Tank Solidification Program was a program used to reduce waste volume directly by evaporating the wastes from inside certain tanks in the BX and BY Farms. The process used both hot air (ITS-1) and an electric heater (ITS-2).
IWW	See Waste Abbreviations.
IX	See Waste Abbreviations.
Jet Pump	A modified commercially available low capacity jet pump used as a salt well pump.
Knuckle	Point where the side wall and the bottom

	curved surface of a tank meet.
L222S	See Waste Abbreviations.
L3A4A	See Waste Abbreviations.
LaF	See Waste Abbreviations.
Lateral	Horizontal drywell under A Farm and certain SX Farm waste storage tanks.
Leak Detection Pit	Collection point for any leakage from AX Farm tanks. The pits are equipped with radiation and liquid detection instruments.
LEAK	Tank leak volume, see CORR.
LETF	Liquid effluent treatment facility from N-Reactor.
Level Adjustment	Any update in the waste inventory (or tank level) in a tank. The adjustments usually result from surveillance observations or historical investigations.
Level History	A diagram that shows the history of the waste level and waste level changes in a tank. The diagram also includes other related data.
Liquid Observation Well (LOW)	Liquid observation wells are used to monitor the interstitial liquid level (ILL) in single-shell waste storage tanks. Three probes are used to monitor changes in the ILL: acoustic, gamma, and neutron. Each method can indicate intrusions or leakage by increases or decreases in the ILL.
Liquid Level Best Engineering Judgement Line	During the initial fill of certain single-shell tanks, only the liquid level was reported. To adjust for the big increase in level height, which occurred when solids were added to the record, a sloped line was used to reflect solids volume between the

	initial fill and the time the solids data was recorded.
LO	Loss from tank.
LUNC	See Waste Abbreviations.
LW	See Waste Abbreviations.
Metal Waste (MW)	Waste from the extraction containing all the uranium, approximately 90 percent of the original fission product activity, and approximately 1 percent of the product. This waste was brought just to the neutral point with 50 percent caustic and then treated with an excess of sodium carbonate. This procedure yielded almost completely soluble waste at a minimum total volume. The exact composition of the carbonate compounds was not known but was assumed to be an uranium phosphate carbonate mixture.
Molarity	Number of gram molecular weights(moles) per liter of solution.
Mole	The amount of a substance with weight equal to the molecular weight in grams.
MW	See Waste Abbreviations.
MWF	See Waste Abbreviations.
N	See Waste Abbreviations.
NCAW	See Waste Abbreviations.
NCPL	See Waste Abbreviations.
NCPLEX	See Waste Abbreviations.
NCPLX	See Waste Abbreviations.
NCRW	See Waste Abbreviations.
Neutralized PUREX Acid Waste	The original plant in 1956 neutralized all the high-level waste and sent it to the 241-A Tank Farm. As fission product

	recovery started, a portion of the waste was treated for strontium recovery and then neutralized. As of 1967, all of the high-level waste left PUREX as an acid solution for treatment at B Plant.
Neutron Probe	Probe equipped with a neutron source and detector. They are used in dry well monitoring to determine the moisture content of the soil as one means for detecting leaks in underground waste storage tanks or pipelines.
NFAW	See Waste Abbreviations.
NHAW	See Waste Abbreviations.
NIT	$HNO_3/KMNO_4$ solution added during evaporator operation.
Noise At The Bottom Of Well--Drywell Probe	Erroneous reading caused by probe coming contact with foreign objects at the bottom of a well.
Non-Complexed (NCPLX)	General waste term applied to all Hanford Site liquors not identified as complexed (containing organics).
NPH	Normal paraffin hydrocarbon.
NRAW	See Waste Abbreviations.
NRP82	See Waste Abbreviations.
NRPO4	See Waste Abbreviations.
NRSO4	See Waste Abbreviations.
NTA	Nitrilotriacetic acid.
Nuclear reactor	A device for creating a controlled nuclear chain reaction using atomic fuel, as for the production of energy.
Open Hole Salt Well	A well in which a pump is inserted in solid waste. Frequently used to remove the liquid from tanks containing less than 2 feet of sludge.

Organic Wash Waste(OWW)	The solvent used in PUREX was treated before reuse by washing with potassium permanganate and sodium carbonate, followed by dilute nitric acid and then a sodium carbonate wash.
Out-of-Service-Tank	A tank that does not meet the definition of an in-service tank. Before September 1988, these tanks were defined as inactive. {Note: all single-shell tanks (SSTs) are out of service.}
OWW	See Waste Abbreviations.
P	See Waste Abbreviations.
P1:	See LANL Defined Waste List.
P2:	See LANL Defined Waste List.
PADFG	See Waste Abbreviations.
PADWG	See Waste Abbreviations.
Partially Interim Isolated	The administrative designation reflecting the completion of the physical effort required for Interim Isolation except for the isolation of risers and piping that will be required for jet pumping or for other methods of stabilization.
PAS	See Waste Abbreviations.
PASF	See Waste Abbreviations.
PAW	See Waste Abbreviations.
PD	See Waste Abbreviations.
PDBNG	See Waste Abbreviations.
PDBSU	See Waste Abbreviations.
PDBTG	See Waste Abbreviations.
PDCSS	See Waste Abbreviations.

PDL87	See Waste Abbreviations.
PDL89	See Waste Abbreviation.
PDNSG	See Waste Abbreviations.
PDS87	See Waste Abbreviations.
PDS89	See Waste Abbreviations.
PDSLG	See Waste Abbreviations.
PDSUP	See Waste Abbreviations.
PFeCN	See Waste Abbreviations.
PFeCN1:	See LANL Defined Waste List.
PFeCN2:	See LANL Defined Waste List.
PFMMS	See Waste Abbreviations.
PFP (Z-Plant)	See facilities.
PFP	Plutonium finishing plant waste (see Z, 224, PRF).
PFPGR	See Waste Abbreviations.
PFPNT	See Waste Abbreviations.
PFPPT	See Waste Abbreviations.
PFPSL	See Waste Abbreviations.
pH	A measure of the hydrogen ion concentration in a solution.
Pile	An early term used to describe a nuclear reactor.
PL	See Waste Abbreviations.
PML89	See Waste Abbreviations.
PMS89	See Waste Abbreviations.
PN	See Waste Abbreviations.

PNF	See Waste Abbreviations.
POO-P##	In-Plant scavenging with FeCN-see SCAV, TOO-T##.
Portland Cement	A hydraulic cement made by finely pulverizing the clinker produced by calcining to incipient fusion a mixture of clay and limestone or similar materials.
PRF	Plutonium Reclaimation Facility-Type of waste generated in Z-Plant for "finishing wastes". Solvent based extraction process using CCl_4/TBP.
Primary Addition	An addition of waste from a specific plant or process vault. These additions come from the "waste Status and Transaction Record Summary", WHC-SD-WM-TI-614 & -615 Rev. 0 DRAFT.
Primary Stabilization	The condition of an inactive waste storage tank after all liquid above the solids, other than isolated surface pockets, has been removed. Isolated surface pockets of liquid are those not pumpable by conventional techniques.
Probe	A device used to get information about the environment. In this report, an instrument package designed to be inserted in drywells, risers, or ports to measure waste characteristics.
PSL	See Waste Abbreviations.
PSS	See Waste Abbreviations.
PSSF	See Waste Abbreviations.
Psychrometry	Determination of humidity or dew point from wet and dry bulb temperatures with the difference in the two used as a measure of dryness in the atmosphere.
PT	See Waste Abbreviations.

PUREX	See Facilities.
PX86S	See Waste Abbreviations.
PXBAW	See Waste Abbreviations.
PXBSG	See Waste Abbreviations.
PXFTF	See Waste Abbreviations.
PXLOW	See Waste Abbreviations.
PXMET	See Waste Abbreviations.
PXMSC	See Waste Abbreviations.
PXNAW	See Waste Abbreviations.
Questionable Integrity	Any tank that has a small decrease in liquid level or a radiation increase in an associated dry well, for which the data are insufficient to support a conclusion with 95 percent confidence that the tank is sound.
R	See Waste Abbreviations.
R SLTCK:	See LANL Defined Waste List.
R1:	See LANL Defined Waste List.
R2:	See LANL Defined Waste List.
Radiation Zone	An area containing radioactive materials in quantities significant enough to require control of personnel entry to the area.
Radiation	Particles and electromagnetic energy emitted by nuclear transformations that are capable of producing ions when interacting with matter.
Readily available have Risers	Risers located above grade which do not apparatus attached to or contained in them.

REC	Receive waste from another tank-see XFER.
REDOX	See Facilities.
Removed From Service is not (Tanks)	Any tank that is a confirmed leaker or intended for reuse.
Rerun Drywell Data	Surveillance data which supersedes "suspect data".
RESD	See Waste Abbreviations.
RIX	See Waste Abbreviations.
RMC	Remote Mechanical C-Line -Process used in Z-Plant.
RSN	See Waste Abbreviations.
RSS	See Waste Abbreviations.
RTX	See Waste Abbreviations.
S	Transaction Flag Key-Partial neutralization (PNF).
S-Plant (REDOX)	See Facilities.
S1 SLTCK:	See LANL Defined Waste List.
S2 SLTSLRY:	See LANL Defined Waste List.
Salt Cake	Crystallized nitrate and other salts deposited in waste tanks, usually after active measures are taken to remove moisture.
Salt Well	A hole drilled or sluiced into a salt cake and lined with a cylindrical screen to permit drainage and jet pumping of interstitial liquors.
SCAV	Scavenging campaign with FECN on TBP, 1952-57. See TOO-T##, POO-P##.
Scavenged	Waste which has been treated with ferrocyanide to remove cesium from the

	supernatant by precipitating it into the sludge.
Scintillation Monitor	A radiation detection instrument based on the principle that light pulses are produced in some materials when they are exposed to radiation.
Self Concentrating	High-level liquid radioactive waste whose constituent radionuclides contribute sufficient decay heat to cause the solution to boil and/or self-concentrate.
Self-Evaporation	A waste material in which moisture is being lost as the moisture changes to a vapor and diffuses into the atmosphere.
SET	Connect cascaded tanks together-see CAS and END.
SIX	See Waste Abbreviations.
SL	See Waste Abbreviations.
SL3SY	See Waste Abbreviations.
Sludge	Primarily insoluble metal hydroxides and oxides precipitated from neutralized waste.
Slugs	An early term for uranium fuel elements which had been machined or extruded into short cylinders which were then clad or encased in corrosion-resistant metals.
Sluicing, or sluiced	To wash with water. At Hanford, this has meant to dissolve or suspend in solution by action of a high pressure water stream.
Slurry	Insoluble material suspended in water or aqueous solution.
Sound Tank	The classification of a waste storage tank for which surveillance data indicates there has been no loss of liquid attributed to a breach of

	integrity.
SPRG	Sparge-transfer of water or volume
SRR	See Waste Abbreviations.
SRS	See Waste Abbreviations.
SRS	See Waste Abbreviations.
SSW	See Waste Abbreviations.
STAB	Tank stabilized by removal of liquid. Both floating suction and salt-well jet pumps used to remove liquid.
Stabilization	The removal, or immobilization, as completely as possible, of the liquid contained in a radioactive waste storage tank by salt well pumping, open hole salt well pumping, diatomaceous earth addition, etc.
Static Tank	A tank with no significant change in liquid level or involvement in transfer operations during a stated period of time.
Strontium Semi-Works	Called C-Plant or Hot Semi-Works, was a pilot plant for both Redox and Purex, then reconfigured for strontium recovery.
SU	See Waste Abbreviations.
Supernatant (Supernatant Liquid)	In waste storage tanks, the liquid quantity defined by the difference between the measured liquid level and the measured average solids level in a tank.
Surveillance	Regular or systematic watch kept over someone or something.
Suspect Data	Surveillance data which does not fall within the expected range and is superseded by "reruns."

SV	Transaction Flag Key-Amount by difference in solids.
SW RCR	Salt-well Receiver.
SWLIQ	See Waste Abbreviations.
SWLQW	See Waste Abbreviation.
T-Plant (222-T)	See Facilities.
T1 SLTCK:	See LANL Defined Waste List.
T2 SLTCK:	See LANL Defined Waste List.
Tank Farm	An area containing a number of storage tanks; i.e., a chemical tank farm for storage of chemicals used in a plant, or underground waste tank storage of radioactive waste.
TBP	Tributyl phosphate, a solvent used in the PUREX solvent extraction process.
TBP	See Waste Abbreviations.
TCO	See Waste Abbreviations.
Terminal Liquor	The liquid product from the evaporation-crystallization process which, upon further concentration, forms an unacceptable solid for storage in single-shell tanks. Terminal liquor is characterized by a caustic concentration of approximately 5.5 M (the caustic molarity will be lower if the aluminum salt saturation is reached first).
TFeCN	See Waste Abbreviations.
TH	See Waste Abbreviations.
Thermocouple Tree	A group of thermocouples assembled in a pipe and inserted into a waste tank for measuring temperatures at regular (normally 2 feet) vertical intervals.
Thermocouple,	A probe for measuring temperature,

Thermocouple probe	consisting of two dissimilar metal wires joined at one end (hot junction) with the free ends joined to a measuring instrument. Electrical potential changes due to temperature changes at the hot end are measured and calibrated to read out as temperature.
Thermowell	A well in a waste tank which contains thermocouples.
THL	See Waste Abbreviations.
Thorium	A chemical element which is also a fertile material. By fertile is meant that when subjected to radiation in a nuclear reactor it will be converted, in this case, to ^{233} uranium, a potential fuel.
TK	Tank. TK-17-2, however, was an early designation for B-Plant.
TL	See Waste Abbreviations.
TOO-T##	In-Tank scavenging with FECN, see SCAV, P##.
TPLAL	See Waste Abbreviations.
TPLAN	See Waste Abbreviations.
TPLAS	See Waste Abbreviations.
TR	Transfer from tank.
Trench	A deep furrow in the ground. At Hanford they are used for the disposal of solid waste.
trFlag	Transaction Flag Keys-used by W-Trac-see CDF, D, E, S, SV, 1, 3, 6, 0.17, 0.33.
Tributyl Phosphate(TBP)	A chemical compound, also an organic solvent used in the PUREX solvent extraction process.

Type I Tank	These are the 200 series B, C, T, and U Farm tanks. They have an operating capacity of 55,000 gal, a 20-ft diameter, a 6-in. dish bottom, and a 3-ft knuckle. There is no generation associated with type I tanks.
Type II Tank	These are the original, 1st generation, tank designs, encompassing B, C, T, U (excluding the 200 series tanks), and BX Tank Farms. Also see 1st Generation Tank.
Type III Tank	These are the 2nd Generation tank designs, encompasing BY, S, TX, and TY Tank Farms. Also see 2nd Generation Tank.
Type IV Tank	These include 3rd, 4th, and 5th generation tank designs, encompasing SX, A, and AX Tank Farms respectively. Also see 3rd Generation Tank, 4th Generation Tank, and 5th Gneration Tank.
Type V Tank	These are the first double shell tank designs, encompasing AY, AZ, and SY Tank Farms.
U-Plant (222-U)	See Facilities.
U1U2	See Waste Abbreviations.
UNKN	Unknown waste origin sink.
UNKNOWN:	See LANL Defined Waste List.
UR	Uranium recovery operation in 222-U, 1952-57. Created TBP (primary waste) and FECN (scavenging wastes). See TFeCN, PFeCN, POO, TOO, FeCN.
UR:	See LANL Defined Waste List.
Watch List Tank	An underground storage tank containing waste that requires special safety precautions because it may have a serious potential for release of high-level radioactive waste because of

	uncontrolled increases in temperature or pressure. Special restrictions have been placed on these tanks by "Safety Measures for Waste Tanks at Hanford Nuclear Reservation," Section 3137 of the National Defense Authorization Act for Fiscal Year 1991, November 5, 1990, Public Law 101-501 (also known as the Wyden Amendment).
WATER	Flush water from various sources.
WTR	Water.
WVP	Waste volume projections
XFER	Transfer of waste out of tank.
Z	See Waste Abbreviations
Z-Plant	See Facilities
Z-PLANT	PFP. Plutonium Finishing Plant.
ZAW	See Waste Abbreviations.
ZHIGH	See Waste Abbreviations.
ZLAB	See Waste Abbreviations.
ZLOW	See Waste Abbreviations.
ZPRFL	See Waste Abbreviations.
ZPRFS	See Waste Abbreviations.
ZRM	See Waste Abbreviations.
ZRMCL	See Waste Abbreviations.
ZRMCS	See Waste Abbreviations.

WASTE ABBREVIATIONS

1AYIN	Concentrated complex waste from 101 AY inventory
1AZIN	Pre 2-81 101AZ inventory
1C	First cycle waste
1CEB	1st cycle evaporator bottoms
1CS	1st cycle scavenging waste
224	224-U waste
224-F	224-U waste. LaF Pu finishing plant
231Z	Dilute, phosphate waste from 231Z laboratories
2AYIN	Pre 2-81 102AY inventory
2AZIN	Pre 2-81 concentrated complex waste from 102AZ inventory
2C	Second cycle waste
2SYIN	Pre 2-81 102SY inventory
3AWIN	Pre 2-81 103AW inventory
5-6	B-Plant tank 5,6 waste
5AWIN	Pre 2-81 105AW inventory
6AWIN	Concentrated phosphate waste in 106AW inventory
AGE, AGING	Aging waste
B	B-Plant high- level waste
B860N	Dilute, non-complexed waste from B Plant cell drainage
BFSH	B-Plant flush waste water
BL	B-Plant low-level waste

BLEB	B-Plant low-level evaporator bottoms
BLIX	B-Plant low level ion exchange?
BLIXB	B-Plant low level ion exchange bottoms?
BNW	Battelle Northwest Laboratory waste
BPDCC	Dilute, complexed waste from B Plant cesium processing
BPDCS	Dilute, complexed waste from B Plant strontium processing
BPDCV	Dilute, complexed waste from B Plant vessel clean-out
BPFPS	B Plant high Tru solids from retrieved PFP solids
BPLCS	Dilute, non-complexed waste from B Plant strontium processing
BPLDC	Dilute, complexed waste from B Plant cesium processing
BPLDN	Dilute, non-complexed waste from B Plant cesium processing
BVCLN	Dilute, non-complexed waste from B Plant vessel clean-out
CARB	PUREX organic wash waste
CC	Complexant concentrate waste
CCGL	B-Plant high Tru solids from retrieved complexed concentrate
CCGR	Dilute, non-complexed waste from retrieved complexed concentrate
CCPL	Complexant concentrate
CCPLX	Complexant concentrate-see CPLX

CE	Evaporator concentrate
CEM	Concrete-see CON
CF	Cesium feed
CON	Concrete-see CEM
CP	Concentrated phosphate waste from N Reactor decontamination
CPLX	Complex waste
CSFD	Cesium feed
CSR	Waste sent to B-Plant for cesium recovery
CST	Caustic solution
CSWLE	Complexed salt well liquid east area
CSWLW	Complexed salt well liquid west area
CW	Coating waste
CWP/ZR	Coating waste (PUREX), Zirconium cladding
CWP	Coating waste (PUREX)
CWR	Coating waste (REDOX)
CX70	Dilute, complexed mixture hot-semiworks Tru solids
DC	Dilute complexed waste
DN/PD	DN with P Tru solids
DN	Dilute non-complexed waste
DN/PT	DN with PFP Tru solids
DSS	Double-shell slurry
DSSF	Double-shell slurry feed

DUMM	Dummy waste
DUMMY	Dummy waste
DW	Decontamination waste
DWBIX	Decontamination waste and B-Plant ion exchange
EB	Evaporator bottoms
EF	Evaporator feed
EFD	Evaporator feed dilute
EVAP	Evaporator feed (post 1976)
EVAPF	Dilute, non-complexed waste from evaporator pad flush
FD	Feed dilute
FLSH	Flush water
FP	Fission product waste
HDRL	Hanford defense residual liquor
HLO	Hanford laboratory operations waste
HLW	High level waste-generic for all Hanford tank wastes
HS	Hot semiworks waste
IWW	PUREX #1 acid concentrator waste
IX	Ion exchange waste
L222S	222S laboratory, dilute non-complexed waste
L3A4A	Dilute non-complexed laboratory wastes from 300 & 400 areas
LaF	Lanthanum fluoride waste generated in PFP

LUNC	Dilute, non-complexed waste from UNC fuels fabrication
LW	Laboratory waste
MW	Metal waste
MWF	Metal waste feed
N	N-Reactor waste
NCAW	Neutralized current acid waste, primary HLW stream from PUREX process
NCPLEX	Non-complexed waste-see NCPLX
NCPLX	Non-complexed waste-see NCPLEX
NCPL	Non-Complexed waste
NCRW	Neutralized cladding removal waste-same as CWP.
NFAW	Aging waste from PUREX/PFM high level waste
NHAW	Aging waste from PUREX/PFM processing of NPR fuel
NRAW	Aging waste from PUREX/PFM residue acid waste
NRP82	Dilute, non-complexed waste from FY82 100-N area waste transfer
NRPO4	Dilute, phosphate waste from 100N area
NRSO4	Dilute, non-complexed waste from 100N area
OWW	Organic wash waste
P	PUREX waste
PADFG	Purex ammonia destruction waste, from fuels grade fuel
PADWG	Purex ammonia destruction waste, from

	weapons grade fuel
PAS	Purex acidified sludge
PASF	Purex ammonia scrubber feed
PAW	Purex acidified waste
PD	Purex decladding waste
PDBNG	Decladding sludge (non-Tru) from B Plant processing
PDBSU	Dilute, non-complexed waste from B Plant decladding waste
PDBTG	B Plant aging waste solids from Purex decladding waste
PDCSS	Dilute non-complexed Purex decladding waste, FY1986 only
PDL87	Purex decladding supernatant, 1987
PDL89	Purex decladding supernatant, non-Tru, spent metathesis removed
PDNSG	Non-Tru decladding sludge from Purex
PDS87	Purex decladding sludge
PDS89	Purex decladding sludge after FY89
PDSLG	Purex decladding sludge sol Purex
PDSUP	Dilute, non-complexed waste, Purex decladding waste
PFeCN	Ferrocyanide sludge produced by in-plant scavenging of waste from uranium recovery
PFMMS	Dilute, non-complexed waste from shear/leach processing of NPR fuel
PFPGR	Dilute, non-complexed waste from retrieved PFP solids

PFPNT	Non-tru sludge from the PFP sol Z Plant
PFPPT	Dilute, non-complexed waste from the PFP (with TRUEX)
PFPSL	High-tru sludge from the PFP sol Z Plant
PL	PUREX low-level waste
PML89	Purex spent metathesis liquid after FY89
PMS89	Purex spent metathesis solids after FY89
PN	Purex neutralized cladding waste
PNF	Partial neutralized waste
PSL	Purex sludge sluiced during recovery of strontium
PSS	PUREX sludge supernatant
PSSF	Purex sludge supernatant feed
PT	Tru solids from 200W
PX86S	Dilute, non-complexed waste from Purex miscellaneous streams(NPR fuel) FY86
PXBAW	B Plant aging waste supernatant from retrieved aging waste
PXBSG	B Plant aging waste solids from retrieved aging waste
PXFTF	Dilute, non-complexed waste from Purex miscellaneous streams (FFTF)
PXLOW	Purex low level waste
PXMET	Purex dilute, non-complexed decladding: spent metathesis
PXMSC	Dilute, non-complexed waste from Purex miscellaneous streams(NPR fuel)
PXNAW	Aging waste from Purex high level waste

R	REDOX waste
RESD	Residual evaporator liquor
RIX	REDOX ion exchange waste
RSN	REDOX supernatant
RSS	Redox sludge supernatant
RTX	Redox ion exchange
SIX	PUREX ion exchange waste
SL	Sludge
SL3SY	Double shell slurry from end of FY80, 103SY inventory
SRR	Waste sent to B-Plant for strontium recovery
SRS	Strontium sludge
SRS	Strontium recovery supernatant
SSW	Strontium semiworks waste
SU	Supernatant
SWLIQ	Dilute, non-complexed waste from east area single shell tanks
SWLQW	Dilute, non-complexed waste from west area single shell tanks
TBP	Tri-Butyl Phosphate
TCO	Dilute non-complexed waste from terminal cleanout
TFeCN	Ferrocyanide sludge produced by in-tank or in-farm scavenging
TH	Thoria HLW or cladding waste
THL	Thoria low level waste

TL	Terminal liquor
TPLAL	Dilute, non-complexed waste from T Plant
TPLAN	Dilute, non-complexed waste from T Plant
TPLAS	Sludge from T Plant operations
U1U2	Dilute, non-complexed waste from U1/U2 groundwater pumping
Z	Z-Plant waste
ZAW	Purex waste stream from zirconium cladded fuel
ZHIGH	Dilute, non-complexed waste from the PFP (without Truex)
ZLAB	Dilute, non-complexed waste from the PFP laboratories
ZLOW	Dilute, non-complexed waste from Pre-FY85 Z Plant operations
ZPRFL	Dilute, non-complexed waste from PRF processing
ZPRFS	PFP Tru solids from PRF processing
ZRMCL	Dilute, non-complexed waste from PFP RMC processing
ZRMCS	PFP Tru solids from PFP RMC processing

A. LANL Defined Wastes

LANL DEFINED WASTE LIST

A1 SLTCK	Saltcake waste generated from the 242-A evaporator-crystallizer from 1977 until 1980.
A2 SLTSLRY	Salt slurry waste generated from the 242-A evaporator-crystallizer from 1981 until 1994.
AR	"Washed" PUREX sludge fromthe AR vault.
B SLTCK	Saltcake waste generated from the 242-B evaporator from 1951 until 1955.
BY SLTCK	Saltcake waste generated from in-tank solidification units 1 and 2 between 1965 and 1974.
CWP2	Cladding waste-PUREX 2???
DE	Diatomaceous earth.
P1	PUREX high-level waste generated between 1955 and 1962.
P2	PUREX high-level waste generated between 1963 and 1967.
PFeCN1	Ferrocyanide sludge generated from in-plant scavenging of waste from uranium recovery.
PFeCN2	Same as PFeCN1, except used 0.0025 M ferrocyanide.
R SLTCK	Salt cake waste from the REDOX concentrator.
R1	REDOX waste generated between 1952 and 1957.
R2	REDOX waste generated between 1958 and 1966.

S1 SLTCK	Saltcake waste generated from the 242-S evaporator/crystallizer from 1973 until 1976.
S2 SLTSLRY	Salt slurry waste generated from the 242-S evaporator-crystallizer from 1977 until 1980.
T1 SLTCK	Saltcake waste generated from the 242-T evaporator from 1951 until 1955.
T2 SLTCK	Saltcake waste generated from the 242-T evaporator from 1965 until 1955.
UNKNOWN	Unkown waste type.
UR	Uranium recovery waste (also known as tributyl phosphate (TBP) waste).

FACILITIES

A Plant (PUREX)	The facility at Hanford which contains the latest solvent extraction process for recovery of both plutonium and uranium.
B Plant (222-B)	On of the three original bismuth-phosphate processing facilities. Later converted to a waste fractionation plant.
C Plant (222-C)	Initially a pilot plant for Redox, later a pilot plant for Purex and B-Plant waste partitioning.
S Plant (REDOX)	The facility at Hanford which contains the original extraction process for recovery of both plutonium and uranium.
T Plant (222-T)	One of the three original bismuth-phosphate processing facilities. Later converted to a decontamination facility.
U Plant (222-U)	One of the three original bismuth-phosphate processing facilities. Later converted to a uranium recovery plant.
PFP (Z Plant)	Plutonium Finishing Plant. The final operations for production of plutonium products are carried out in this facility.
242-A	A forced circulation vacuum evaporation system.
242-B	An evaporator that operates at atmospheric pressure. Also referred to as an open air type evaporator.
242-S	A forced circulation vacuum evaporation system.
242-T	An evaporator that operates at atmospheric pressure. Also referred to as an open air type evaporator.

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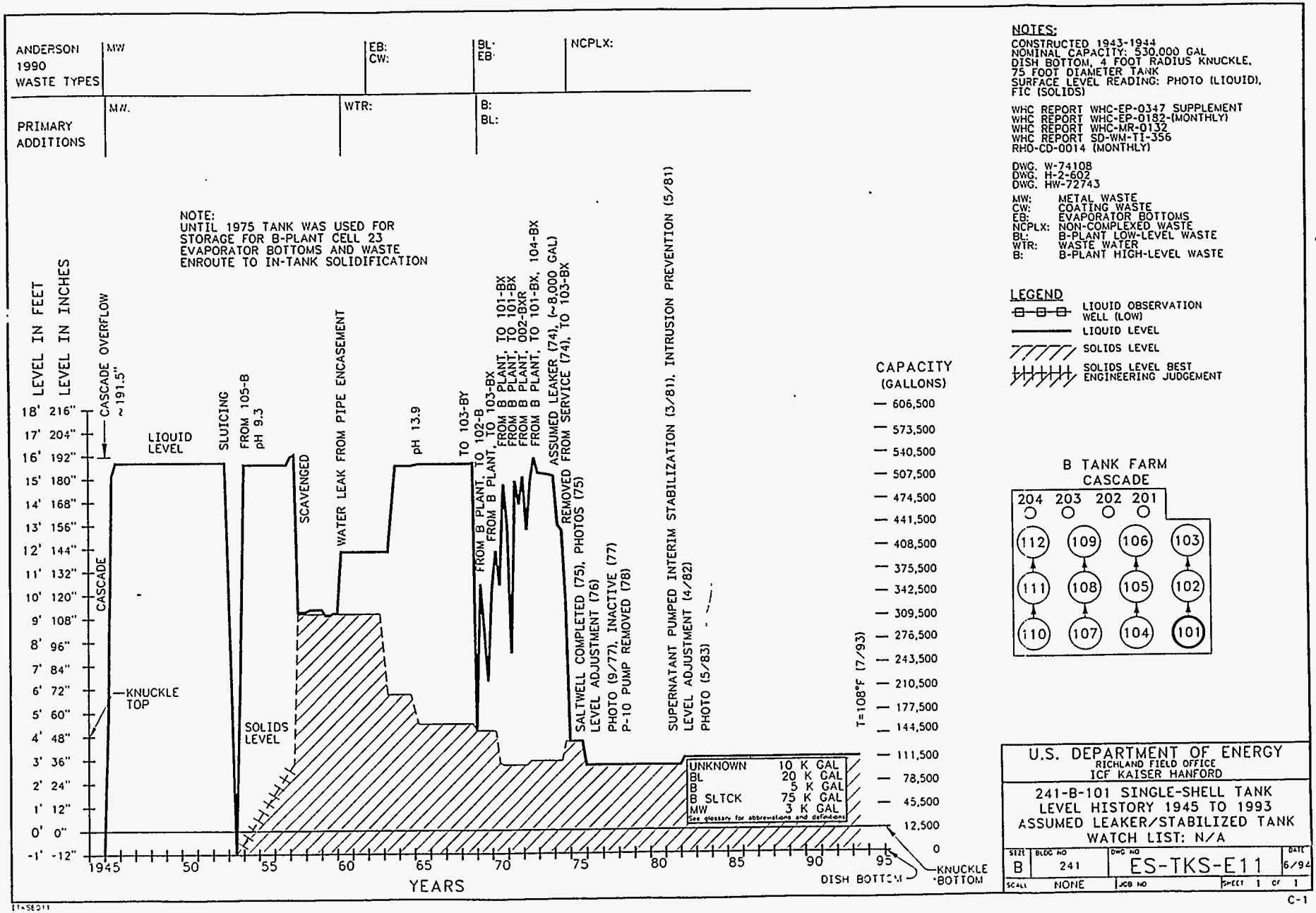
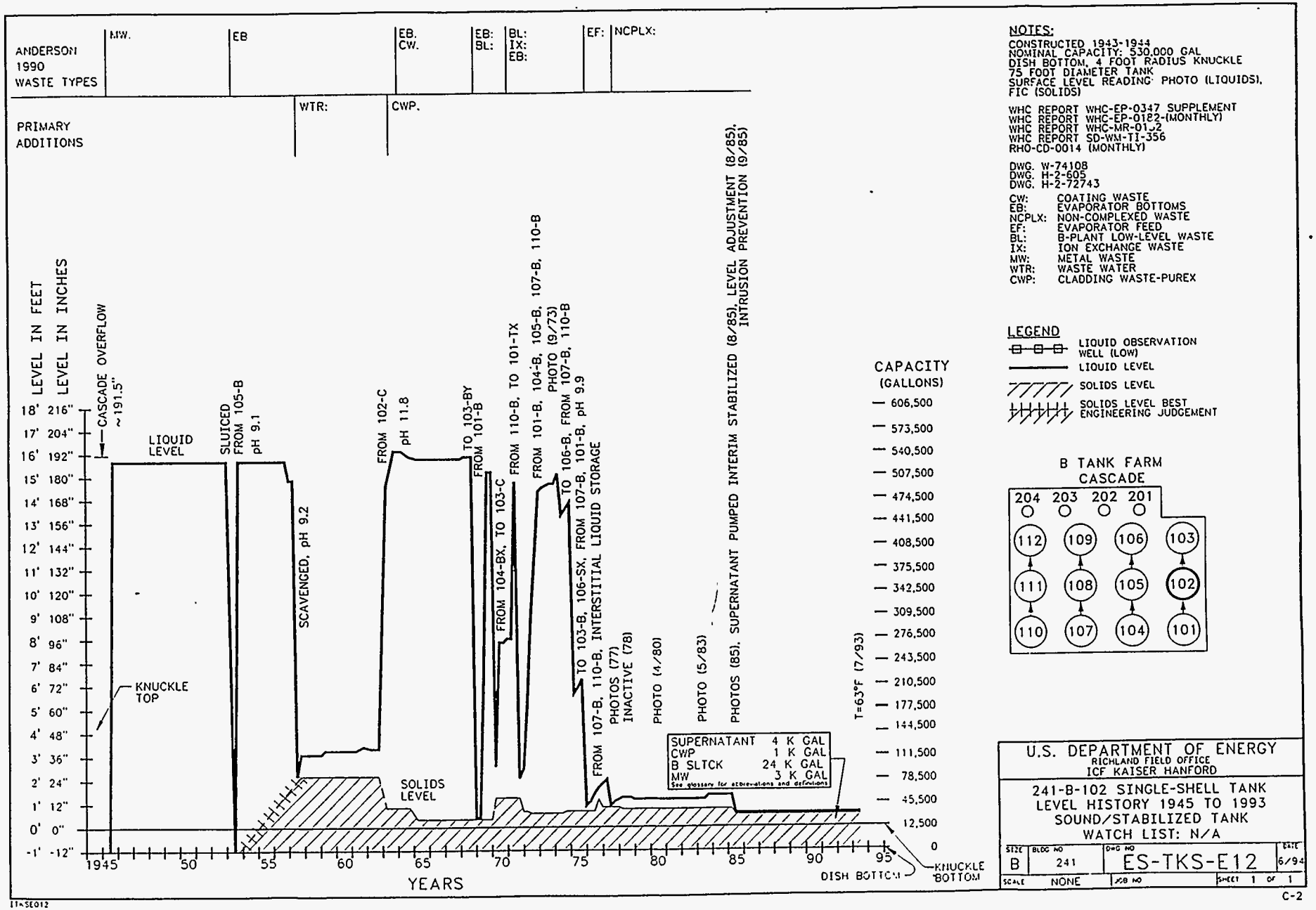

ANDERSON 1990 WASTE TYPES
MW
EB: CW:
SL: EB:
NCPLX:
PRIMARY ADDITIONS
MW.
WTR:
B: BL:
NOTE: UNTIL 1975 TANK WAS USED FOR STORAGE FOR B-PLANT CELL 23 EVAPORATOR BOTTOMS AND WASTE ENROUTE TO IN-TANK SOLIDIFICATION
LEVEL IN FEET
LEVEL IN INCHES
CASCADE OVERFLOW ~191.5"
CASCADE
KNUCKLE TOP
LIQUID LEVEL
SLUICING
FROM 105-B pH 9.3
SOLIDS LEVEL
SCAVENGED
WATER LEAK FROM PIPE ENCASEMENT
pH 13.9
TO 103-BY
FROM B PLANT, TO 102-B
FROM B PLANT, TO 103-BX
FROM B PLANT, TO 101-BX
FROM B PLANT, TO 101-BX
FROM B PLANT, 002-BXR
FROM B PLANT, TO 101-BX, 104-BX
ASSUMED LEAKER (74), (~8,000 GAL)
REMOVED FROM SERVICE (74), TO 103-BX
SALTWELL COMPLETED (75), PHOTOS (75)
LEVEL ADJUSTMENT (76)
PHOTO (9/77), INACTIVE (77)
P-10 PUMP REMOVED (78)
SUPERNATANT PUMPED INTERIM STABILIZATION (3/81), INTRUSION PREVENTION (5/81)
LEVEL ADJUSTMENT (4/82)
PHOTO (5/83)
T=108°F (7/93)
UNKNOWN 10 K GAL
BL 20 K GAL
B 5 K GAL
B SLTCK 75 K GAL
MW 3 K GAL
See glossary for abbreviations and definitions
CAPACITY (GALLONS)
606,500
573,500
540,500
507,500
474,500
441,500
408,500
375,500
342,500
309,500
276,500
243,500
210,500
177,500
144,500
111,500
78,500
45,500
12,500
0
KNUCKLE BOTTOM
DISH BOTTOM
YEARS
B TANK FARM CASCADE
204 203 202 201
112 109 106 103
111 108 105 102
110 107 104 101
NOTES:
CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE.
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: PHOTO (LIQUID), FIC (SOLIDS)
WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)
DWG. W-74108
DWG. H-2-602
DWG. HW-72743
MW: METAL WASTE
CW: COATING WASTE
EB: EVAPORATOR BOTTOMS
NCPLX: NON-COMPLEXED WASTE
BL: B-PLANT LOW-LEVEL WASTE
WTR: WASTE WATER
B: B-PLANT HIGH-LEVEL WASTE
LEGEND
LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT
U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD
241-B-101 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A
SIZE B
BLDG NO 241
DWG NO ES-TKS-E11
DATE 6/94
SCALE NONE
JOB NO
SHEET 1 OF 1



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: PHOTO (LIQUIDS), FIC (SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-01_2
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

DWG. W-74108
DWG. H-2-605
DWG. H-2-72743

CW: COATING WASTE
EB: EVAPORATOR BOTTOMS
NCPLX: NON-COMPLEXED WASTE
EF: EVAPORATOR FEED
BL: B-PLANT LOW-LEVEL WASTE
IX: ION EXCHANGE WASTE
MW: METAL WASTE
WTR: WASTE WATER
CWP: CLADDING WASTE-PUREX

LEGEND

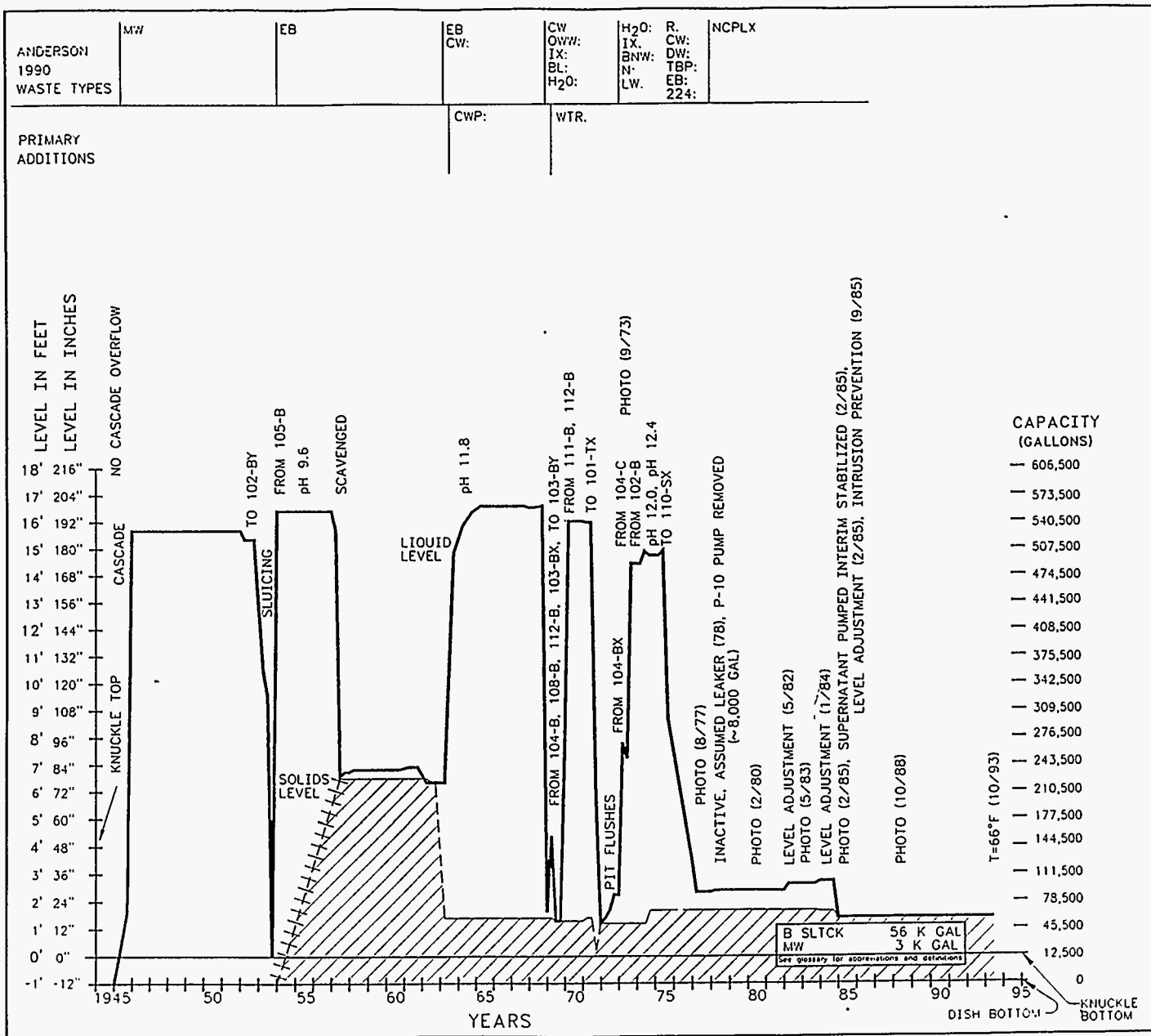
LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

B TANK FARM CASCADE

U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-102 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
SOUND/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E12	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY, 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE,
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: FIC
(LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

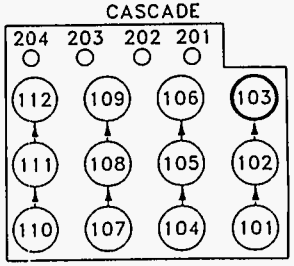
DWG. W-74108
DWG. H-2-602
DWG. HW-72743

CW: COATING WASTE
EB: EVAPORATOR BOTTOMS
DW: DECONTAMINATION WASTE
R: REDOX WASTE
LW: LABORATORY WASTE
N: N-REACTOR WASTE
BNW: BATTELLE PNL WASTE
OWW: ORGANIC WASH WASTE
IX: ION EXCHANGE WASTE
BL: B-PLANT LOW LEVEL WASTE
H_2O: WATER
TBP: TRI-BUTYL PHOSPHATE
224: 224-U WASTE
NCPLX: NON-COMPLEXED WASTE
MW: METAL WASTE
CWP: CLADDING WASTE-PUREX
WTR: WASTE WATER

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

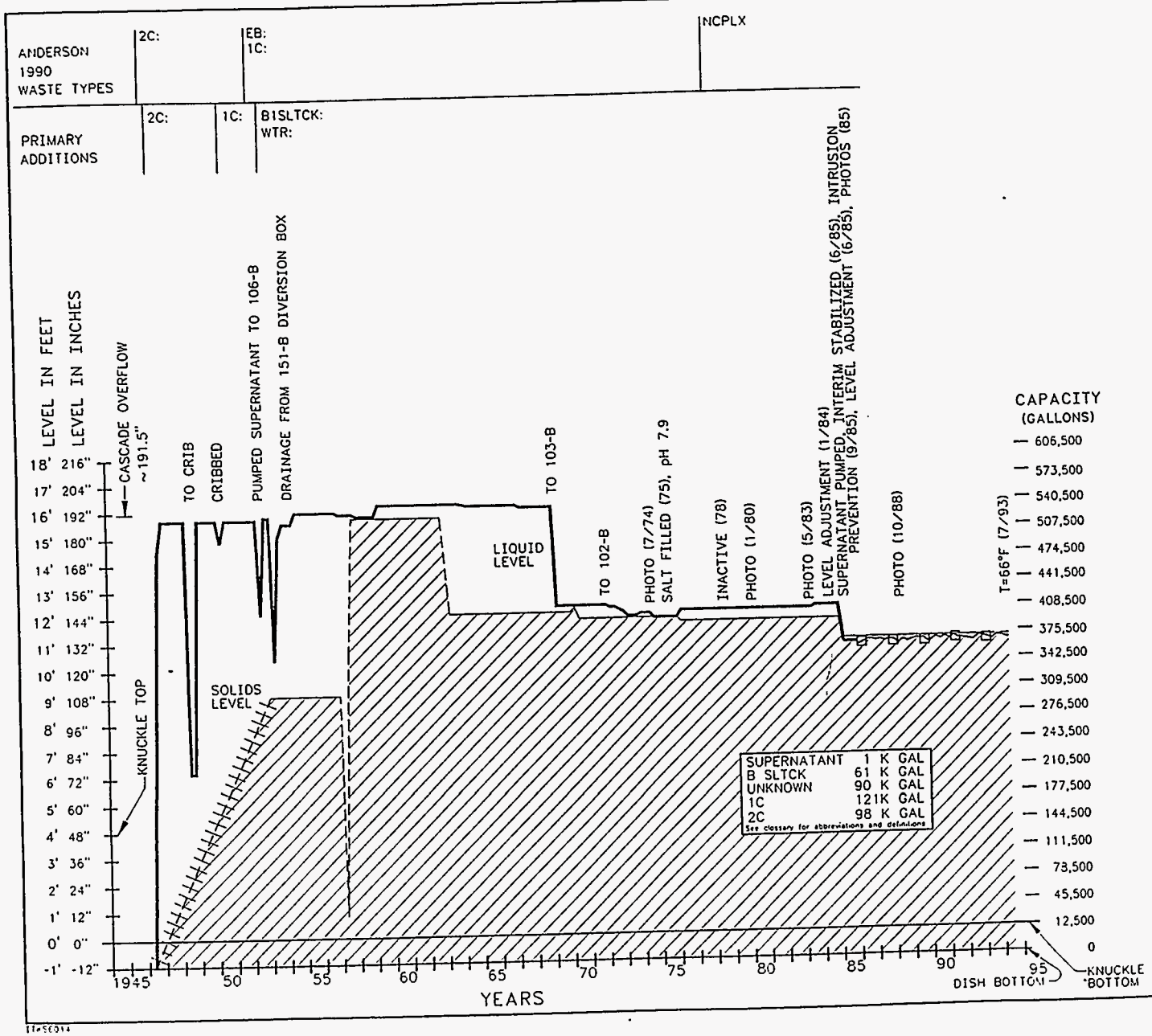
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-103 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: ORGANIC SALTS

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E13	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE,
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: MANUAL TAPE (LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-E[illegible]-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

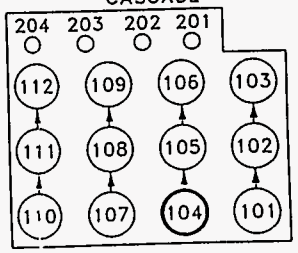
DWG. W-74108
DWG H-2-602
DWG. HW-72743

2C: SECOND CYCLE WASTE
EB: EVAPORATOR BOTTOMS
1C: FIRST CYCLE WASTE
NCPLX: NON-COMPLEXED WASTE
B1SLTCK: 242-B EVAPORATOR SALTCAKE WASTE
WTR: WASTE WATER

LEGEND

LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
LIQUID LEVEL BEST ENGINEERING JUDGEMENT
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

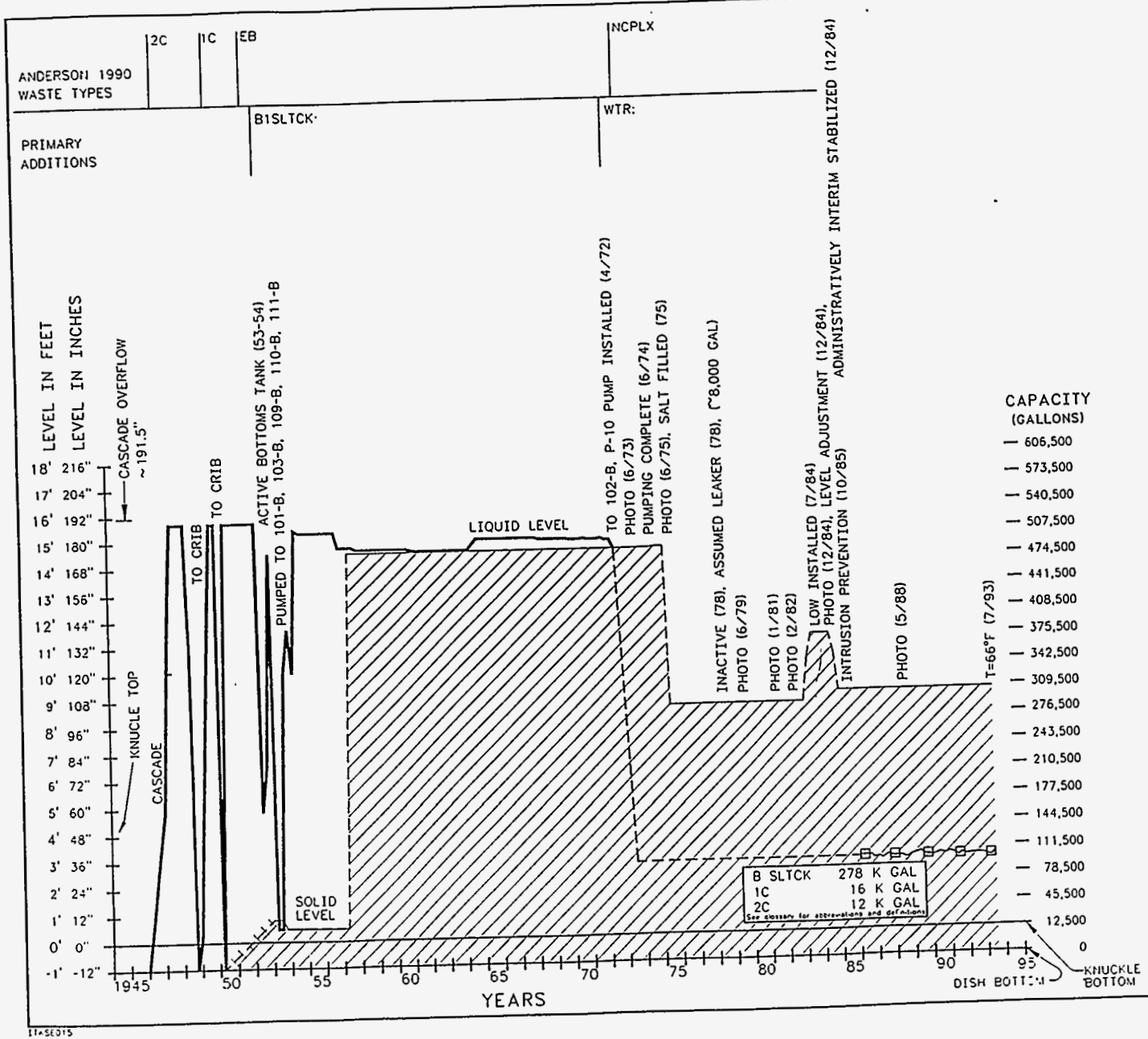
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-104 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
SOUNDSTABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E14	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE,
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: MANUAL TAPE (SOLIDS), PHOTO (LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)
WHC-TANK FARM ORIENTATION MANUAL-AUGUST 1992

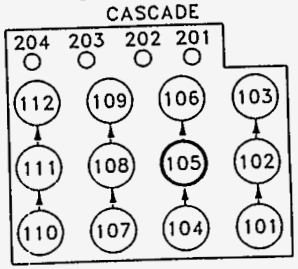
DWG. W-74108
DWG. H-2-602
DWG. HW-72743

2C: SECOND CYCLE WASTE
EB: EVAPORATOR BOTTOMS
1C: FIRST CYCLE WASTE
NCPLX: NON-COMPLEXED WASTE
B1SLTCK: 242-B EVAPORATOR SALTCAKE WASTE
WTR: WASTE WATER

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- LIQUID LEVEL BEST ENGINEERING JUDGEMENT
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

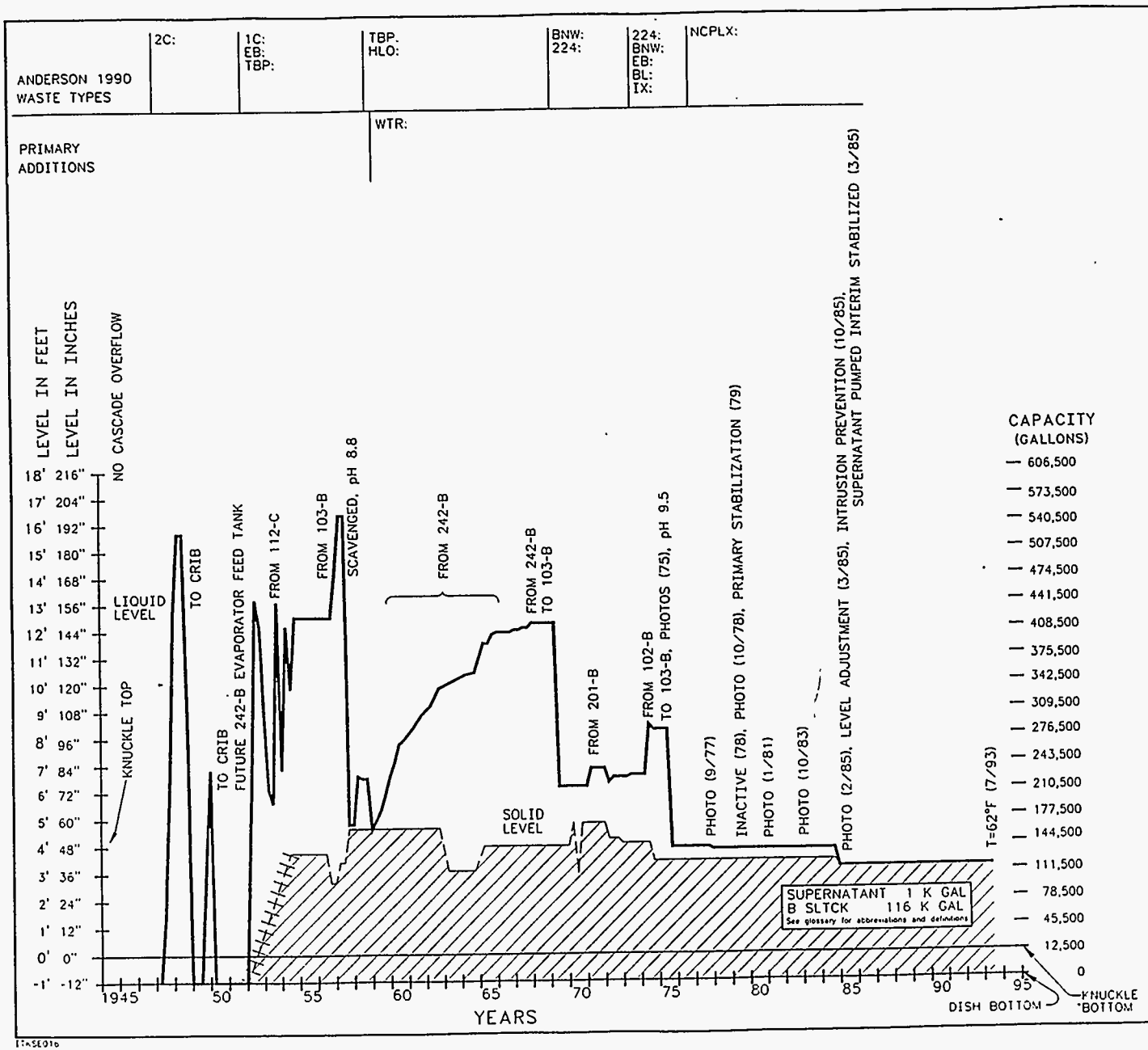
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-105 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E15	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
4 FOOT RADIUS KNUCKLE, DISH BOTTOM,
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: FIC
(LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

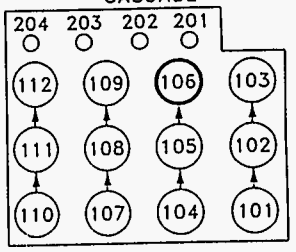
DWG. W-74108
DWG. H-2-605
DWG. H-2-72743

BNW: BATTELLE PNL WASTE
BL: B-PLANT LOW-LEVEL WASTE
EB: EVAPORATOR BOTTOMS
1C: FIRST CYCLE WASTE
IX: ION EXCHANGE WASTE
HLO: HANFORD LABORATORY OPERATIONS
224: 224-U WASTE
TBP: TRI-BUTYL PHOSPHATE
2C: SECOND CYCLE WASTE
NCPLX: NON-COMPLEXED WASTE
WTR: WASTE WATER

LEGEND

LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

B TANK FARM CASCADE

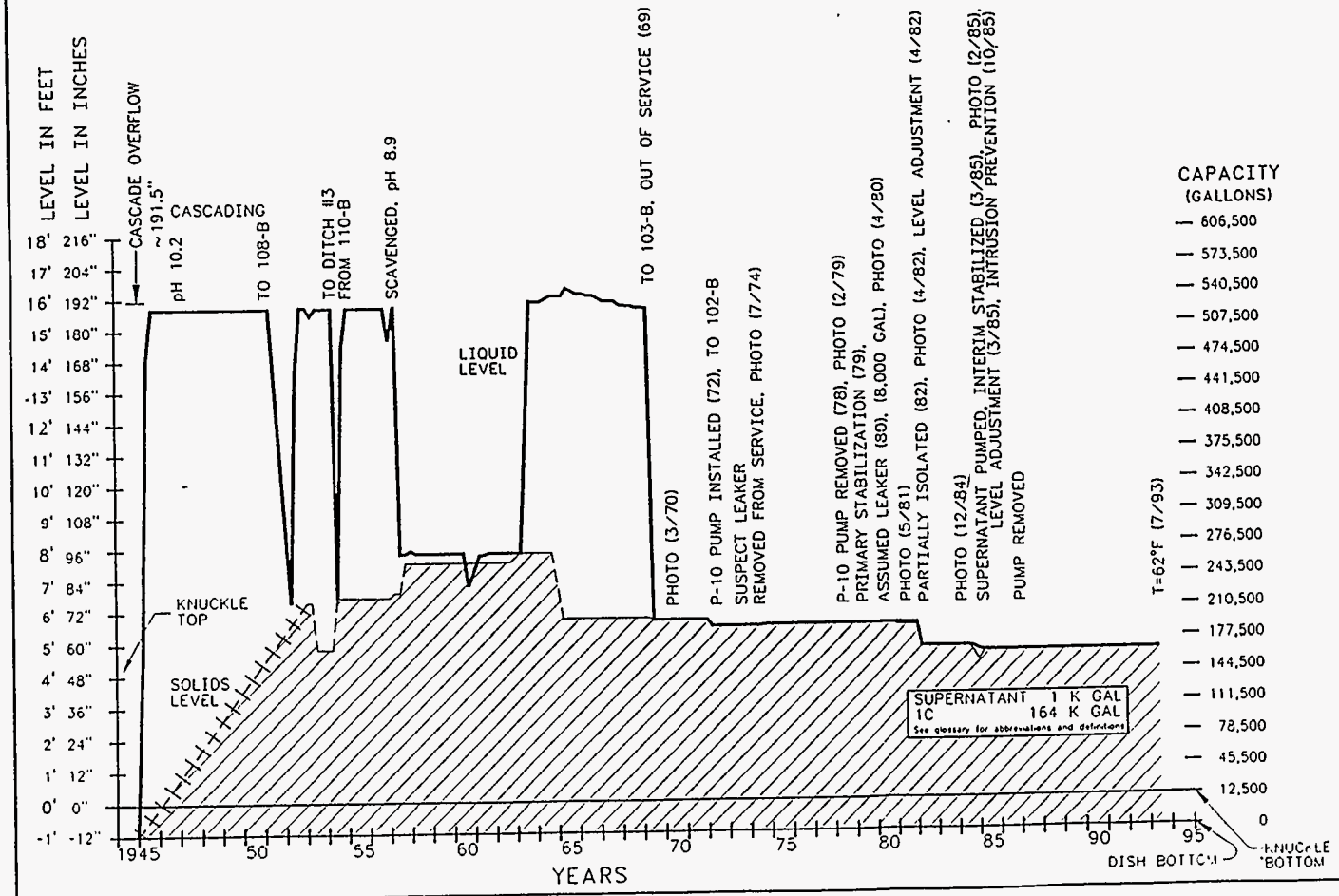


U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-106 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
SOUND/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E16	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	

ANDERSON 1990 WASTE TYPES	1C.	EB. 1C: TBP:	CW. 1C: EB: CW:	NCPLX:
PRIMARY ADDITIONS	1C	B1SLTCK:	CWP:	WTR:



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE
75 FOOT DIAMETER TANK
SURFACE LEVEL READING. MANUAL TAPE.
(LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

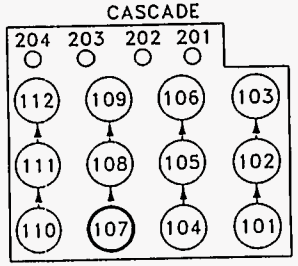
DWG. W-74108
DWG. H-2-605
DWG. H-2-72743

CW.	COATING WASTE
EB.	EVAPORATOR BOTTOMS
1C:	FIRST CYCLE WASTE
UR:	URANIUM RECOVERY WASTE
TBP:	TRI-BUTYL PHOSPHATE
NCPLX:	NON-COMPLEXED WASTE
B1SLTCK:	242-B EVAPORATOR SALTCAKE WASTE
CWP:	CLADDING WASTE-PUREX
WTR:	WASTE WATER

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

B TANK FARM CASCADE

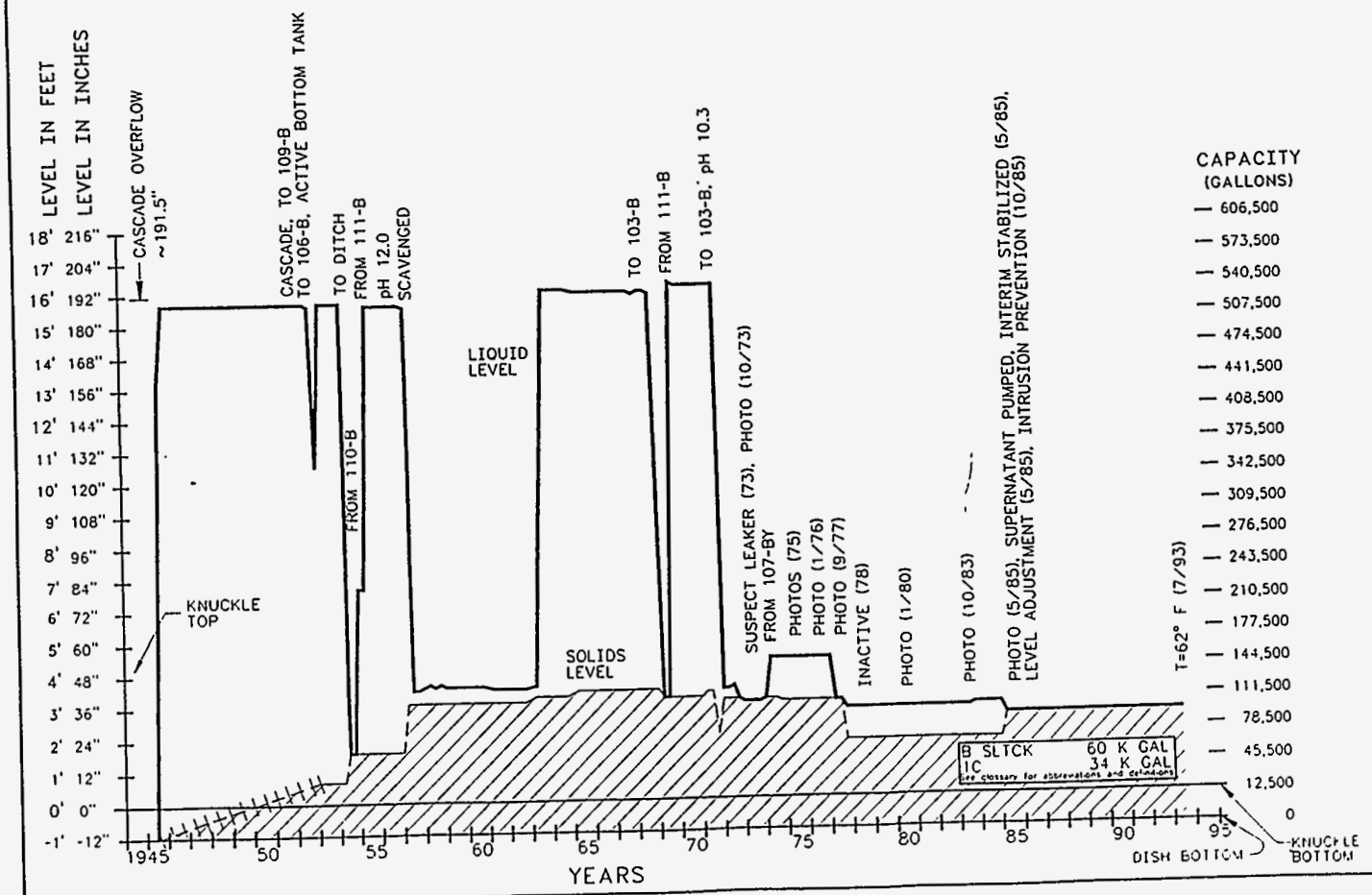


U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-107 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E17	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	

ANDERSON 1990 WASTE TYPES	1C:	EB	EB. CW	IX:	EB:	NCPLX:
PRIMARY ADDITIONS		B1SLTCK:	CWP:			



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY, 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE
75 FOOT DIAMETER TANK
SURFACE LEVEL READING, FIC
(LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

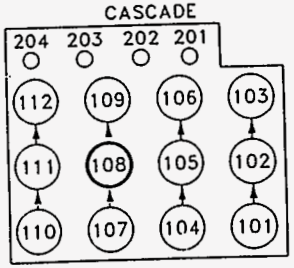
DWG. W-7410B
DWG. H-2-605
DWG. H-2-72743

CW: COATING WASTE
EB. EVAPORATOR BOTTOMS
1C: FIRST CYCLE WASTE
NCPLX: NON-COMPLEXED WASTE
IX: ION EXCHANGE WASTE
B1SLTCK: 242-B EVAPORATOR SALTCAKE WASTE
CWP: CLADDING WASTE-PUREX

LEGEND

LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

B TANK FARM CASCADE



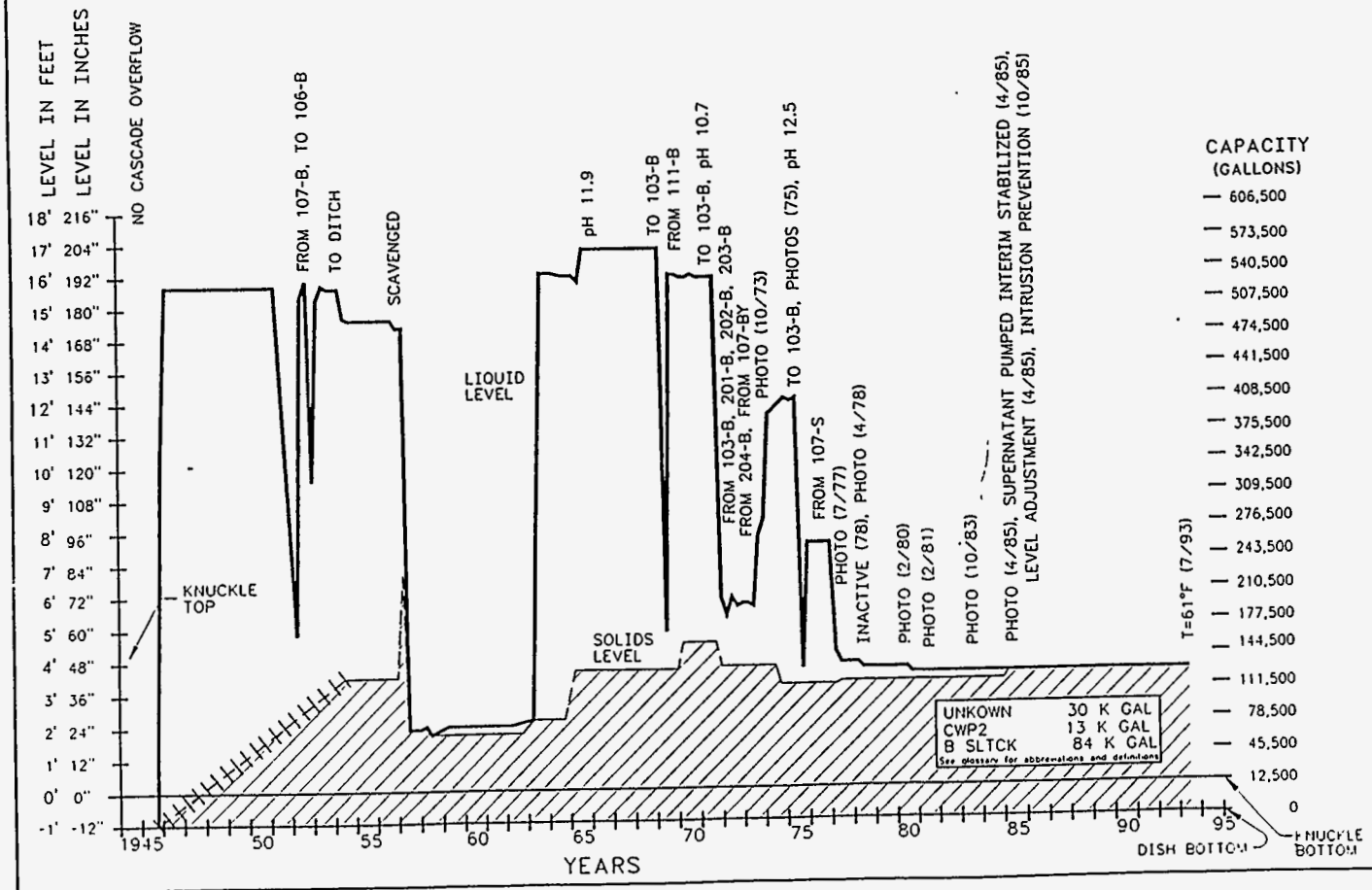
U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-108 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
SOUND/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E18	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	

IT-SE018

ANDERSON 1990 WASTE TYPES	1C:	EB.	CW.	CW IX:	224: IX: EB:	NCPLX.
PRIMARY ADDITIONS		B1SLTCK: WTR:	CWP:			



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: MANUAL TAPE (LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

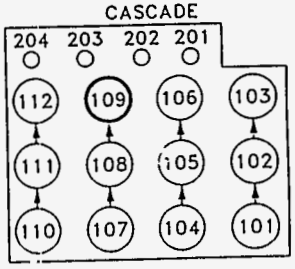
DWG W-74108
DWG. H-2-605
DWG. H-2-72743

CW	COATING WASTE
EB.	EVAPORATOR BOTTOMS
1C:	FIRST CYCLE WASTE
IX:	ION EXCHANGE WASTE
NCPLX:	NON-COMPLEXED WASTE
224.	224-U WASTE
B1SLTCK:	242-B EVAPORATOR SALTCAKE WASTE
WTR:	WASTE WATER
CWP:	CLADDING WASTE-PUREX

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

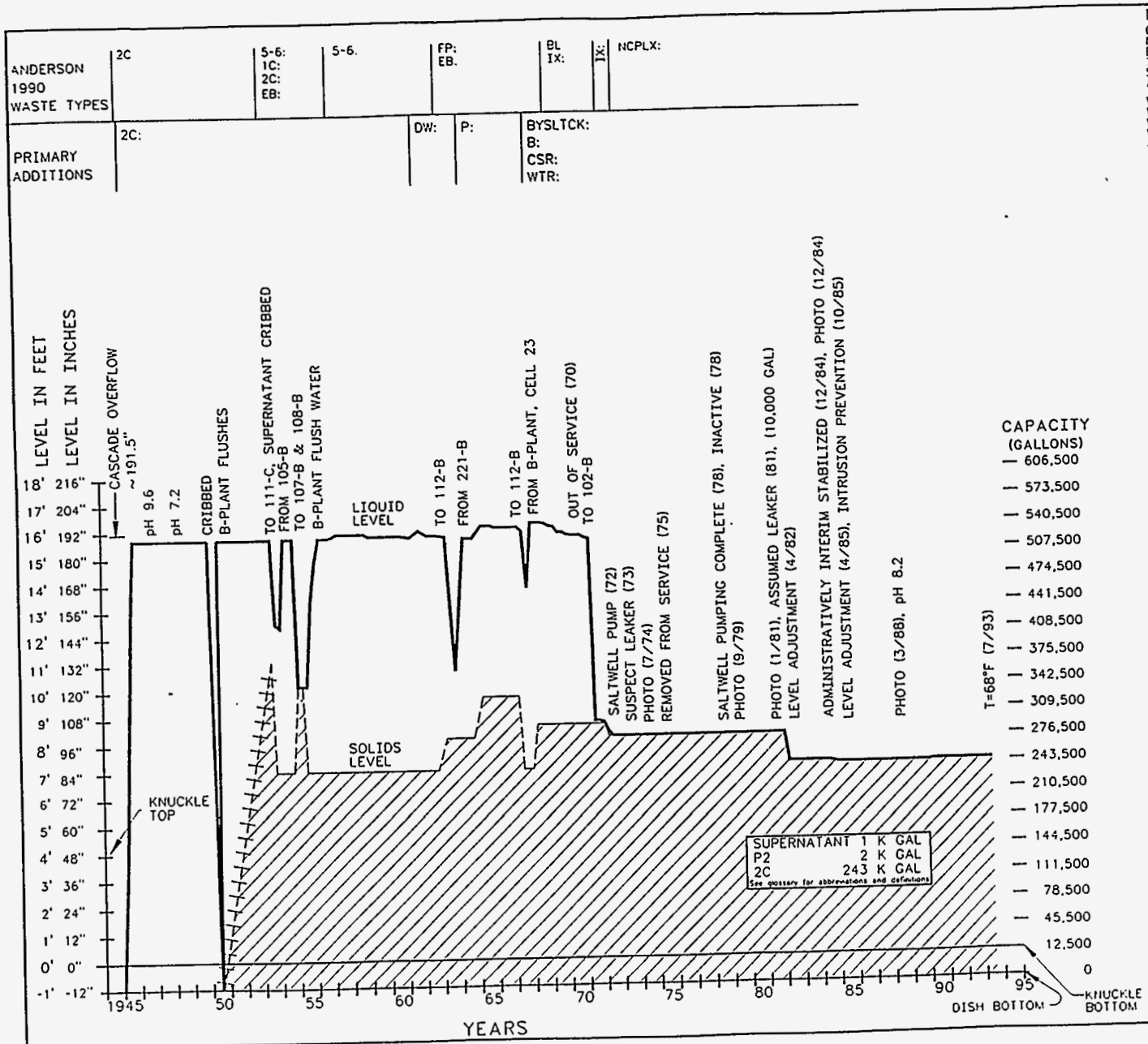
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-109 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
SOUND/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E19	6/94
SCALE NONE		JOB NO	SHEET 1 OF 1



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE
75 FOOT DIAMETER TANK
SURFACE LEVEL READINGS; MANUAL TAPE AND PHOTO EVALUATION (LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014-(MONTHLY)

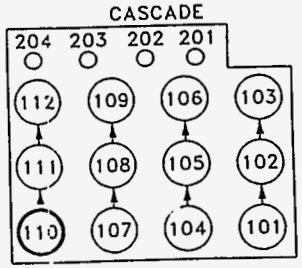
DWG. W-74108
DWG. H-2-605
DWG. H-2-72743

BL:	B-PLANT LOW-LEVEL WASTE
EB:	EVAPORATOR BOTTOMS
FP:	FISSION PRODUCT WASTE
IX:	ION EXCHANGE WASTE
1C:	FIRST CYCLE WASTE
2C:	SECOND CYCLE WASTE
5-6:	CELL 5-6 WASTE
NCPLX:	NON-COMPLEXED WASTE
DW:	DECONTAMINATION WASTE
P:	PUREX HIGH-LEVEL WASTE
BYSLTCK:	IN-TANK SOLIDIFICATION WASTE
B:	B PLANT HIGH-LEVEL WASTE
CSR:	CESIUM RECOVERY WASTE
WTR:	WASTE WATER

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

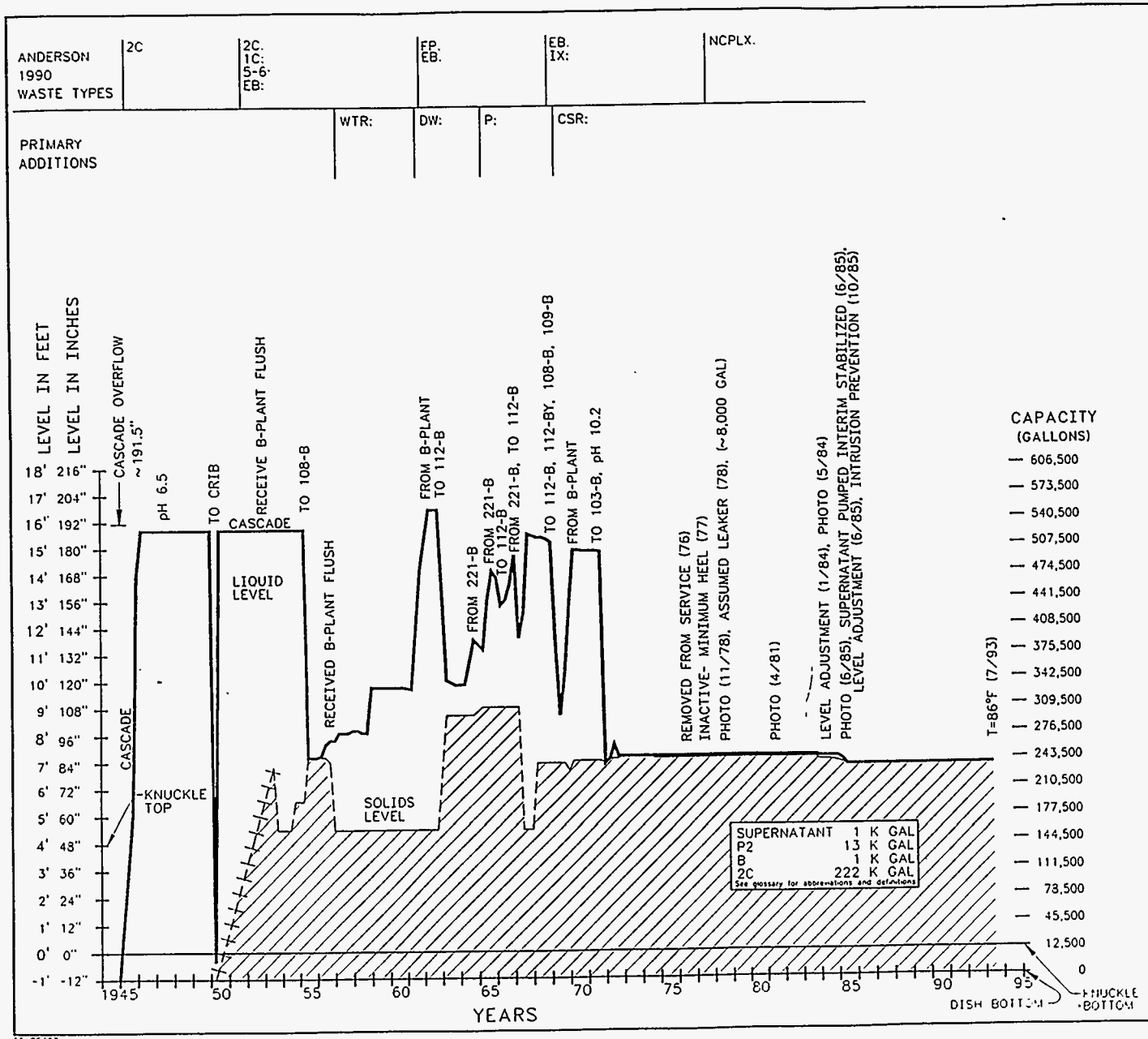
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-110 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E20	6/94
SCALE NONE		JOB NO	SHEET 1 OF 1



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE.
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: FIC
(LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

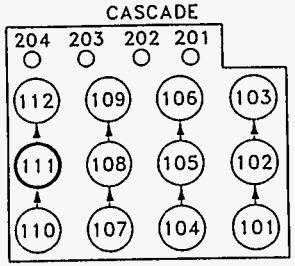
DWG. W-74108
DWG. H-2-602
DWG. HW-72743

2C:	SECOND CYCLE WASTE
EB:	EVAPORATOR BOTTOMS
1C:	FIRST CYCLE WASTE
FP:	FISION PRODUCT WASTE
5-6:	CELL 5-6 WASTE
IX:	ION EXCHANGE WASTE
NCPLX:	NON-COMPLEXED WASTE
WTR:	WASTE WATER
DW:	DECONTAMINATION WASTE
P:	PUREX HIGH-LEVEL WASTE
CSR:	CESIUM RECOVERY WASTE

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

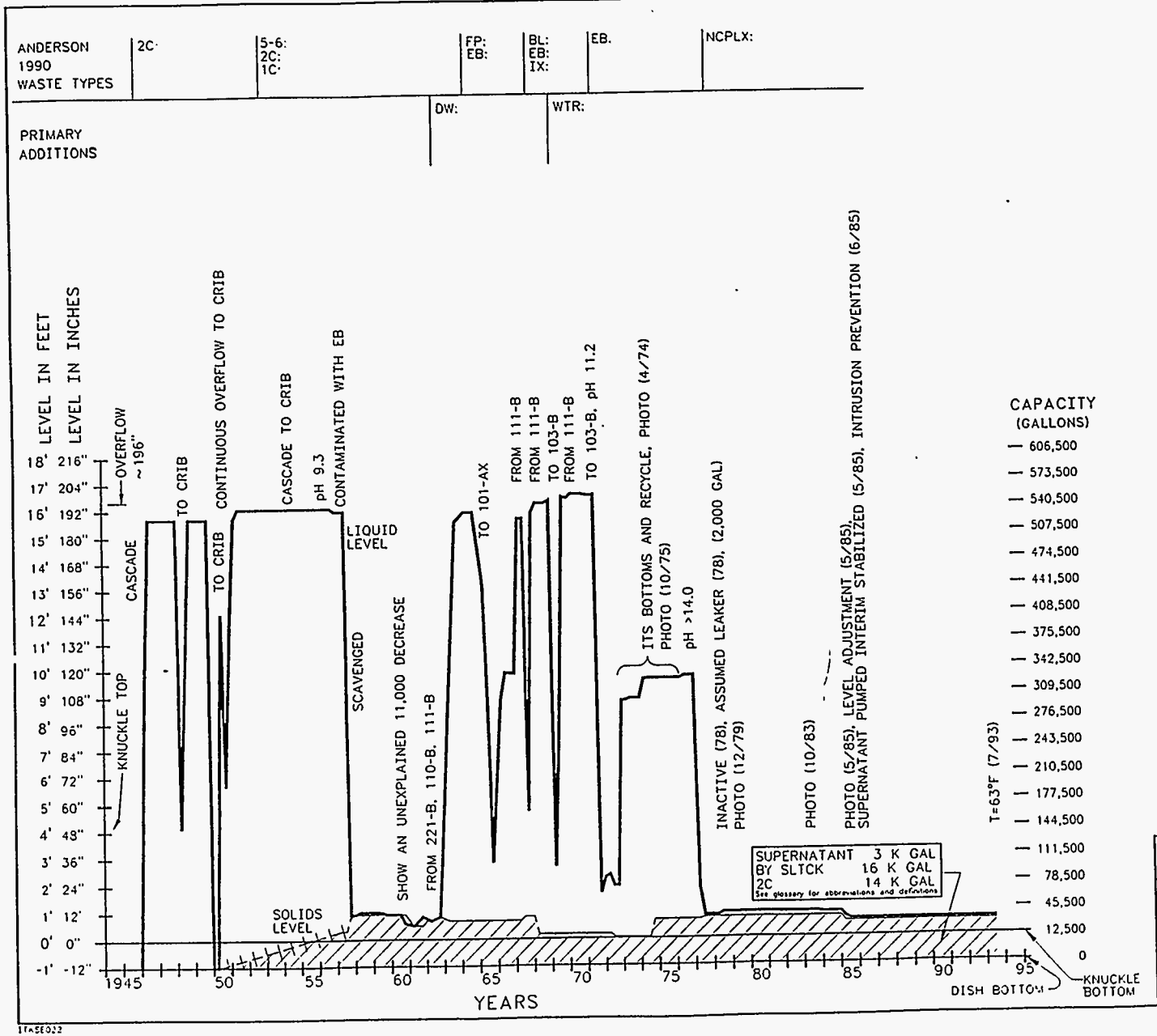
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-111 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E21	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 530,000 GAL
DISH BOTTOM, 4 FOOT RADIUS KNUCKLE.
75 FOOT DIAMETER TANK
SURFACE LEVEL READING: FIC
(LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014 (MONTHLY)

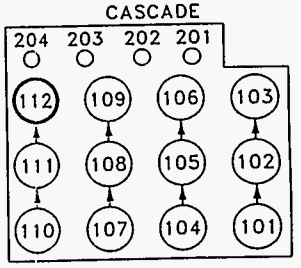
DWG. W-74108
DWG. H-2-602
DWG. HW-72743

NCPLX: NON-COMPLEXED WASTE
EB: EVAPORATOR BOTTOMS
1C: FIRST CYCLE WASTE
IX: ION EXCHANGE WASTE
5-6: CELL 5-6 WASTE
BL: B-PLANT LOW-LEVEL WASTE
2C: SECOND CYCLE WASTE
FP: FISSION PRODUCT WASTE
DW: DECONTAMINATION WASTE
WTR: WASTE WATER

LEGEND

LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

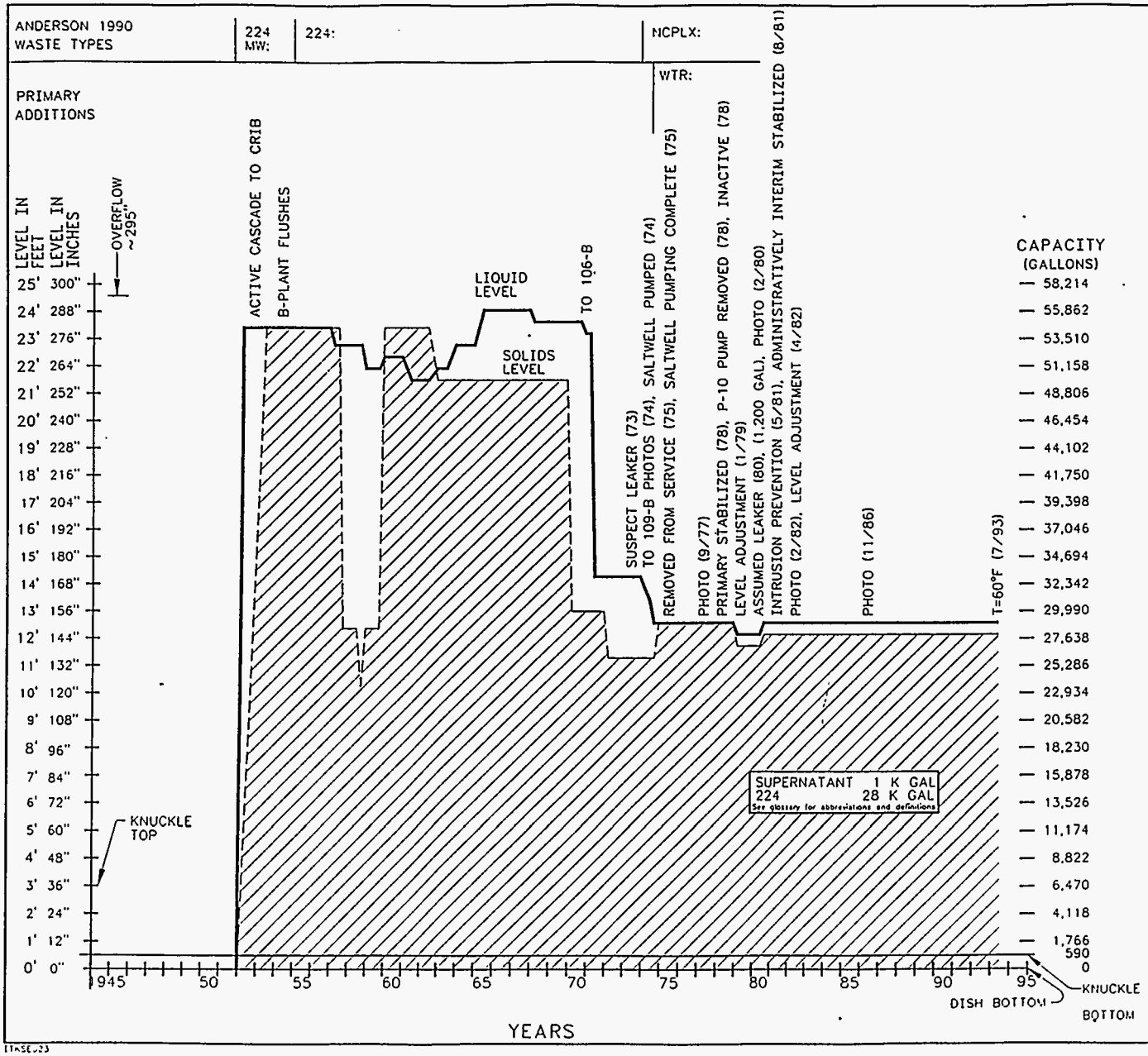
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-112 SINGLE-SHELL TANK
LEVEL HISTORY 1945 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E22	5/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 55,000 GAL
DISH BOTTOM, 3 FOOT RADIUS KNUCKLE
20 FOOT DIAMETER TANK
SURFACE LEVEL READINGS: MANUAL TAPE (LIQUIDS AND SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014-(MONTHLY)

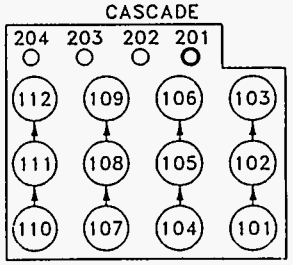
DWG. HW-72742
DWG. HW-72132

224: 224-U WASTE
MW: METAL WASTE
NCPLX: NON-COMPLEXED WASTE
WTR: WASTE WATER

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

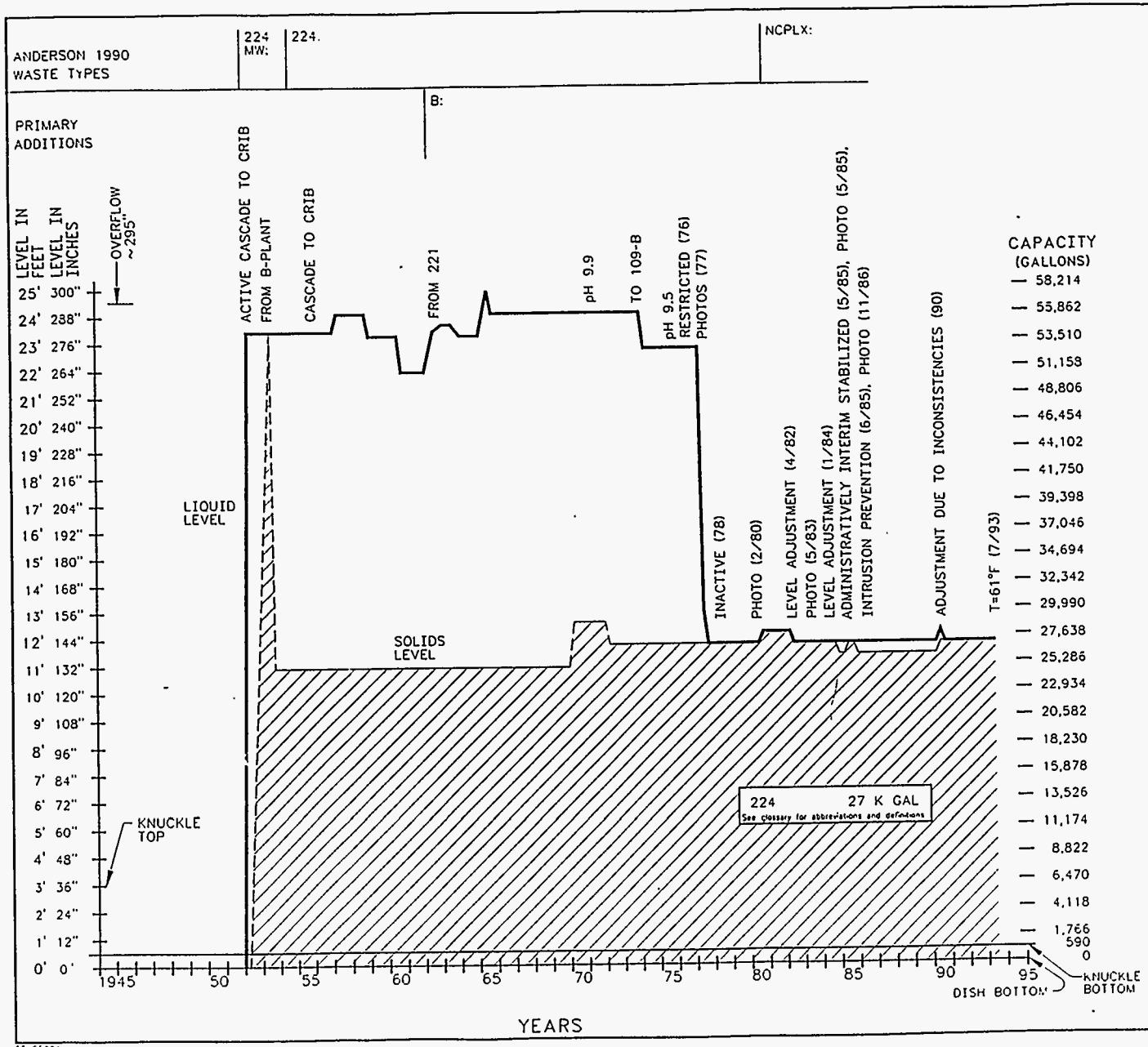
B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-201 SINGLE-SHELL TANK
LEVEL HISTORY 1951 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E23	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 55,000 GAL
DISH BOTTOM, 3 FOOT RADIUS KNUCKLE
20 FOOT DIAMETER TANK
SURFACE LEVEL READINGS: MANUAL TAPE (SOLIDS), PHOTO EVALUATION (LIQUIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014-(MONTHLY)

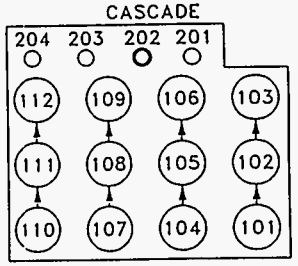
DWG. HW-72742
DWG. HW-72132

224: 224-U WASTE
MW: METAL WASTE
NCPLX: NON-COMPLEXED WASTE
B: B PLANT HIGH-LEVEL WASTE

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

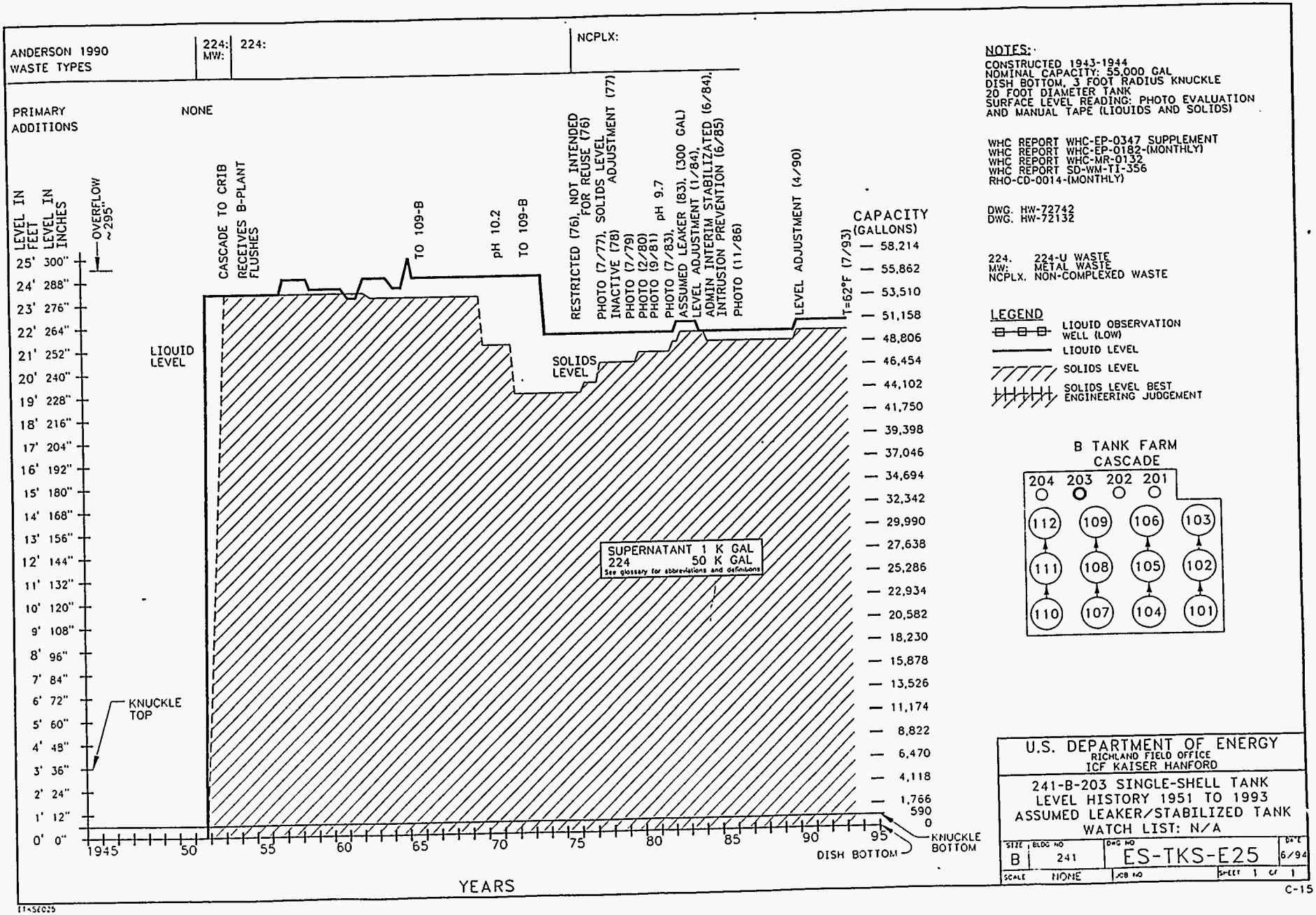
B TANK FARM CASCADE

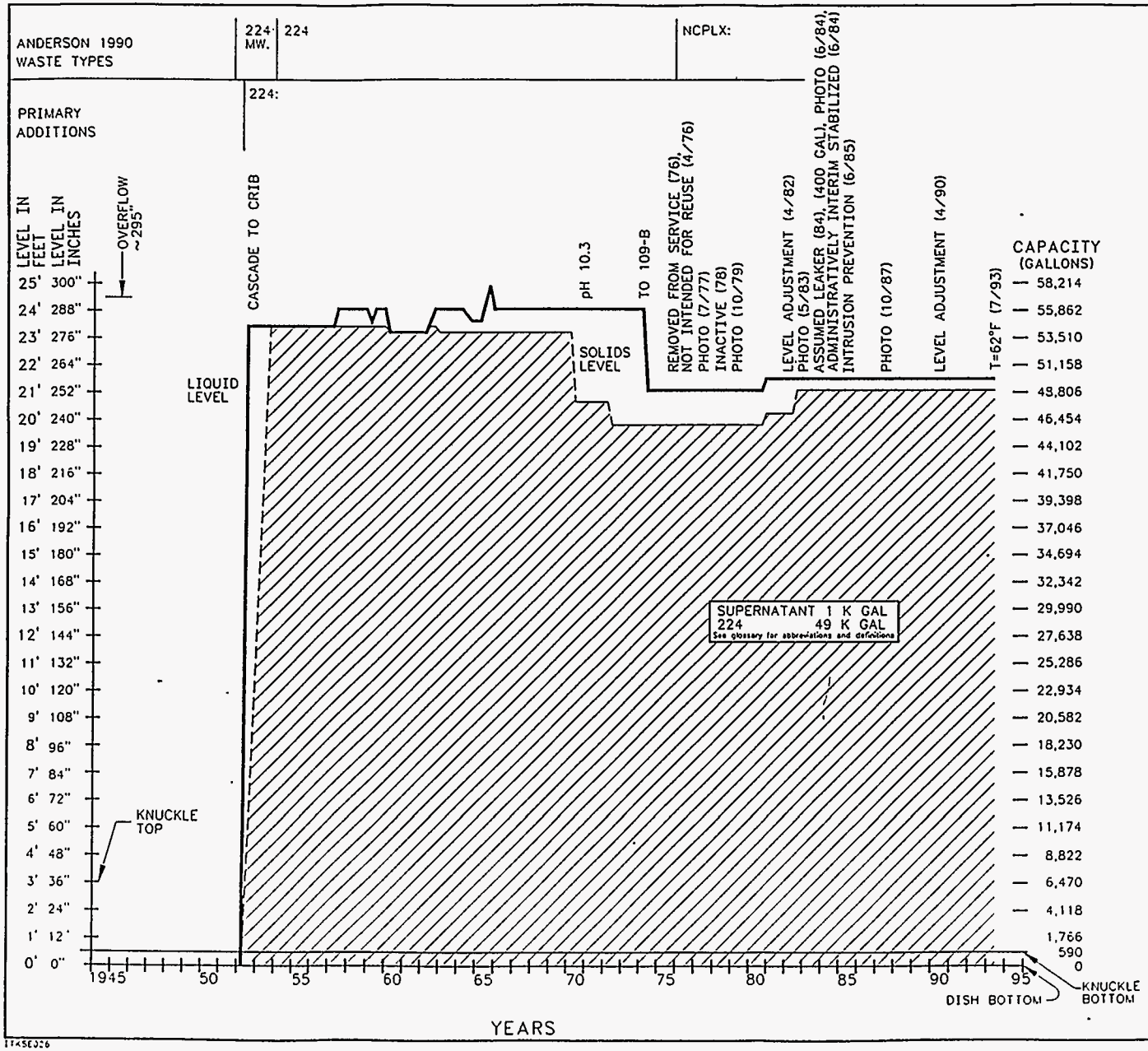


U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-202 SINGLE-SHELL TANK
LEVEL HISTORY 1951 TO 1993
SOUND/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E24	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	


ANDERSON 1990 WASTE TYPES
224: MW:
224:
NCPLX:
PRIMARY ADDITIONS
NONE
LEVEL IN FEET
LEVEL IN INCHES
OVERFLOW ~295"
CASCADE TO CRIB
RECEIVES B-PLANT FLUSHES
TO 109-B
pH 10.2
TO 109-B
RESTRICTED (76), NOT INTENDED FOR REUSE (76)
PHOTO (7/77), INACTIVE (78) SOLIDS LEVEL ADJUSTMENT (77)
PHOTO (7/79)
PHOTO (2/80)
PHOTO (9/81) pH 9.7
PHOTO (7/83), ASSUMED LEAKER (83), (300 GAL)
LEVEL ADJUSTMENT (1/84), ADMIN INTERIM STABILIZATED (6/84), INTRUSION PREVENTION (6/85)
PHOTO (11/86)
LEVEL ADJUSTMENT (4/90)
T=62°F (7/93)
CAPACITY (GALLONS)
LIQUID LEVEL
SOLIDS LEVEL
SUPERNATANT 1 K GAL
224 50 K GAL
See glossary for abbreviations and definitions
KNUCKLE TOP
KNUCKLE BOTTOM
DISH BOTTOM
YEARS
NOTES:
CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 55,000 GAL
DISH BOTTOM, 3 FOOT RADIUS KNUCKLE
20 FOOT DIAMETER TANK
SURFACE LEVEL READING: PHOTO EVALUATION AND MANUAL TAPE (LIQUIDS AND SOLIDS)
WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014-(MONTHLY)
DWG. HW-72742
DWG. HW-72132
224. 224-U WASTE
MW: METAL WASTE
NCPLX. NON-COMPLEXED WASTE
LEGEND
LIQUID OBSERVATION WELL (LOW)
LIQUID LEVEL
SOLIDS LEVEL
SOLIDS LEVEL BEST ENGINEERING JUDGEMENT
B TANK FARM CASCADE
204 203 202 201
112 109 106 103
111 108 105 102
110 107 104 101
U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD
241-B-203 SINGLE-SHELL TANK
LEVEL HISTORY 1951 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A
SIZE B
BLDG NO 241
DWG NO ES-TKS-E25
DATE 6/94
SCALE NONE
JOB NO
SHEET 1 OF 1



NOTES:

CONSTRUCTED 1943-1944
NOMINAL CAPACITY: 55,000 GAL
DISH BOTTOM, 3 FOOT RADIUS KNUCKLE
20 FOOT DIAMETER TANK
SURFACE LEVEL READING: PHOTO (LIQUID), MANUAL TAPE (SOLIDS)

WHC REPORT WHC-EP-0347 SUPPLEMENT
WHC REPORT WHC-EP-0182-(MONTHLY)
WHC REPORT WHC-MR-0132
WHC REPORT SD-WM-TI-356
RHO-CD-0014-(MONTHLY)

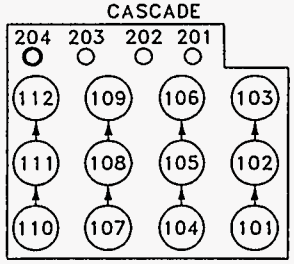
DWG. HW-72742
DWG. HW-72132

224: 224-U WASTE
MW: METAL WASTE
NCPLX: NON-COMPLEXED WASTE

LEGEND

- LIQUID OBSERVATION WELL (LOW)
- LIQUID LEVEL
- SOLIDS LEVEL
- SOLIDS LEVEL BEST ENGINEERING JUDGEMENT

B TANK FARM CASCADE



U.S. DEPARTMENT OF ENERGY
RICHLAND FIELD OFFICE
ICF KAISER HANFORD

241-B-204 SINGLE-SHELL TANK
LEVEL HISTORY 1951 TO 1993
ASSUMED LEAKER/STABILIZED TANK
WATCH LIST: N/A

SIZE	BLDG NO	DWG NO	DATE
B	241	ES-TKS-E26	6/94
SCALE NONE	JOB NO	SHEET 1 OF 1	

241-B-101 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2	168	57		
3	512	182		
4	530	188		
1-1946	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1952	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1953	1291	465		
2				
3	0	-12		
4	223	77		
1-1954	527	187		
2	527	187		
3	527	187		
4	527	187		
1-1955	527	187		
2	527	187		

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	527	187		
4	527	187		
1-1956	527	187		
2	527	187		
3	527	187		
4	527	187		
1-1957	538	191		
2	541	192	106	34
3	318	111	315	110
4	318	111	315	110
1-1958	318	111	315	110
2	321	112	315	110
3	321	112	315	110
4	321	112	315	110
1-1959	321	112	315	110
2	313	109	315	110
3	313	109	315	110
4	316	110	315	110
1-1960	316	110	315	110
2	403	142	315	110
3	403	142	315	110
4	403	142	315	110
1-1961	403	142	315	110
2	403	142	315	110
3	403	142	315	110
4	403	142	315	110
1-1962	403	142	315	110
2	403	142	315	110
3	403	142	315	110
4	403	142	315	110
1-1963				
2	403	142	202	69
3			202	69
4	525	186	202	69
1-1964	525	186	202	69
2	525	186	202	69
3	525	186	202	69
4	525	186	202	69
1-1965				
2	527	187	161	54
3	527	187	161	54
4	527	187	161	54
1-1966	527	187	161	54
2	527	187	161	54
3	527	187	161	54
4	527	187	161	54

241-B-101 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	527	187	161	54
2	527	187	161	54
3	527	187	161	54
4	527	187	161	54
1-1968	527	187	161	54
2	527	187	161	54
3	527	187	161	54
4	528	187	161	54
1-1969	151	50	151	50
2	356	125	151	50
3	290	101	151	50
4	220	75	151	50
1-1970	349	122	151	50
2	403	142	150	50
3	355	125	106	34
4	497	176	103	33
1-1971	436	154	103	33
2	259	90	103	33
3	502	178	103	33
4	469	166	103	33
1-1972	508	180	103	33
2	433	153	103	33
3	502	178	109	35
4	535	190	109	35
1-1973	514	182	109	35
2	513	182	109	35
3	512	182	109	35
4	511	181	109	35
1-1974	509	181	109	35
2	440	155	109	35
3	432	153	109	35
4	334	117	136	45
1-1975	136	45	136	45
2	136	45	136	45
3	136	45	136	45
4	136	45	136	45
1-1976	103	33	103	33
2	103	33	103	33
3	103	33	103	33
4	103	33	103	33
1-1977	103	33	103	33
2	103	33	103	33
3	103	33	103	33
4	103	33	103	33
1-1978	103	33	103	33
2	103	33	103	33

241-B-101 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	103	33	103	33
4	103	33	103	33
1-1979	103	33	103	33
2	103	33	103	33
3	103	33	103	33
4	103	33	103	33
1-1980	103	33	103	33
2	103	33	103	33
3	103	33	103	33
4	103	33	103	33
1-1981	103	33	103	33
2	103	33	103	33
3	103	33	103	33
4	103	33	103	33
1-1982	103	33	103	33
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1983	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1984	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1985	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1986	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1987	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1988	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1989	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37

241-B-101 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1991	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1992	113	37	113	37
2	113	37	113	37
3	113	37	113	37
4	113	37	113	37
1-1993	113	37	113	37
2	113	37	113	37
3				
4				

241-B-102 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4	530	188		
1-1946	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1952	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1953	530	188		
2				
3	0	-12		
4	530	188		
1-1954	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1955	530	188		
2	530	188		

241-B-102 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	530	188		
4	530	188		
1-1956	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1957	502	178		
2	502	178		
3	84	26		
4	114	37	84	26
1-1958	114	37	84	26
2	114	37	84	26
3	114	37	84	26
4	114	37	84	26
1-1959	114	37	84	26
2	120	39	84	26
3	120	39	84	26
4	120	39	84	26
1-1960	120	39	84	26
2	120	39	84	26
3	120	39	84	26
4	120	39	84	26
1-1961	120	39	84	26
2	120	39	84	26
3			84	26
4	125	41	84	26
1-1962			84	26
2	123	40	84	26
3	123	40	84	26
4	123	40	84	26
1-1963				
2	494	175	40	10
3				
4	542	193	40	10
1-1964	542	193	40	10
2	542	193	40	10
3			40	10
4	535	190	40	10
1-1965				
2	532	189	24	4
3	532	189	24	4
4	532	189	24	4
1-1966	532	189	24	4
2	532	189	24	4
3	532	189	24	4
4	532	189	24	4

241-B-102 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	532	189	24	4
2	532	189	24	4
3	532	189	24	4
4	532	189	24	4
1-1968	531	189	24	4
2	534	190	24	4
3	534	190	24	4
4	534	190	24	4
1-1969	26	5	24	4
2	25	5	24	4
3	228	78	24	4
4	513	182	24	4
1-1970	514	182	24	4
2	98	31	55	15
3	272	94	55	15
4	271	94	55	15
1-1971	277	96	55	15
2	277	96	55	15
3	499	177	55	15
4	81	25	55	15
1-1972	95	30	34	8
2	186	63	34	8
3	310	108	33	7
4	395	139	33	7
1-1973	485	172	33	7
2	492	174	33	7
3	493	175	33	7
4	497	176	33	7
1-1974	497	176	33	7
2	511	181	33	7
3	452	160	33	7
4	462	163	35	8
1-1975	469	166	35	8
2	200	68	35	8
3	208	71	35	8
4	219	75	35	8
1-1976	43	11	35	8
2	48	13	35	8
3	59	17	35	8
4	68	20	51	14
1-1977	73	22	40	10
2	79	24	40	10
3	43	11	40	10
4	48	13	40	10
1-1978	51	14	40	10
2	54	15	37	9

241-B-102 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	54	15	37	9
4	54	15	37	9
1-1979	51	14	37	9
2	51	14	37	9
3	51	14	37	9
4	51	14	37	9
1-1980	51	14	37	9
2	51	14	37	9
3	51	14	37	9
4	51	14	37	9
1-1981	51	14	37	9
2	51	14	37	9
3	51	14	37	9
4	51	14	37	9
1-1982	51	14	37	9
2	51	14	37	9
3	51	14	37	9
4	51	14	37	9
1-1983	51	14	37	9
2	51	14	37	9
3	51	14	37	9
4	57	16	37	9
1-1984	57	16	37	9
2	57	16	37	9
3	57	16	37	9
4	57	16	37	9
1-1985	57	16	37	9
2	57	16	37	9
3	32	7	28	6
4	32	7	28	6
1-1986	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6
1-1987	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6
1-1988	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6
1-1989	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6

241-B-102 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6
1-1991	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6
1-1992	32	7	28	6
2	32	7	28	6
3	32	7	28	6
4	32	7	28	6
1-1993	32	7	28	6
2	32	7	28	6
3				
4				

241-B-103 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4	67	20		
1-1946	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1952	530	188		
2	519	184		
3	519	184		
4	519	184		
1-1953	1291	465		
2	359	126		
3	327	114		
4	12	0		
1-1954	554	197		
2	554	197		
3	554	197		
4	554	197		
1-1955	554	197		
2	554	197		

241-B-103 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	554	197		
4	554	197		
1-1956	554	197		
2	554	197		
3	554	197		
4	554	197		
1-1957	554	197		
2	530	188		
3	230	79	227	78
4	235	81	227	78
1-1958	235	81	227	78
2	238	82	227	78
3	238	82	227	78
4	238	82	227	78
1-1959	238	82	227	78
2	238	82	227	78
3	238	82	227	78
4	238	82	227	78
1-1960	238	82	227	78
2	238	82	227	78
3	238	82	227	78
4	238	82	227	78
1-1961			227	78
2	241	83	227	78
3	241	83	227	78
4	241	83	227	78
1-1962			227	78
2	222	76	227	78
3	222	76		
4	222	76	220	75
1-1963	222	76		
2	222	76	59	17
3			59	17
4	503	178	59	17
1-1964			59	17
2	536	190	59	17
3			59	17
4	552	196	59	17
1-1965			59	17
2	560	199	59	17
3	560	199	59	17
4	560	199	59	17
1-1966	560	199	59	17
2	560	199	59	17
3	560	199	59	17
4	560	199	59	17

241-B-103 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	560	199	59	17
2	560	199	59	17
3	560	199	59	17
4	560	199	59	17
1-1968	558	198	59	17
2	558	198	59	17
3	559	199	59	17
4	560	199	59	17
1-1969	66	19	59	17
2	158	53	59	17
3	55	15	55	15
4	55	15	55	15
1-1970	263	91	55	15
2	541	192	55	15
3	541	192	55	15
4	541	192	55	15
1-1971	541	192	55	15
2	540	192	59	17
3	539	191	59	17
4	206	70	20	3
1-1972	52	14	52	14
2	59	17	52	14
3	68	20	52	14
4	87	27	52	14
1-1973	87	27	52	14
2	270	94	52	14
3	251	87	52	14
4	489	173	52	14
1-1974	489	173	52	14
2	489	173	52	14
3	504	179	52	14
4	499	177	68	20
1-1975	499	177	68	20
2	499	177	68	20
3	505	179	68	20
4	299	104	68	20
1-1976				
2				
3				
4				
1-1977	131	43	68	20
2	90	28	68	20
3	90	28	68	20
4	90	28	68	20
1-1978	90	28	68	20
2	92	29	68	20

241-B-103 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	92	29	68	20
4	92	29	68	20
1-1979	92	29	68	20
2	92	29	68	20
3	92	29	68	20
4	92	29	68	20
1-1980	92	29	68	20
2	92	29	68	20
3	92	29	68	20
4	92	29	68	20
1-1981	92	29	68	20
2	92	29	68	20
3	92	29	68	20
4	92	29	68	20
1-1982	92	29	68	20
2	100	32	68	20
3	100	32	68	20
4	100	32	68	20
1-1983	100	32	68	20
2	100	32	68	20
3	100	32	68	20
4	103	33	67	20
1-1984	103	33	67	20
2	103	33	67	20
3	103	33	67	20
4	103	33	67	20
1-1985	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1986	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1987	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1988	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1989	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17

241-B-103 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1991	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1992	59	17	59	17
2	59	17	59	17
3	59	17	59	17
4	59	17	59	17
1-1993	59	17	59	17
2	59	17	59	17
3				
4				

241-B-104 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
1-1944					
2					
3					
4					
1-1945					
2					
3					
4					
1-1946					
2					
3	165	55			
4	488	173			
1-1947	530	188			
2	530	188			
3	530	188			
4	530	188			
1-1948	530	188			
2	530	188			
3	216	74			
4	216	74			
1-1949	530	188			
2	530	188			
3	530	188			
4	530	188			
1-1950	530	188			
2	501	178			
3	530	188			
4	530	188			
1-1951	530	188			
2	530	188			
3					
4					
1-1952	530	188			
2	530	188			
3	410	145			
4	531	189			
1-1953	531	189	309	108	
2	354	124	309	108	
3	508	180	309	108	
4	525	186	309	108	
1-1954	525	186	309	108	
2	525	186	309	108	
3	537	191	309	108	
4	537	191	309	108	
1-1955	537	191	309	108	
2	537	191	309	108	

241-B-104 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
3	537	191	309	108	
4	537	191	309	108	
1-1956	537	191	309	108	
2	537	191	309	108	
3	537	191	309	108	
4	537	191	309	108	
1-1957	535	190	309	108	
2	535	190	40	10	
3	535	190	365	128	
4	535	190	530	188	
1-1958	532	189	530	188	
2	532	189	530	188	
3	532	189	530	188	
4	532	189	530	188	
1-1959	532	189	530	188	
2	546	194	530	188	
3	546	194	530	188	
4	546	194	530	188	
1-1960	546	194	530	188	
2	546	194	530	188	
3	546	194	530	188	
4	546	194	530	188	
1-1961	546	194	530	188	
2	546	194	530	188	
3	546	194	530	188	
4	546	194	530	188	
1-1962	546	194	530	188	
2	546	194	530	188	
3	546	194	530	188	
4	546	194	530	188	
1-1963	546	194			
2	546	194	409	144	
3	546	194	409	144	
4	546	194	409	144	
1-1964			409	144	
2	542	193	409	144	
3	542	193	409	144	
4	542	193	409	144	
1-1965	542	193	409	144	
2	542	193	409	144	
3	542	193	409	144	
4	542	193	409	144	
1-1966	542	193	409	144	
2	542	193	409	144	
3	542	193	409	144	
4	542	193	409	144	

241-B-104 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
1-1967	542	193	409	144	
2	541	192	409	144	
3	541	192	409	144	
4	541	192	409	144	
1-1968	541	192	409	144	
2	541	192	409	144	
3	541	192	409	144	
4	541	192	409	144	
1-1969	541	192	409	144	
2	417	147	409	144	
3	417	147	409	144	
4	417	147	409	144	
1-1970	417	147	409	144	
2	417	147	414	146	
3	418	147	400	141	
4	417	147	400	141	
1-1971	417	147	400	141	
2	418	147	400	141	
3	418	147	400	141	
4	418	147	400	141	
1-1972	418	147	400	141	
2	415	146	400	141	
3	414	146	400	141	
4	411	145	400	141	
1-1973	408	144	400	141	
2	403	142	400	141	
3	404	142	400	141	
4	404	142	400	141	
1-1974	405	143	400	141	
2	407	143	400	141	
3	407	143	400	141	
4	400	141	400	141	
1-1975	400	141	400	141	
2	400	141	400	141	
3	400	141	400	141	
4	400	141	400	141	
1-1976	400	141	400	141	
2	409	144	395	139	
3	409	144	395	139	
4	409	144	395	139	
1-1977	409	144	395	139	
2	409	144	395	139	
3	409	144	395	139	
4	409	144	395	139	
1-1978	409	144	395	139	
2	409	144	395	139	

241-B-104 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
3	409	144	395	139	
4	409	144	395	139	
1-1979	409	144	395	139	
2	409	144	395	139	
3	409	144	395	139	
4	409	144	395	139	
1-1980	409	144	395	139	
2	409	144	395	139	
3	409	144	395	139	
4	409	144	395	139	
1-1981	409	144	395	139	
2	409	144	395	139	
3	409	144	395	139	
4	409	144	395	139	
1-1982	409	144	395	139	
2	409	144	395	139	
3	409	144	395	139	
4	409	144	395	139	
1-1983	409	144	395	139	
2	409	144	395	139	
3	409	144	395	139	
4	410	145	395	139	
1-1984	410	145	395	139	
2	410	145	395	139	
3	410	145	395	139	
4	410	145	395	139	
1-1985	410	145	395	139	
2	371	130	370	130	
3	371	130	370	130	
4	371	130	370	130	
1-1986	371	130	370	130	128
2	371	130	370	130	127
3	371	130	370	130	128
4	371	130	370	130	129
1-1987	371	130	370	130	129
2	371	130	370	130	128
3	371	130	370	130	129
4	371	130	370	130	128
1-1988	371	130	370	130	129
2	371	130	370	130	129
3	371	130	370	130	128
4	371	130	370	130	128
1-1989	371	130	370	130	128
2	371	130	370	130	128
3	371	130	370	130	129
4	371	130	370	130	129

241-B-104 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
1-1990	371	130	370	130	127
2	371	130	370	130	
3	371	130	370	130	129
4	371	130	370	130	128
1-1991	371	130	370	130	129
2	371	130	370	130	128
3	371	130	370	130	130
4	371	130	370	130	129
1-1992	371	130	370	130	129
2	371	130	370	130	
3	371	130	370	130	128
4	371	130	370	130	
1-1993	371	130	370	130	130
2	371	130	370	130	129
3					128
4					

241-B-105 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
1-1944					
2					
3					
4					
1-1945					
2					
3					
4					
1-1946					
2					
3					
4					
1-1947	171	58			
2	379	133			
3	530	188			
4	530	188			
1-1948	530	188			
2	530	188			
3	378	133			
4	0	-12			
1-1949	18	2			
2	201	69			
3	366	129			
4	530	188			
1-1950	530	188			
2	0	-12			
3	530	188			
4	530	188			
1-1951	530	188			
2	530	188			
3	530	188			
4	530	188			
1-1952	530	188			
2	530	188			
3	172	58			
4	227	78			
1-1953	491	174	39	10	
2	28	6	39	10	
3	28	6	39	10	
4	344	121	28	6	
1-1954	396	139	28	6	
2	342	120	28	6	
3	519	184	28	6	
4	516	183	28	6	
1-1955	516	183	28	6	
2	516	183	28	6	

241-B-105 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
3	516	183	28	6	
4	516	183	28	6	
1-1956	516	183	28	6	
2	516	183	28	6	
3	516	183	28	6	
4	516	183	28	6	
1-1957	497	176	28	6	
2	497	176	28	6	
3	497	176	490	174	
4	497	176	490	174	
1-1958	494	175	490	174	
2	494	175	490	174	
3	494	175	490	174	
4	494	175	490	174	
1-1959	494	175	490	174	
2	494	175	490	174	
3	494	175	490	174	
4	494	175	490	174	
1-1960	494	175	490	174	
2	494	175	490	174	
3	494	175	490	174	
4	494	175	490	174	
1-1961			490	174	
2	491	174	490	174	
3	491	174	490	174	
4	491	174	490	174	
1-1962	491	174	490	174	
2	491	174	490	174	
3	491	174	490	174	
4	491	174	490	174	
1-1963	491	174	490	174	
2	491	174	490	174	
3	491	174	490	174	
4	491	174	490	174	
1-1964	491	174	490	174	
2	491	174	490	174	
3			490	174	
4	505	179	490	174	
1-1965	505	179	490	174	
2	505	179	490	174	
3	505	179	490	174	
4	505	179	490	174	
1-1966	505	179	490	174	
2	505	179	490	174	
3	505	179	490	174	
4	505	179	490	174	

241-B-105 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
1-1967	505	179	490	174	
2	505	179	490	174	
3	505	179	490	174	
4	505	179	490	174	
1-1968	505	179	490	174	
2	503	178	490	174	
3	503	178	490	174	
4	503	178	490	174	
1-1969	503	178	490	174	
2	503	178	490	174	
3	503	178	490	174	
4	503	178	490	174	
1-1970	502	178	490	174	
2	502	178	490	174	
3	502	178	490	174	
4	503	178	490	174	
1-1971	502	178	490	174	
2	502	178	490	174	
3	502	178	490	174	
4	503	178	490	174	
1-1972	501	178	490	174	
2	501	178	490	174	
3	490	174	490	174	
4	490	174	490	174	
1-1973	490	174	490	174	
2	490	174	490	174	
3	490	174	490	174	
4	490	174	490	174	
1-1974	490	174	490	174	
2	490	174	490	174	
3	490	174	490	174	
4	491	174	491	174	
1-1975	491	174	491	174	
2	491	174	491	174	
3	293	102	293	102	
4	293	102	293	102	
1-1976	293	102	293	102	
2	293	102	293	102	
3	293	102	293	102	
4	293	102	293	102	
1-1977	293	102	293	102	
2	293	102	293	102	
3	293	102	293	102	
4	293	102	293	102	
1-1978	293	102	293	102	
2	293	102	293	102	

241-B-105 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
3	293	102	293	102	
4	293	102	293	102	
1-1979	293	102	293	102	
2	293	102	293	102	
3	293	102	293	102	
4	293	102	293	102	
1-1980	293	102	293	102	
2	293	102	293	102	
3	293	102	293	102	
4	293	102	293	102	
1-1981	293	102	293	102	
2	293	102	293	102	
3	293	102	293	102	
4	293	102	293	102	
1-1982	293	102	293	102	
2	293	102	293	102	
3	293	102	293	102	
4	293	102	293	102	
1-1983	293	102	293	102	
2	349	122	349	122	
3	377	133	377	133	
4	377	133	377	133	
1-1984	377	133	377	133	
2	377	133	377	133	
3	377	133	377	133	
4	353	124	353	124	
1-1985	306	107	306	107	
2	306	107	306	107	
3	306	107	306	107	
4	306	107	306	107	
1-1986	306	107	306	107	32
2	306	107	306	107	33
3	306	107	306	107	
4	306	107	306	107	32
1-1987	306	107	306	107	32
2	306	107	306	107	32
3	306	107	306	107	32
4	306	107	306	107	33
1-1988	306	107	306	107	32
2	306	107	306	107	32
3	306	107	306	107	31
4	306	107	306	107	32
1-1989	306	107	306	107	33
2	306	107	306	107	33
3	306	107	306	107	33
4	306	107	306	107	32

241-B-105 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)	LOW (in)
1-1990	306	107	306	107	32
2	306	107	306	107	
3	306	107	306	107	33
4	306	107	306	107	33
1-1991	306	107	306	107	33
2	306	107	306	107	33
3	306	107	306	107	32
4	306	107	306	107	33
1-1992	306	107	306	107	32
2	306	107	306	107	
3	306	107	306	107	33
4	306	107	306	107	33
1-1993	306	107	306	107	32
2	306	107	306	107	31
3					33
4					32

241-B-106 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4				
1-1946				
2				
3				
4				
1-1947				
2				
3	59	17		
4	215	74		
1-1948	432	153		
2	530	188		
3	530	188		
4	293	102		
1-1949	0	-12		
2	0	-12		
3	0	-12		
4	112	36		
1-1950	239	82		
2	0	-12		
3	0	-12		
4	0	-12		
1-1951	0	-12		
2	0	-12		
3	0	-12		
4	0	-12		
1-1952	0	-12		
2	193	66		
3	448	158		
4	415	146		
1-1953	302	105	0	
2	213	73	0	
3	197	67	0	
4	444	157	0	
1-1954	239	82	0	
2	415	146	0	
3	338	118	137	45
4	426	150	137	45
1-1955	426	150	137	45
2	426	150	137	45

241-B-106 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	426	150	137	45
4	426	150	137	45
1-1956	426	150	137	45
2	426	150	137	45
3	426	150	137	45
4	426	150	100	32
1-1957	480	170	100	32
2	551	196	125	41
3	552	196	125	41
4	172	58	167	56
1-1958	172	58	167	56
2	230	79	167	56
3	227	78	167	56
4	227	78	167	56
1-1959	167	56	167	56
2	178	60	167	56
3	189	64	167	56
4	209	71	167	56
1-1960	230	79	167	56
2	246	85	167	56
3	268	93	167	56
4	273	95	167	56
1-1961			167	56
2	288	100	167	56
3			167	56
4	304	106	167	56
1-1962			167	56
2	315	110	167	56
3			167	56
4	337	118	167	56
1-1963				
2	343	120	114	37
3			114	37
4	349	122	114	37
1-1964			114	37
2	354	124	114	37
3			114	37
4	356	125	114	37
1-1965				
2	392	138	145	48
3	392	138	145	48
4	403	142	145	48
1-1966	407	143	145	48
2	407	143	145	48
3	407	143	145	48
4	407	143	145	48

241-B-106 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	409	144	145	48
2	409	144	145	48
3	410	145	145	48
4	410	145	145	48
1-1968	418	147	145	48
2	418	147	145	48
3	418	147	145	48
4	418	147	145	48
1-1969	418	147	145	48
2	418	147	145	48
3	215	74	145	48
4	216	74	145	48
1-1970	215	74	145	48
2	215	74	172	58
3	215	74	112	36
4	216	74	172	58
1-1971	216	74	172	58
2	237	82	172	58
3	237	82	172	58
4	237	82	172	58
1-1972	237	82	172	58
2	222	76	153	51
3	227	78	153	51
4	228	78	153	51
1-1973	228	78	147	49
2	228	78	147	49
3	229	79	147	49
4	229	79	147	49
1-1974	229	79	147	49
2	229	79	147	49
3	289	101	147	49
4	285	99	125	41
1-1975	285	99	125	41
2	285	99	125	41
3	285	99	125	41
4	142	47	125	41
1-1976	142	47	125	41
2	142	47	125	41
3	142	47	125	41
4	142	47	125	41
1-1977	142	47	125	41
2	142	47	125	41
3	142	47	125	41
4	142	47	125	41
1-1978	139	46	125	41
2	139	46	125	41

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	139	46	125	41
4	139	46	125	41
1-1979	139	46	125	41
2	139	46	125	41
3	139	46	125	41
4	139	46	125	41
1-1980	139	46	125	41
2	139	46	125	41
3	139	46	125	41
4	139	46	125	41
1-1981	139	46	125	41
2	139	46	125	41
3	139	46	125	41
4	139	46	125	41
1-1982	139	46	125	41
2	139	46	125	41
3	139	46	125	41
4	139	46	125	41
1-1983	139	46	125	41
2	139	46	125	41
3	139	46	125	41
4	138	46	125	41
1-1984	138	46	125	41
2	138	46	125	41
3	138	46	125	41
4	138	46	125	41
1-1985	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1986	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1987	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1988	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1989	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38

241-B-106 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1991	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1992	117	38	116	38
2	117	38	116	38
3	117	38	116	38
4	117	38	116	38
1-1993	117	38	116	38
2	117	38	116	38
3				
4				

241-B-107 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2	168	57		
3	475	168		
4	530	188		
1-1946	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3				
4				
1-1952				
2	220	75		
3	461	163		
4	531	189		
1-1953	531	189	220	75
2	523	186	220	75
3	530	188	172	58
4	530	188	172	58
1-1954	530	188	172	58
2	530	188	172	58
3	225	77	225	77
4	488	173	225	77
1-1955	530	188	225	77
2	530	188	225	77

241-B-107 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	530	188	225	77
4	530	188	225	77
1-1956	530	188	225	77
2	530	188	225	77
3	530	188	225	77
4	530	188	225	77
1-1957	496	176	225	77
2	532	189	230	79
3	271	94	230	79
4	271	94	261	90
1-1958	274	95	261	90
2	271	94	261	90
3	271	94	261	90
4	271	94	261	90
1-1959	271	94	261	90
2	271	94	261	90
3	271	94	261	90
4	271	94	261	90
1-1960	271	94	261	90
2	271	94	261	90
3	271	94	261	90
4	237	82	261	90
1-1961			261	90
2	268	93	261	90
3			261	90
4	271	94	261	90
1-1962	271	94	261	90
2	271	94	261	90
3	271	94	261	90
4	271	94	261	90
1-1963	271	94		
2	271	94	271	94
3			271	94
4	535	190	271	94
1-1964	535	190	271	94
2	535	190	271	94
3			271	94
4	541	192	271	94
1-1965				
2	541	192	202	69
3	549	195	202	69
4	546	194	202	69
1-1966	543	193	202	69
2	543	193	202	69
3	541	192	202	69
4	541	192	202	69

241-B-107 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	538	191	202	69
2	535	190	202	69
3	535	190	202	69
4	535	190	202	69
1-1968	531	189	202	69
2	530	188	202	69
3	530	188	202	69
4	528	187	202	69
1-1969	528	187	202	69
2	527	187	202	69
3	200	68	200	68
4	200	68	200	68
1-1970	200	68	200	68
2	200	68	200	68
3	200	68	200	68
4	200	68	200	68
1-1971	200	68	200	68
2	200	68	200	68
3	200	68	200	68
4	200	68	200	68
1-1972	200	68	200	68
2	193	66	193	66
3	193	66	193	66
4	193	66	193	66
1-1973	193	66	193	66
2	193	66	193	66
3	193	66	193	66
4	193	66	193	66
1-1974	193	66	193	66
2	193	66	193	66
3	193	66	193	66
4	194	66	194	66
1-1975	194	66	194	66
2	194	66	194	66
3	194	66	194	66
4	194	66	194	66
1-1976	194	66	194	66
2	194	66	194	66
3	194	66	194	66
4	194	66	194	66
1-1977	194	66	194	66
2	194	66	194	66
3	194	66	194	66
4	194	66	194	66
1-1978	194	66	194	66
2	194	66	194	66

241-B-107 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	194	66	194	66
4	194	66	194	66
1-1979	194	66	194	66
2	194	66	194	66
3	194	66	194	66
4	194	66	194	66
1-1980	194	66	194	66
2	194	66	194	66
3	194	66	194	66
4	194	66	194	66
1-1981	194	66	191	65
2	194	66	191	65
3	194	66	191	65
4	194	66	191	65
1-1982	194	66	191	65
2	170	57	170	57
3	170	57	170	57
4	170	57	170	57
1-1983	170	57	170	57
2	170	57	170	57
3	170	57	170	57
4	170	57	170	57
1-1984	170	57	170	57
2	170	57	170	57
3	170	57	170	57
4	167	56	151	50
1-1985	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1986	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1987	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1988	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1989	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55

241-B-107 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1991	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1992	165	55	164	55
2	165	55	164	55
3	165	55	164	55
4	165	55	164	55
1-1993	165	55	164	55
2	165	55	164	55
3				
4				

241-B-108 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4	450	159		
1-1946	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3				
4				
1-1952				
2	530	188		
3	530	188		
4	528	187		
1-1953	359	126	34	8
2	530	188	34	8
3	530	188	34	8
4	530	188	34	8
1-1954	530	188	34	8
2	530	188	34	8
3	65	19	65	19
4	65	19	65	19
1-1955	233	80	65	19
2	233	80	65	19

241-B-108 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	526	187	65	19
4	526	187	65	19
1-1956	526	187	65	19
2	526	187	65	19
3	526	187	65	19
4	526	187	65	19
1-1957	527	187	65	19
2	524	186	114	37
3	128	42	114	37
4	128	42	114	37
1-1958	131	43	114	37
2	134	44	114	37
3	131	43	114	37
4	134	44	114	37
1-1959	130	43	114	37
2	130	43	114	37
3	130	43	114	37
4	130	43	114	37
1-1960	130	43	114	37
2	130	43	114	37
3	130	43	114	37
4	130	43	114	37
1-1961			114	37
2	128	42	114	37
3	128	42	114	37
4	128	42	114	37
1-1962	128	42	114	37
2	128	42	114	37
3	128	42	114	37
4	128	42	114	37
1-1963				
2	131	43	120	39
3			120	39
4	541	192	120	39
1-1964	541	192	120	39
2	541	192	120	39
3	541	192	120	39
4	541	192	120	39
1-1965				
2	538	191	125	41
3	538	191	125	41
4	538	191	125	41
1-1966	538	191	125	41
2	538	191	125	41
3	538	191	125	41
4	538	191	125	41

241-B-108 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	538	191	125	41
2	538	191	125	41
3	538	191	125	41
4	538	191	125	41
1-1968	536	190	125	41
2	538	191	125	41
3	538	191	125	41
4	536	190	125	41
1-1969	324	113	125	41
2	117	38	117	38
3	117	38	117	38
4	545	194	117	38
1-1970	543	193	117	38
2	543	193	117	38
3	543	193	117	38
4	543	193	117	38
1-1971	542	193	117	38
2	542	193	122	40
3	543	193	122	40
4	543	193	78	24
1-1972	125	41	113	37
2	125	41	113	37
3	127	42	113	37
4	113	37	113	37
1-1973	112	36	112	36
2	111	36	111	36
3	111	36	111	36
4	111	36	111	36
1-1974	114	37	114	37
2	156	52	114	37
3	156	52	114	37
4	156	52	112	36
1-1975	156	52	112	36
2	156	52	112	36
3	156	52	112	36
4	156	52	112	36
1-1976	156	52	112	36
2	156	52	112	36
3	156	52	112	36
4	156	52	112	36
1-1977	156	52	112	36
2	112	36	112	36
3	112	36	112	36
4	103	33	70	21
1-1978	103	33	70	21
2	103	33	70	21

241-B-108 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	103	33	70	21
4	103	33	70	21
1-1979	103	33	70	21
2	103	33	70	21
3	103	33	70	21
4	103	33	70	21
1-1980	103	33	70	21
2	103	33	70	21
3	103	33	70	21
4	103	33	70	21
1-1981	103	33	70	21
2	103	33	70	21
3	103	33	70	21
4	103	33	70	21
1-1982	103	33	70	21
2	103	33	70	21
3	103	33	70	21
4	103	33	70	21
1-1983	103	33	70	21
2	103	33	70	21
3	103	33	70	21
4	106	34	70	21
1-1984	106	34	70	21
2	106	34	70	21
3	106	34	70	21
4	106	34	70	21
1-1985	106	34	70	21
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1986	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1987	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1988	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1989	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30

241-B-108 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1991	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1992	94	30	94	30
2	94	30	94	30
3	94	30	94	30
4	94	30	94	30
1-1993	94	30	94	30
2	94	30	94	30
3				
4				

241-B-109 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4				
1-1946	360	126		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3				
4				
1-1952				
2	172	58		
3	518	184		
4	535	190		
1-1953	330	115	0	
2	516	183	0	
3	530	188	0	
4	527	187	0	
1-1954	527	187	0	
2	527	187	0	
3	497	176	128	42
4	494	175	128	42
1-1955	494	175	128	42
2	494	175	128	42

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	494	175	128	42
4	494	175	128	42
1-1956	494	175	128	42
2	494	175	128	42
3	494	175	128	42
4	494	175	128	42
1-1957	485	172	128	42
2	485	172	232	80
3	76	23	76	23
4	76	23	76	23
1-1958	76	23	76	23
2	79	24	76	23
3	70	21	70	21
4	73	22	70	21
1-1959	76	23	70	21
2	79	24	70	21
3	79	24	70	21
4	79	24	70	21
1-1960	79	24	70	21
2	79	24	70	21
3	79	24	70	21
4	79	24	70	21
1-1961	79	24	70	21
2	79	24	70	21
3	79	24	70	21
4	79	24	70	21
1-1962	79	24	70	21
2	79	24	70	21
3			70	21
4	81	25	70	21
1-1963				
2	84	26	84	26
3			84	26
4	541	192	84	26
1-1964	541	192	84	26
2	541	192	84	26
3			84	26
4	538	191	84	26
1-1965				
2	538	191	134	44
3	532	189	134	44
4	565	201	134	44
1-1966	565	201	134	44
2	565	201	134	44
3	565	201	134	44
4	565	201	134	44

241-B-109 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	565	201	134	44
2	565	201	134	44
3	565	201	134	44
4	565	201	134	44
1-1968	565	201	134	44
2	565	201	134	44
3	565	201	134	44
4	565	201	134	44
1-1969	565	201	134	44
2	564	201	134	44
3	171	58	134	44
4	538	191	134	44
1-1970	538	191	134	44
2	536	190	161	54
3	536	190	161	54
4	538	191	161	54
1-1971	536	190	161	54
2	536	190	161	54
3	536	190	161	54
4	536	190	161	54
1-1972	205	70	136	45
2	189	64	136	45
3	206	70	136	45
4	198	67	136	45
1-1973	199	68	136	45
2	199	68	136	45
3	198	67	136	45
4	268	93	136	45
1-1974	284	99	136	45
2	393	138	136	45
3	397	140	136	45
4	403	142	117	38
1-1975	409	144	117	38
2	406	143	117	38
3	409	144	117	38
4	134	44	117	38
1-1976	260	90	117	38
2	260	90	117	38
3	260	90	117	38
4	260	90	117	38
1-1977	260	90	117	38
2	150	50	117	38
3	139	46	120	39
4	139	46	120	39
1-1978	139	46	120	39
2	139	46	120	39

241-B-109 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	134	44	120	39
4	134	44	120	39
1-1979	134	44	120	39
2	134	44	120	39
3	134	44	120	39
4	134	44	120	39
1-1980	134	44	120	39
2	134	44	120	39
3	134	44	120	39
4	128	42	120	39
1-1981	128	42	120	39
2	128	42	120	39
3	128	42	120	39
4	128	42	120	39
1-1982	128	42	120	39
2	128	42	120	39
3	128	42	120	39
4	128	42	120	39
1-1983	128	42	120	39
2	128	42	120	39
3	128	42	120	39
4	128	42	120	39
1-1984	128	42	120	39
2	128	42	120	39
3	128	42	120	39
4	128	42	120	39
1-1985	128	42	120	39
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1986	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1987	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1988	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1989	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42

241-B-109 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1991	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1992	127	42	127	42
2	127	42	127	42
3	127	42	127	42
4	127	42	127	42
1-1993	127	42	127	42
2	127	42	127	42
3				
4				

241-B-110 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2	128	42		
3	350	123		
4	530	188		
1-1946	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2				
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1952	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1953	530	188		
2	530	188		
3	530	188	378	133
4	425	150	243	84
1-1954	421	149	243	84
2	530	188	243	84
3	530	188	243	84
4	530	188	243	84
1-1955	348	122	348	122
2	348	122	348	122

241-B-110 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	348	122	243	84
4	451	159	243	84
1-1956	501	178	243	84
2	530	188	243	84
3	530	188	243	84
4	530	188	243	84
1-1957	532	189	243	84
2	535	190	243	84
3	535	190	243	84
4	535	190	243	84
1-1958	535	190	243	84
2	535	190	243	84
3	535	190	243	84
4	535	190	243	84
1-1959	532	189	243	84
2	532	189	243	84
3	532	189	243	84
4	532	189	243	84
1-1960	532	189	243	84
2	532	189	243	84
3	532	189	243	84
4	532	189	243	84
1-1961			243	84
2	530	188	243	84
3			243	84
4	538	191	243	84
1-1962			243	84
2	532	189	243	84
3	532	189	243	84
4	532	189	243	84
1-1963				
2	530	188	282	98
3			282	98
4	365	128	282	98
1-1964			282	98
2	528	187	282	98
3			282	98
4	528	187	282	98
1-1965				
2	543	193	332	116
3	543	193	332	116
4	543	193	332	116
1-1966	541	192	332	116
2	541	192	332	116
3	541	192	332	116
4	541	192	332	116

241-B-110 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	541	192	332	116
2	541	192	332	116
3	536	190	243	84
4	466	165	243	84
1-1968	546	194	243	84
2	546	194	297	103
3	546	194	297	103
4	545	194	297	103
1-1969	542	193	297	103
2	541	192	297	103
3	534	190	297	103
4	534	190	297	103
1-1970	531	189	297	103
2	530	188	297	103
3	530	188	297	103
4	530	188	297	103
1-1971	527	187	297	103
2	525	186	297	103
3	301	105	297	103
4	301	105	297	103
1-1972	299	104	297	103
2	288	100	282	98
3	282	98	282	98
4	282	98	282	98
1-1973	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1974	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1975	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1976	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1977	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1978	282	98	282	98
2	282	98	282	98

241-B-110 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	282	98	282	98
4	282	98	282	98
1-1979	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1980	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1981	282	98	282	98
2	282	98	282	98
3	282	98	282	98
4	282	98	282	98
1-1982	282	98	282	98
2	247	85	247	85
3	247	85	246	85
4	247	85	246	85
1-1983	247	85	246	85
2	247	85	246	85
3	247	85	246	85
4	247	85	246	85
1-1984	247	85	246	85
2	247	85	246	85
3	247	85	246	85
4	247	85	246	85
1-1985	245	85	244	84
2	245	85	244	84
3	245	85	244	84
4	245	85	244	84
1-1986	245	85	244	84
2	245	85	244	84
3	245	85	244	84
4	245	85	244	84
1-1987	245	85	244	84
2	245	85	244	84
3	245	85	244	84
4	245	85	244	84
1-1988	245	85	244	84
2	245	85	244	84
3	245	85	244	84
4	245	85	244	84
1-1989	245	85	244	84
2	245	85	244	84
3	245	85	244	84
4	245	85	244	84

241-B-110 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	245	85	244	84
2	246	85	245	85
3	246	85	245	85
4	246	85	245	85
1-1991	246	85	245	85
2	246	85	245	85
3	246	85	245	85
4	246	85	245	85
1-1992	246	85	245	85
2	246	85	245	85
3	246	85	245	85
4	246	85	245	85
1-1993	246	85	245	85
2	246	85	245	85
3				
4				

241-B-111 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4	181	61		
1-1946	473	167		
2	530	188		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	530	188		
2	1	-4		
3	530	188		
4	530	188		
1-1951	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1952	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1953	530	188		
2	530	188		
3	530	188	237	82
4	530	188	161	54
1-1954	530	188	161	54
2	530	188	161	54
3	530	188	161	54
4	530	188	195	66
1-1955	530	188	195	66
2	530	188	195	66

241-B-111 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	249	86	249	86
4	249	86	249	86
1-1956	249	86	249	86
2	251	87	249	86
3	265	92	249	86
4	270	94	243	84
1-1957	270	94	161	54
2	279	97	161	54
3	279	97	161	54
4	279	97	161	54
1-1958	282	98	161	54
2	282	98	161	54
3	279	97	161	54
4	279	97	161	54
1-1959	334	117	161	54
2	334	117	161	54
3	334	117	161	54
4	334	117	161	54
1-1960	334	117	161	54
2	334	117	161	54
3	334	117	161	54
4	334	117	161	54
1-1961			161	54
2	332	116	161	54
3			161	54
4	480	170	161	54
1-1962			161	54
2	554	197	161	54
3	554	197	161	54
4	554	197	161	54
1-1963				
2	343	120	300	105
3			300	105
4	337	118	300	105
1-1964			300	105
2	338	118	300	105
3			300	105
4	392	138	300	105
1-1965				
2	381	134	310	108
3	442	156	310	108
4	477	169	310	108
1-1966	469	166	310	108
2	436	154	310	108
3	442	156	310	108
4	461	163	310	108

241-B-111 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	497	176	310	108
2	395	139	310	108
3	426	150	161	54
4	523	186	161	54
1-1968	521	185	161	54
2	519	184	241	83
3	519	184	241	83
4	517	183	241	83
1-1969	513	182	241	83
2	388	137	241	83
3	300	105	241	83
4	349	122	241	83
1-1970	431	152	232	80
2	503	178	244	84
3	503	178	244	84
4	502	178	244	84
1-1971	502	178	244	84
2	502	178	244	84
3	502	178	244	84
4	501	178	244	84
1-1972	241	83	241	83
2	246	85	246	85
3	263	91	246	85
4	249	86	246	85
1-1973	249	86	249	86
2	249	86	249	86
3	249	86	249	86
4	249	86	249	86
1-1974	249	86	249	86
2	249	86	249	86
3	249	86	249	86
4	249	86	246	85
1-1975	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1976	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1977	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1978	249	86	246	85
2	249	86	246	85

241-B-111 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	249	86	246	85
4	249	86	246	85
1-1979	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1980	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1981	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1982	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	249	86	246	85
1-1983	249	86	246	85
2	249	86	246	85
3	249	86	246	85
4	247	85	243	84
1-1984	247	85	243	84
2	247	85	243	84
3	247	85	243	84
4	247	85	241	83
1-1985	247	85	241	83
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1986	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1987	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1988	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1989	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81

241-B-111 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1991	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1992	237	82	236	81
2	237	82	236	81
3	237	82	236	81
4	237	82	236	81
1-1993	237	82	236	81
2	237	82	236	81
3				
4				

241-B-112 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1944				
2				
3				
4				
1-1945				
2				
3				
4				
1-1946				
2	342	120		
3	530	188		
4	530	188		
1-1947	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1948	530	188		
2	149	50		
3	353	124		
4	530	188		
1-1949	530	188		
2	530	188		
3	530	188		
4	530	188		
1-1950	0	-12		
2	0	-12		
3	412	145		
4	200	68		
1-1951	396	139		
2	530	188		
3	542	193		
4	542	193		
1-1952	542	193		
2	542	193		
3	542	193		
4	542	193		
1-1953	542	193		
2	542	193		
3	542	193	0	
4	542	193	0	
1-1954	542	193	0	
2	542	193	0	
3	542	193	0	
4	542	193	0	
1-1955	542	193	0	
2	542	193	0	

241-B-112 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	542	193	0	
4	542	193	0	
1-1956	542	193	0	
2	542	193	0	
3	542	193	0	
4	542	193	0	
1-1957	538	191	0	
2	538	191	23	4
3	538	191	23	4
4	43	11	43	11
1-1958	43	11	43	11
2	46	12	43	11
3	46	12	43	11
4	46	12	43	11
1-1959	46	12	43	11
2	46	12	43	11
3	45	12	43	11
4	43	11	43	11
1-1960	43	11	43	11
2	43	11	43	11
3	43	11	43	11
4	32	7	43	11
1-1961				
2	29	6	29	6
3			29	6
4	40	10	29	6
1-1962			35	8
2	35	8	35	8
3				
4	40	10	40	10
1-1963				
2	271	94	35	8
3			35	8
4	524	186	35	8
1-1964			35	8
2	536	190	35	8
3	536	190	35	8
4	536	190	35	8
1-1965			35	8
2	450	159	35	8
3	313	109	35	8
4	106	34	35	8
1-1966	211	72	35	8
2	304	106	35	8
3	337	118	35	8
4	337	118	35	8

241-B-112 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1967	337	118	35	8
2	528	187	35	8
3	528	187	40	10
4	169	57	40	10
1-1968	535	190	40	10
2	547	194	18	2
3	547	194	18	2
4	547	194	18	2
1-1969	550	195	18	2
2	101	32	18	2
3	279	97	18	2
4	554	197	18	2
1-1970	553	197	18	2
2	558	198	18	2
3	558	198	18	2
4	558	198	18	2
1-1971	557	198	18	2
2	556	198	18	2
3	557	198	18	2
4	68	20	18	2
1-1972	87	27	18	2
2	90	28	18	2
3	77	23	14	1
4	77	23	14	1
1-1973	302	105	14	1
2	303	106	14	1
3	305	106	14	1
4	305	106	14	1
1-1974	305	106	14	1
2	328	115	14	1
3	329	115	14	1
4	329	115	35	8
1-1975	329	115	35	8
2	329	115	35	8
3	329	115	35	8
4	329	115	35	8
1-1976	329	115	35	8
2	329	115	35	8
3	332	116	35	8
4	332	116	35	8
1-1977	332	116	35	8
2	73	22	35	8
3	40	10	37	9
4	40	10	37	9
1-1978	40	10	37	9
2	40	10	37	9

241-B-112 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	43	11	37	9
4	43	11	37	9
1-1979	43	11	37	9
2	43	11	37	9
3	43	11	37	9
4	43	11	37	9
1-1980	43	11	37	9
2	43	11	37	9
3	43	11	37	9
4	43	11	37	9
1-1981	43	11	37	9
2	43	11	37	9
3	43	11	37	9
4	43	11	37	9
1-1982	43	11	37	9
2	43	11	37	9
3	43	11	37	9
4	43	11	37	9
1-1983	43	11	37	9
2	43	11	37	9
3	43	11	37	9
4	42	11	37	9
1-1984	42	11	37	9
2	42	11	37	9
3	42	11	37	9
4	42	11	37	9
1-1985	42	11	37	9
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1986	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1987	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1988	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1989	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6

241-B-112 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1990	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1991	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1992	33	7	30	6
2	33	7	30	6
3	33	7	30	6
4	33	7	30	6
1-1993	33	7	30	6
2	33	7	30	6
3				
4				

241-B-201 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1952	55	281		
2	55	281		
3	55	281		
4	55	281		
1-1953	55	281		
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1954	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1955	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1956	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1957	53	273	55	281
2	53	273	55	281
3	53	273	29	148
4	53	273	29	148
1-1958	53	273	29	148
2	53	273	29	148
3	53	273	24	123
4	51	263	29	148
1-1959	51	263	29	148
2	51	263	29	148
3	51	263	29	148
4	52	268	55	281
1-1960	52	268	55	281
2	52	268	55	281
3	52	268	55	281
4	52	268	55	281
1-1961			55	281
2	50	258	55	281
3	50	258	55	281
4	50	258	55	281
1-1962	50	258	55	281
2	50	258	55	281
3				
4	51	263	50	258
1-1963	51	263	50	258
2	51	263	50	258

241-B-201 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3			50	258
4	53	273	50	258
1-1964	53	273	50	258
2	53	273	50	258
3	53	273	50	258
4	53	273	50	258
1-1965			50	258
2	56	289	50	258
3	56	289	50	258
4	56	289	50	258
1-1966	56	289	50	258
2	56	289	50	258
3	56	289	50	258
4	56	289	50	258
1-1967	56	289	50	258
2	56	289	50	258
3	56	289	50	258
4	56	289	50	258
1-1968	55	284	50	258
2	55	284	50	258
3	55	284	50	258
4	55	284	50	258
1-1969	55	284	50	258
2	55	284	50	258
3	55	284	50	258
4	55	284	50	258
1-1970	55	284	30	156
2	55	284	30	156
3	55	284	30	156
4	54	279	30	156
1-1971	54	279	30	156
2	33	171	30	156
3	33	171	30	156
4	33	171	30	156
1-1972	33	171	26	136
2	33	171	26	136
3	33	171	26	136
4	33	171	26	136
1-1973	33	171	26	136
2	33	171	26	136
3	33	171	26	136
4	33	171	26	136
1-1974	32	166	26	136
2	31	161	26	136
3	29	151	26	136
4	29	151	29	151

241-B-201 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1975	29	151	29	151
2	29	151	29	151
3	29	151	29	151
4	29	151	29	151
1-1976	29	151	29	151
2	29	151	29	151
3	29	151	29	151
4	29	151	29	151
1-1977	29	151	29	151
2	29	151	29	151
3	29	151	29	151
4	29	151	29	151
1-1978	29	151	29	151
2	29	151	29	151
3	29	151	29	151
4	29	151	29	151
1-1979	28	146	27	141
2	28	146	27	141
3	28	146	27	141
4	28	146	27	141
1-1980	28	146	27	141
2	28	146	27	141
3	29	151	28	146
4	29	151	28	146
1-1981	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1982	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1983	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1984	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1985	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1986	29	151	28	146
2	29	151	28	146

241-B-201 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	29	151	28	146
4	29	151	28	146
1-1987	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1988	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1989	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1990	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1991	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1992	29	151	28	146
2	29	151	28	146
3	29	151	28	146
4	29	151	28	146
1-1993	29	151	28	146
2	29	151	28	146
3				
4				

241-B-202 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1952	55	281		
2	55	281		
3	55	281		
4	55	281		
1-1953	55	281		
2	55	281	55	281
3	55	281	25	131
4	55	281	25	131
1-1954	55	281	25	131
2	55	281	25	131
3	55	281	25	131
4	55	281	25	131
1-1955	55	281	25	131
2	55	281	25	131
3	55	281	25	131
4	55	281	25	131
1-1956	55	281	25	131
2	55	281	25	131
3	55	281	25	131
4	55	281	25	131
1-1957	56	289	25	131
2	56	289	25	131
3	56	289	25	131
4	56	289	25	131
1-1958	56	289	25	131
2	56	289	25	131
3	56	289	25	131
4	54	279	25	131
1-1959	54	279	25	131
2	54	279	25	131
3	54	279	25	131
4	54	279	25	131
1-1960	54	279	25	131
2	54	279	25	131
3	51	263	25	131
4	51	263	25	131
1-1961	51	263	25	131
2	51	263	25	131
3	51	263	25	131
4	51	263	25	131
1-1962			25	131
2	55	281	25	131
3			25	131
4	55	284	25	131
1-1963	55	284	25	131
2	55	284	25	131

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3			25	131
4	54	279	25	131
1-1964	54	279	25	131
2	54	279	25	131
3	54	279	25	131
4	54	279	25	131
1-1965			25	131
2	58	299	25	131
3	56	289	25	131
4	56	289	25	131
1-1966	56	289	25	131
2	56	289	25	131
3	56	289	25	131
4	56	289	25	131
1-1967	56	289	25	131
2	56	289	25	131
3	56	289	25	131
4	56	289	25	131
1-1968	56	289	25	131
2	56	289	25	131
3	56	289	25	131
4	56	289	25	131
1-1969	56	289	25	131
2	56	289	25	131
3	56	289	25	131
4	56	289	25	131
1-1970	56	289	29	151
2	56	289	29	151
3	56	289	29	151
4	56	289	29	151
1-1971	56	289	29	151
2	56	289	29	151
3	56	289	29	151
4	56	289	29	151
1-1972	56	289	27	141
2	56	289	27	141
3	56	289	27	141
4	56	289	27	141
1-1973	56	289	27	141
2	56	289	27	141
3	56	289	27	141
4	56	289	27	141
1-1974	53	273	27	141
2	53	273	27	141
3	53	273	27	141
4	53	273	27	141

241-B-202 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1975	53	273	27	141
2	53	273	27	141
3	53	273	27	141
4	53	273	27	141
1-1976	53	273	27	141
2	53	273	27	141
3	53	273	27	141
4	53	273	27	141
1-1977	53	273	27	141
2	30	156	27	141
3	27	141	27	141
4	27	141	27	141
1-1978	27	141	27	141
2	27	141	27	141
3	27	141	27	141
4	27	141	27	141
1-1979	27	141	27	141
2	27	141	27	141
3	27	141	27	141
4	27	141	27	141
1-1980	27	141	27	141
2	27	141	27	141
3	28	146	28	146
4	28	146	28	146
1-1981	28	146	28	146
2	28	146	28	146
3	28	146	28	146
4	28	146	28	146
1-1982	28	146	28	146
2	27	141	27	141
3	27	141	27	141
4	27	141	27	141
1-1983	27	141	27	141
2	27	141	27	141
3	27	141	27	141
4	27	141	27	141
1-1984	27	141	27	141
2	27	141	27	141
3	27	141	27	141
4	27	141	26	136
1-1985	27	141	26	136
2	27	141	27	141
3	27	141	27	141
4	27	141	26	136
1-1986	27	141	26	136
2	27	141	26	136

241-B-202 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	27	141	26	136
4	27	141	26	136
1-1987	27	141	26	136
2	27	141	26	136
3	27	141	26	136
4	27	141	26	136
1-1988	27	141	26	136
2	27	141	26	136
3	27	141	26	136
4	27	141	26	136
1-1989	27	141	26	136
2	27	141	26	136
3	27	141	26	136
4	27	141	26	136
1-1990	27	141	26	136
2	28	146	27	141
3	27	141	27	141
4	27	141	27	141
1-1991	27	141	27	141
2	27	141	27	141
3	27	141	27	141
4	27	141	27	141
1-1992	27	141	27	141
2	27	141	27	141
3	27	141	27	141
4	27	141	27	141
1-1993	27	141	27	141
2	27	141	27	141
3				
4				

241-B-203 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1952	55	281		
2	55	281		
3	55	281		
4	55	281		
1-1953	55	281		
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1954	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1955	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1956	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1957	56	289	55	281
2	56	289	55	281
3	56	289	55	281
4	56	289	55	281
1-1958	56	289	55	281
2	56	289	55	281
3	56	289	55	281
4	55	284	55	281
1-1959	55	284	55	281
2	55	284	55	281
3	55	284	55	281
4	55	284	55	281
1-1960	55	284	55	281
2	55	284	55	281
3	55	284	55	281
4	55	284	55	281
1-1961			55	281
2	54	279	55	281
3	54	279	55	281
4	54	279	55	281
1-1962			55	281
2	56	289	55	281
3	56	289		
4	56	289	54	279
1-1963	56	289	54	279
2	56	289	54	279

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	56	289	54	279
4	56	289	54	279
1-1964			54	279
2	55	284	54	279
3	55	284	54	279
4	55	284	54	279
1-1965			54	279
2	58	299	54	279
3	56	289	54	279
4	56	289	54	279
1-1966	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1967	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1968	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1969	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1970	56	289	49	253
2	56	289	49	253
3	56	289	49	253
4	56	289	49	253
1-1971	56	289	49	253
2	56	289	49	253
3	56	289	49	253
4	56	289	49	253
1-1972	56	289	44	227
2	56	289	44	227
3	56	289	44	227
4	56	289	44	227
1-1973	56	289	44	227
2	56	289	44	227
3	56	289	44	227
4	56	289	44	227
1-1974	50	258	44	227
2	50	258	44	227
3	50	258	44	227
4	50	258	44	227

241-B-203 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1975	50	258	44	227
2	50	258	44	227
3	50	258	44	227
4	50	258	44	227
1-1976	50	258	44	227
2	50	258	44	227
3	50	258	45	233
4	50	258	45	233
1-1977	50	258	45	233
2	50	258	45	233
3	50	258	47	243
4	50	258	47	243
1-1978	50	258	47	243
2	50	258	47	243
3	50	258	47	243
4	50	258	47	243
1-1979	50	258	47	243
2	50	258	47	243
3	50	258	47	243
4	50	258	47	243
1-1980	50	258	47	243
2	50	258	47	243
3	50	258	48	248
4	50	258	48	248
1-1981	50	258	48	248
2	50	258	48	248
3	50	258	48	248
4	50	258	48	248
1-1982	50	258	48	248
2	50	258	49	253
3	51	263	50	258
4	51	263	50	258
1-1983	51	263	50	258
2	51	263	50	258
3	51	263	50	258
4	50	258	50	258
1-1984	50	258	50	258
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1985	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1986	50	258	49	253
2	50	258	49	253

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	50	258	49	253
4	50	258	49	253
1-1987	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1988	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1989	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1990	51	263	50	258
2	51	263	50	258
3	51	263	50	258
4	51	263	50	258
1-1991	51	263	50	258
2	51	263	50	258
3	51	263	50	258
4	51	263	50	258
1-1992	51	263	50	258
2	51	263	50	258
3	51	263	50	258
4	51	263	50	258
1-1993	51	263	50	258
2	51	263	50	258
3				
4				

241-B-204 SINGLE-SHELL
TANK LEVEL HISTORY

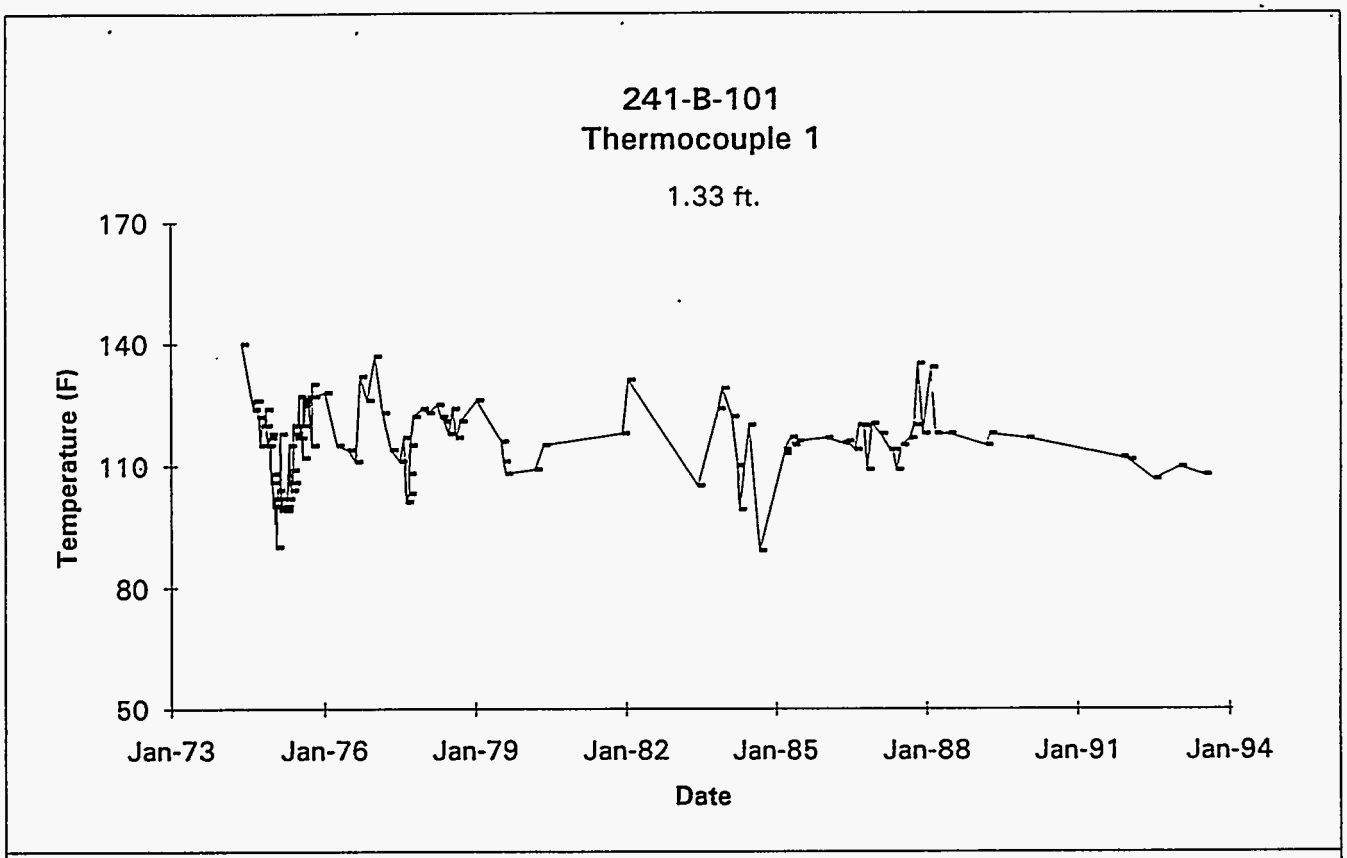
Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1952	55	281		
2	55	281		
3	55	281		
4	55	281		
1-1953	55	281		
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1954	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1955	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1956	55	281	55	281
2	55	281	55	281
3	55	281	55	281
4	55	281	55	281
1-1957	56	289	55	281
2	56	289	55	281
3	56	289	55	281
4	56	289	55	281
1-1958	56	289	55	281
2	56	289	55	281
3	56	289	55	281
4	55	284	55	281
1-1959	56	289	55	281
2	56	289	55	281
3	56	289	55	281
4	54	279	54	279
1-1960	54	279	54	279
2	54	279	54	279
3	54	279	54	279
4	54	279	54	279
1-1961	54	279	54	279
2	54	279	54	279
3	54	279	54	279
4	54	279	54	279
1-1962			55	281
2	56	289	55	281
3	56	289	54	279
4	56	289	54	279
1-1963	56	289	54	279
2	56	289	54	279

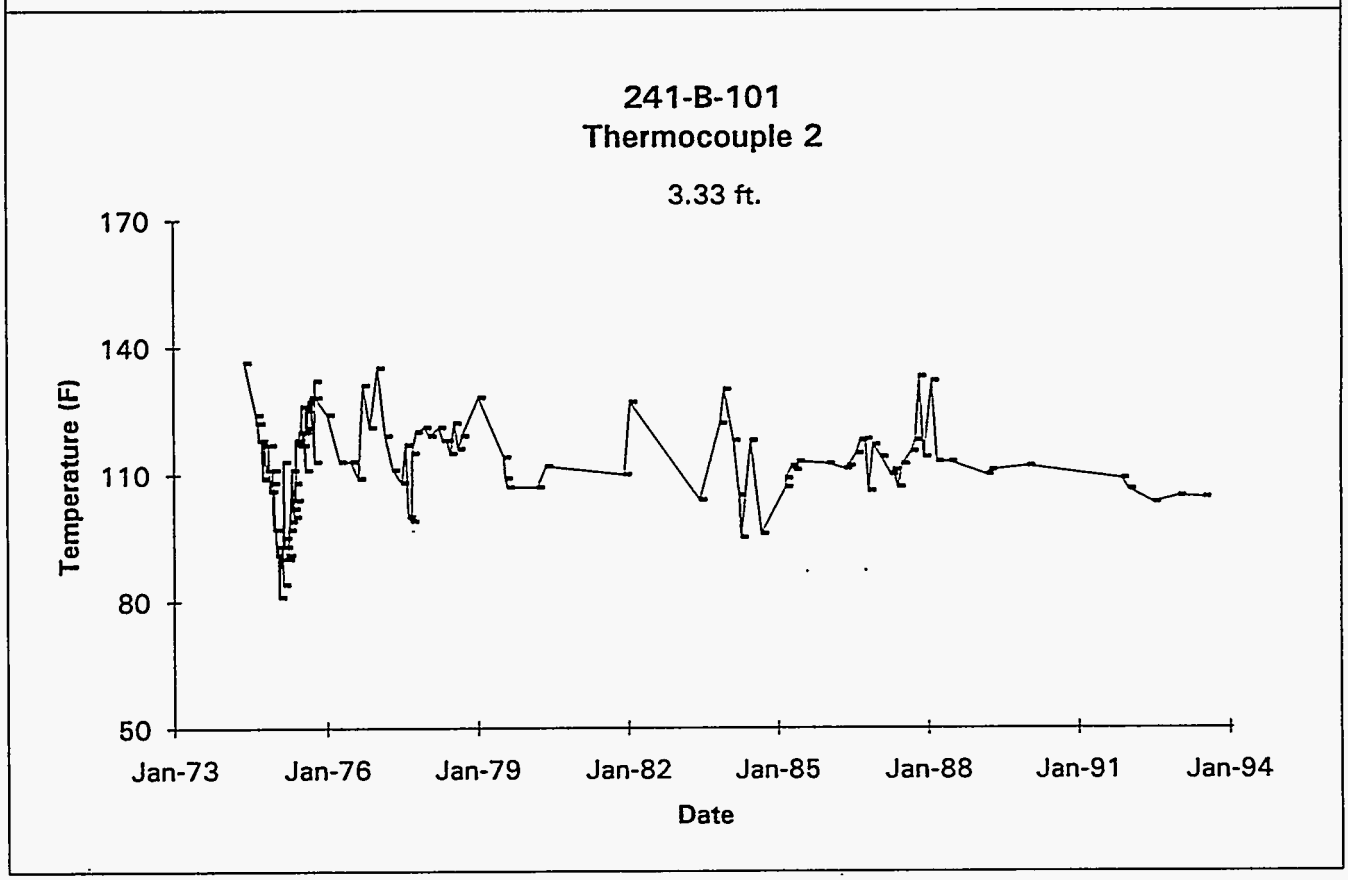
Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	56	289	54	279
4	56	289	54	279
1-1964			54	279
2	55	284	54	279
3	55	284	54	279
4	55	284	54	279
1-1965			54	279
2	58	299	54	279
3	56	289	54	279
4	56	289	54	279
1-1966	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1967	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1968	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1969	56	289	54	279
2	56	289	54	279
3	56	289	54	279
4	56	289	54	279
1-1970	56	289	48	248
2	56	289	48	248
3	56	289	48	248
4	56	289	48	248
1-1971	56	289	48	248
2	56	289	48	248
3	56	289	48	248
4	56	289	48	248
1-1972	56	289	46	238
2	56	289	46	238
3	56	289	46	238
4	56	289	46	238
1-1973	56	289	46	238
2	56	289	46	238
3	56	289	46	238
4	56	289	46	238
1-1974	49	253	46	238
2	49	253	46	238
3	49	253	46	238
4	49	253	46	238

241-B-204 SINGLE-SHELL
TANK LEVEL HISTORY

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
1-1975	49	253	46	238
2	49	253	46	238
3	49	253	46	238
4	49	253	46	238
1-1976	49	253	46	238
2	49	253	46	238
3	49	253	46	238
4	49	253	46	238
1-1977	49	253	46	238
2	49	253	46	238
3	49	253	46	238
4	49	253	46	238
1-1978	49	253	46	238
2	49	253	46	238
3	49	253	46	238
4	49	253	46	238
1-1979	49	253	46	238
2	49	253	46	238
3	49	253	46	238
4	49	253	46	238
1-1980	49	253	46	238
2	49	253	46	238
3	50	258	47	243
4	50	258	47	243
1-1981	50	258	47	243
2	50	258	47	243
3	50	258	47	243
4	50	258	47	243
1-1982	50	258	47	243
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1983	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1984	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1985	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1986	50	258	49	253
2	50	258	49	253

Year	Total (K gal)	Total (in)	Solids (K gal)	Solids (in)
3	50	258	49	253
4	50	258	49	253
1-1987	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1988	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1989	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1990	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1991	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1992	50	258	49	253
2	50	258	49	253
3	50	258	49	253
4	50	258	49	253
1-1993	50	258	49	253
2	50	258	49	253
3				
4				





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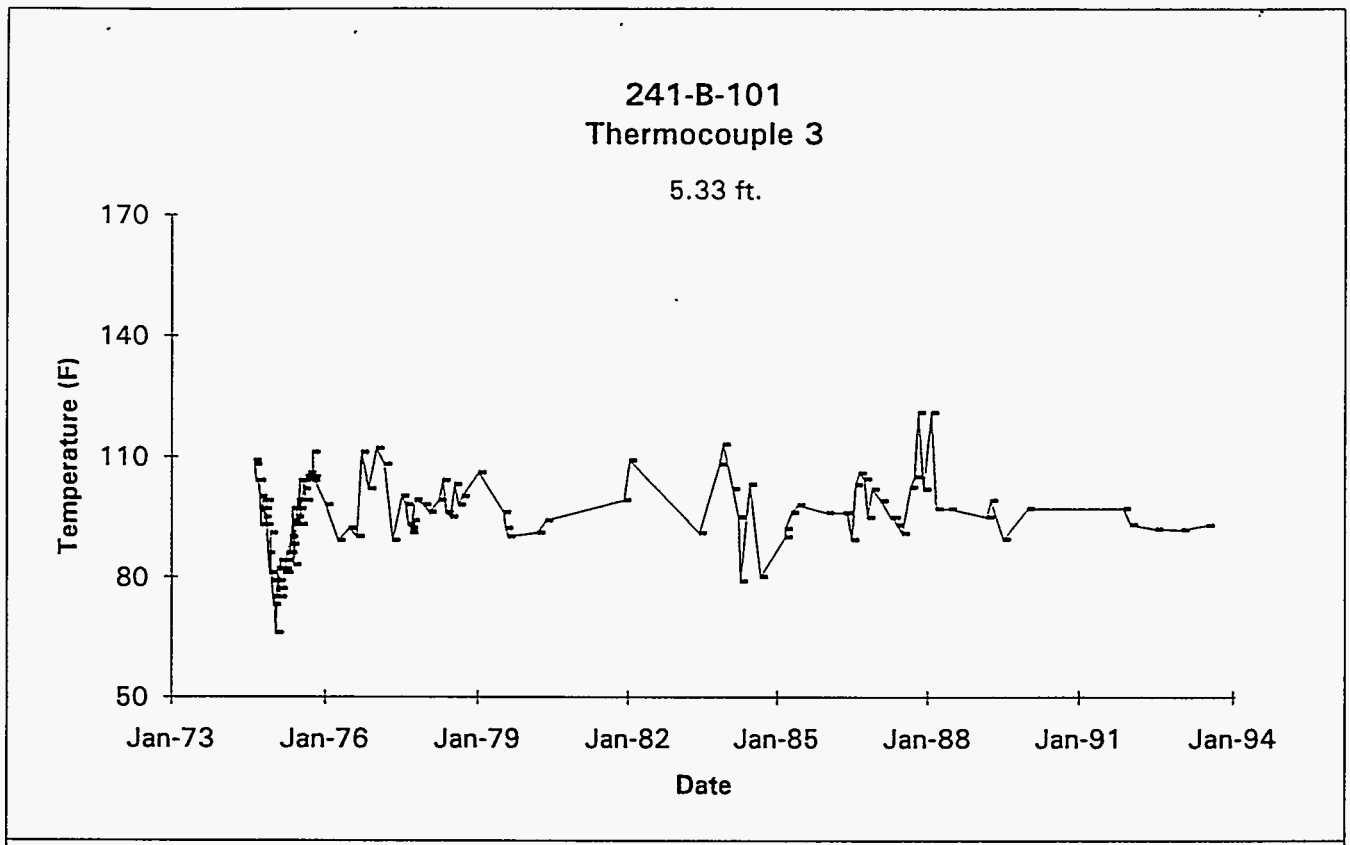

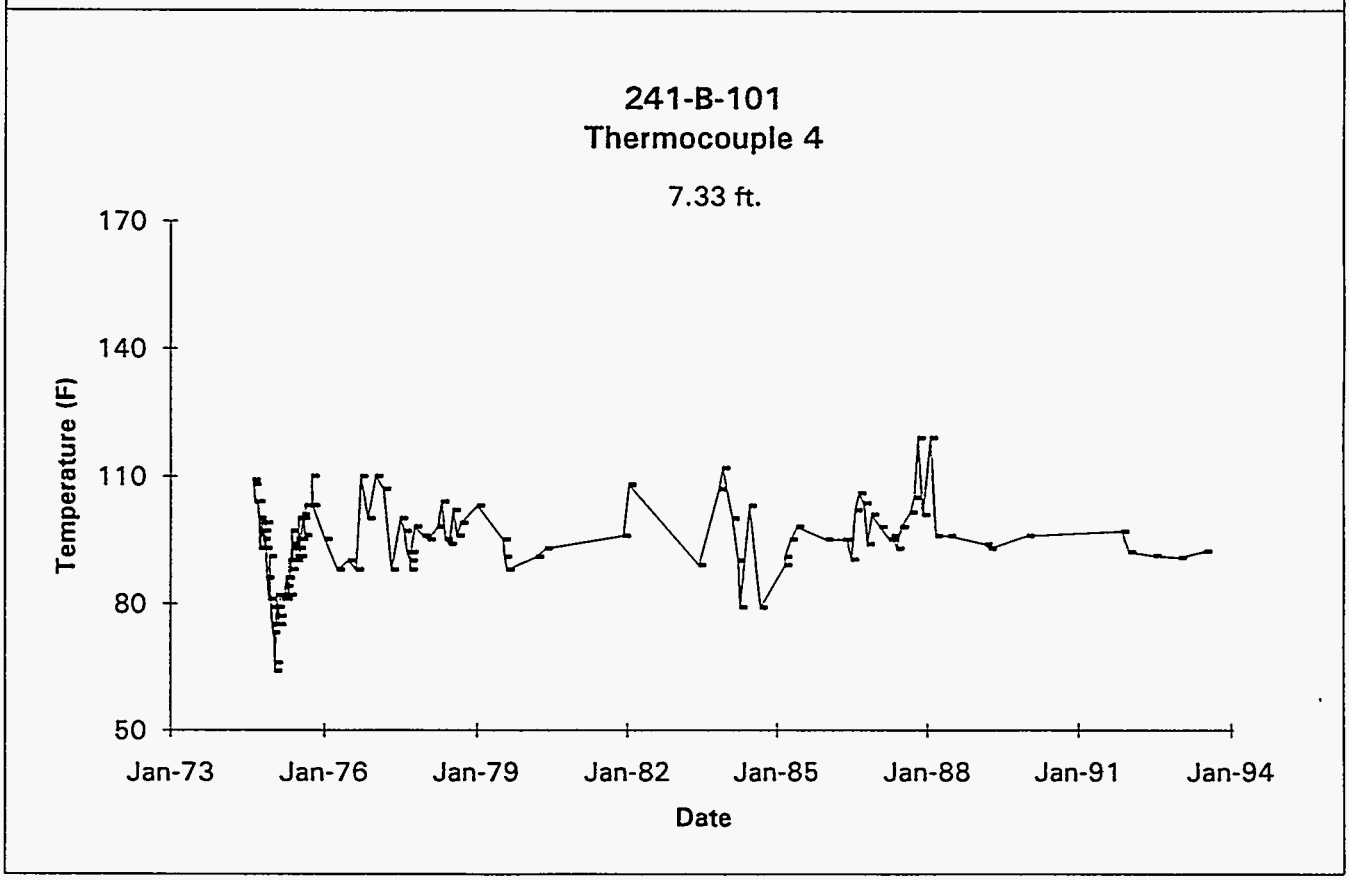

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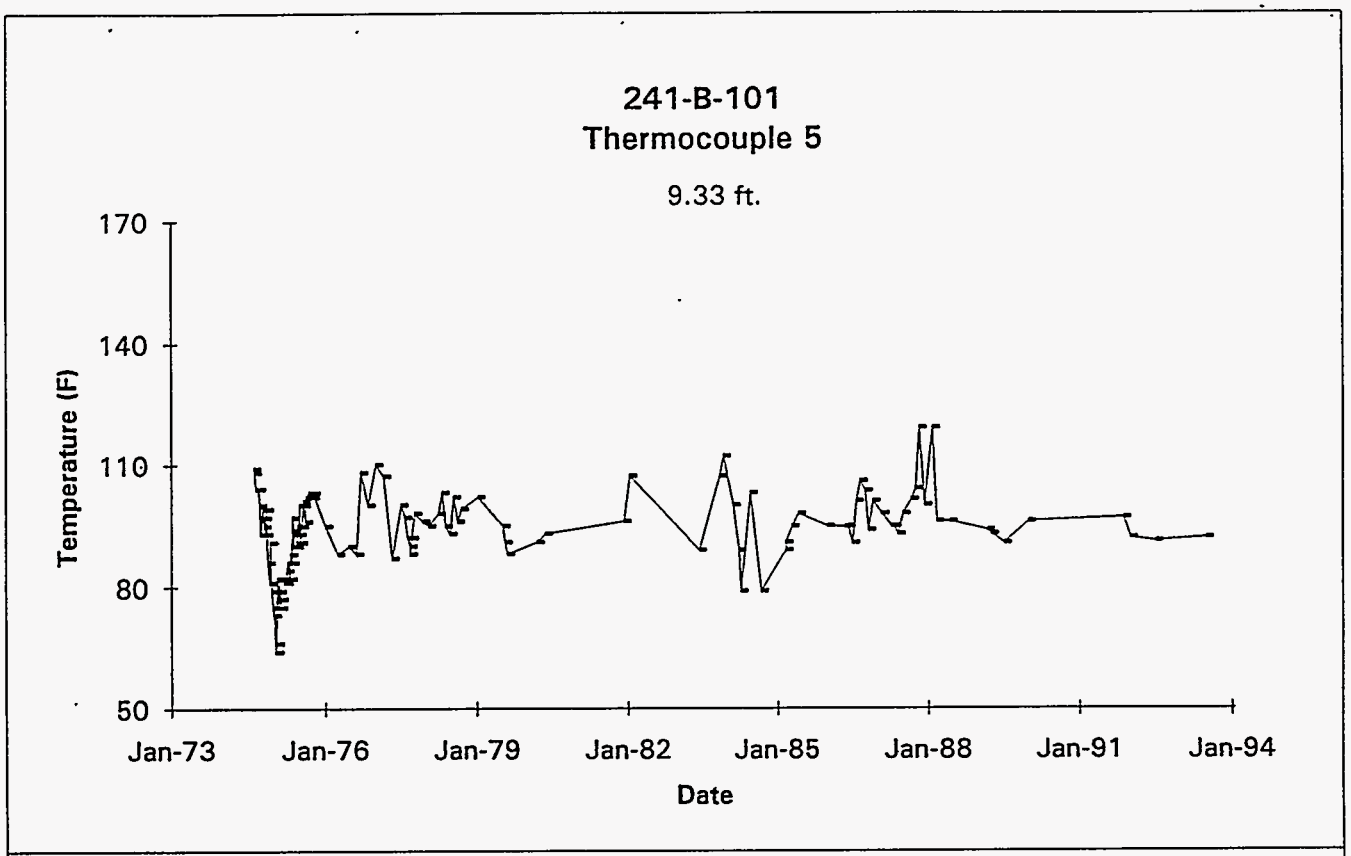

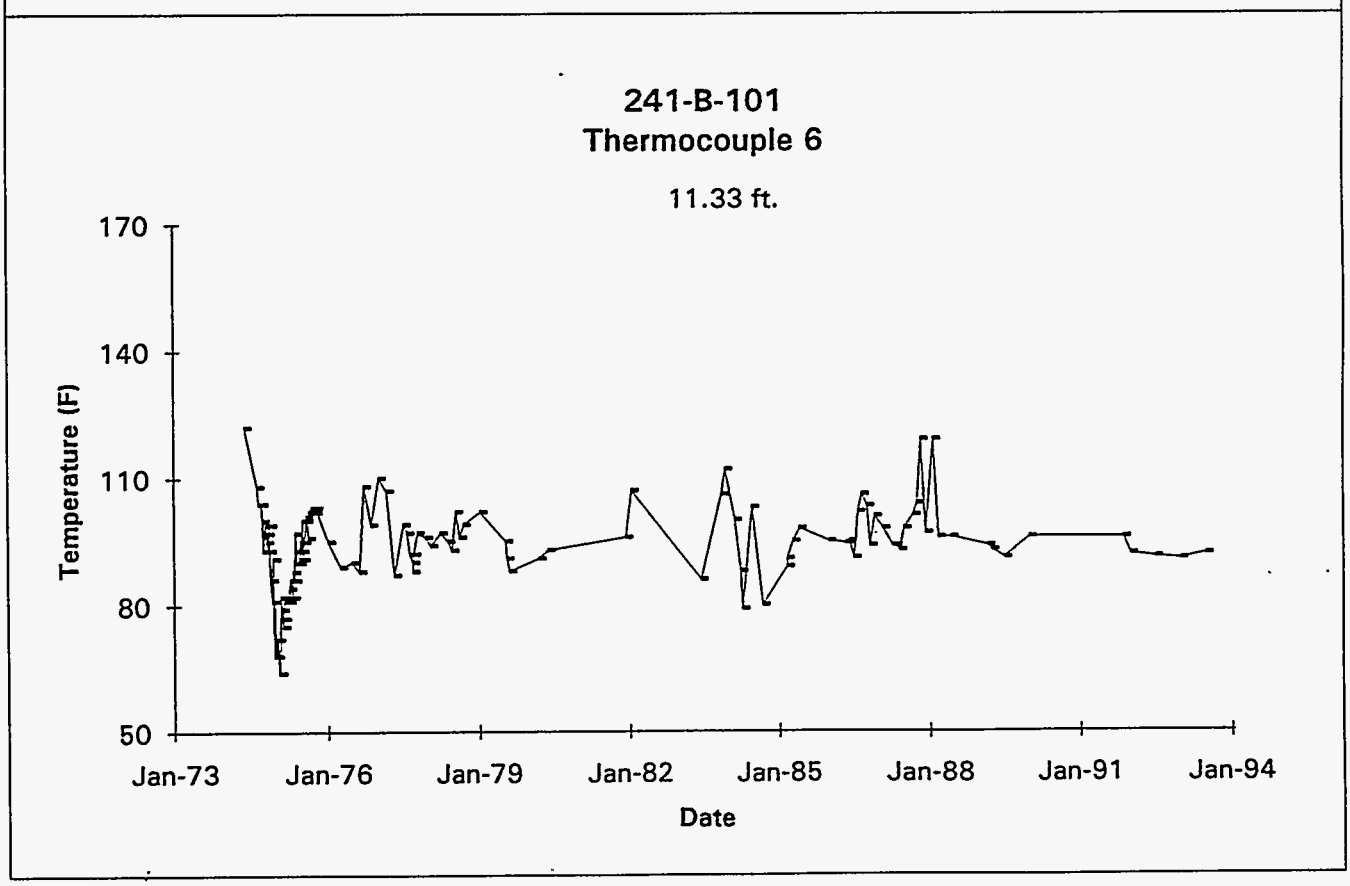

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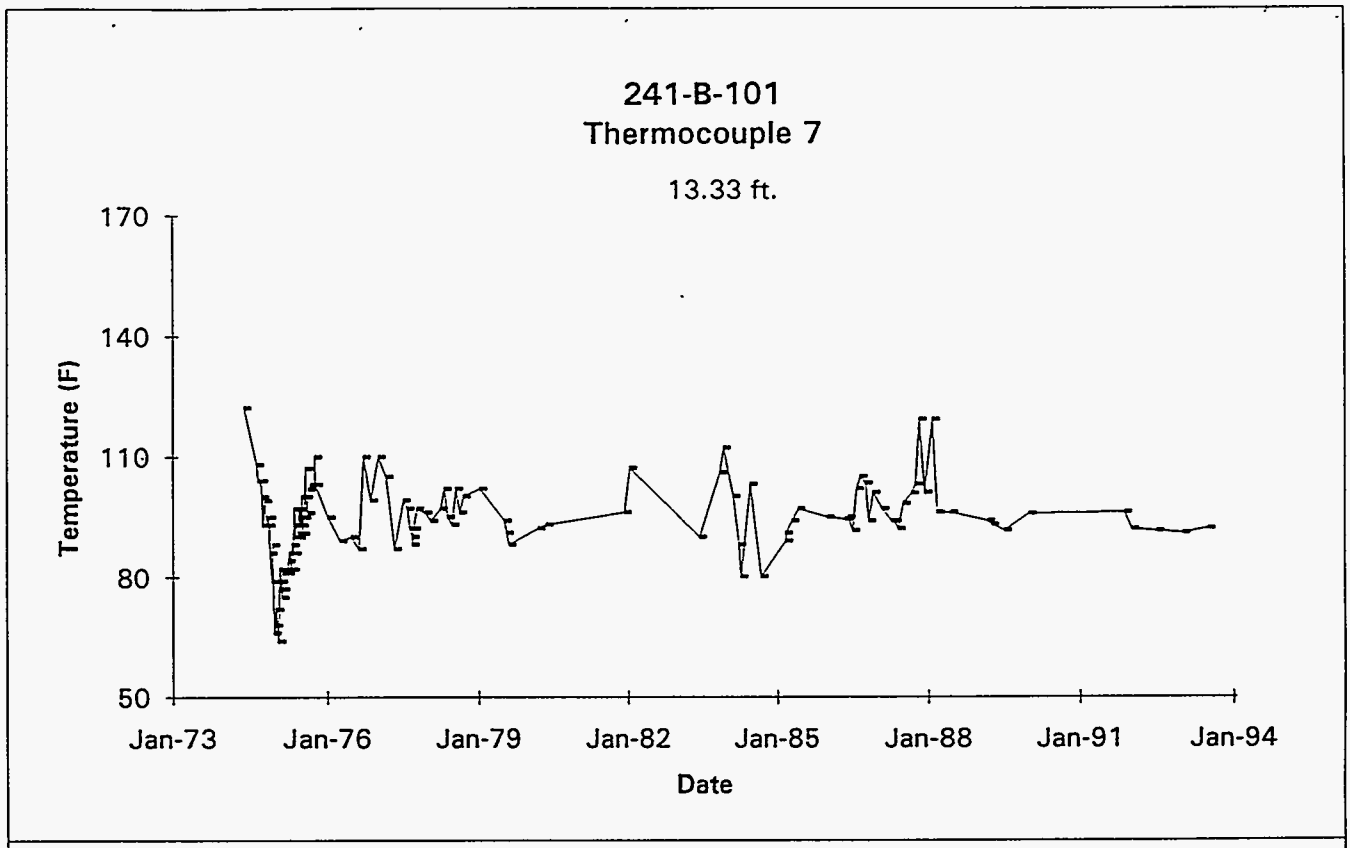

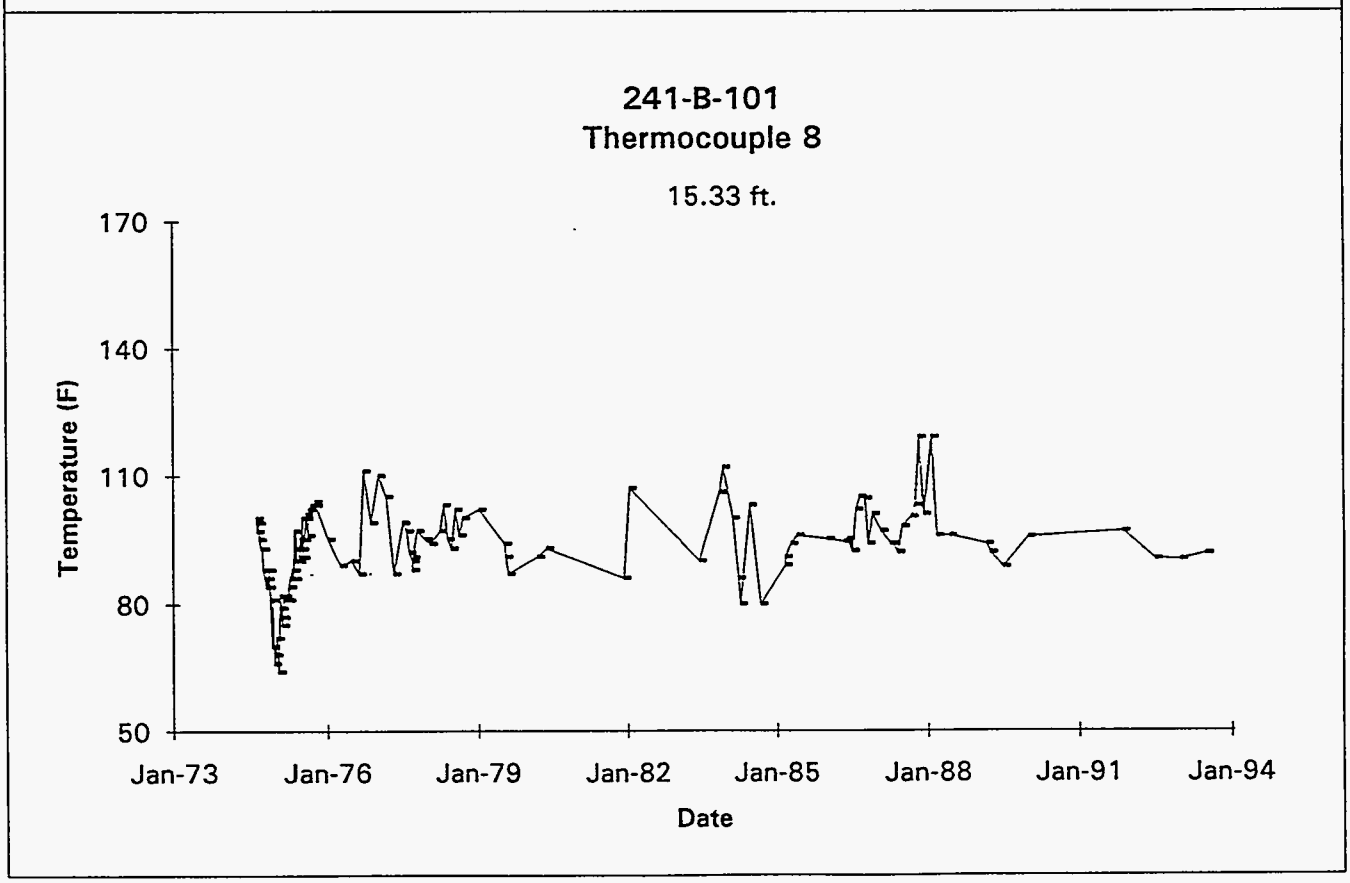

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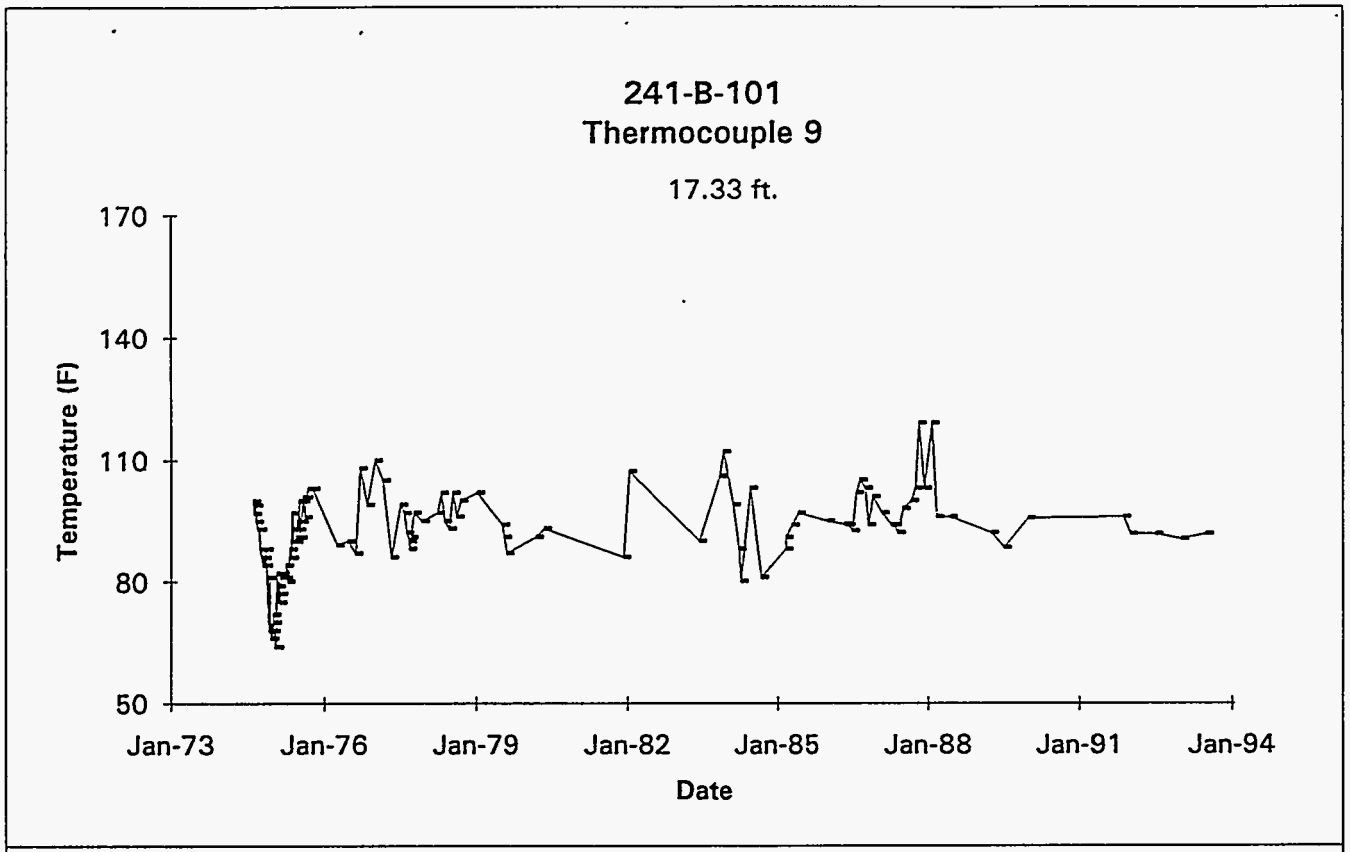

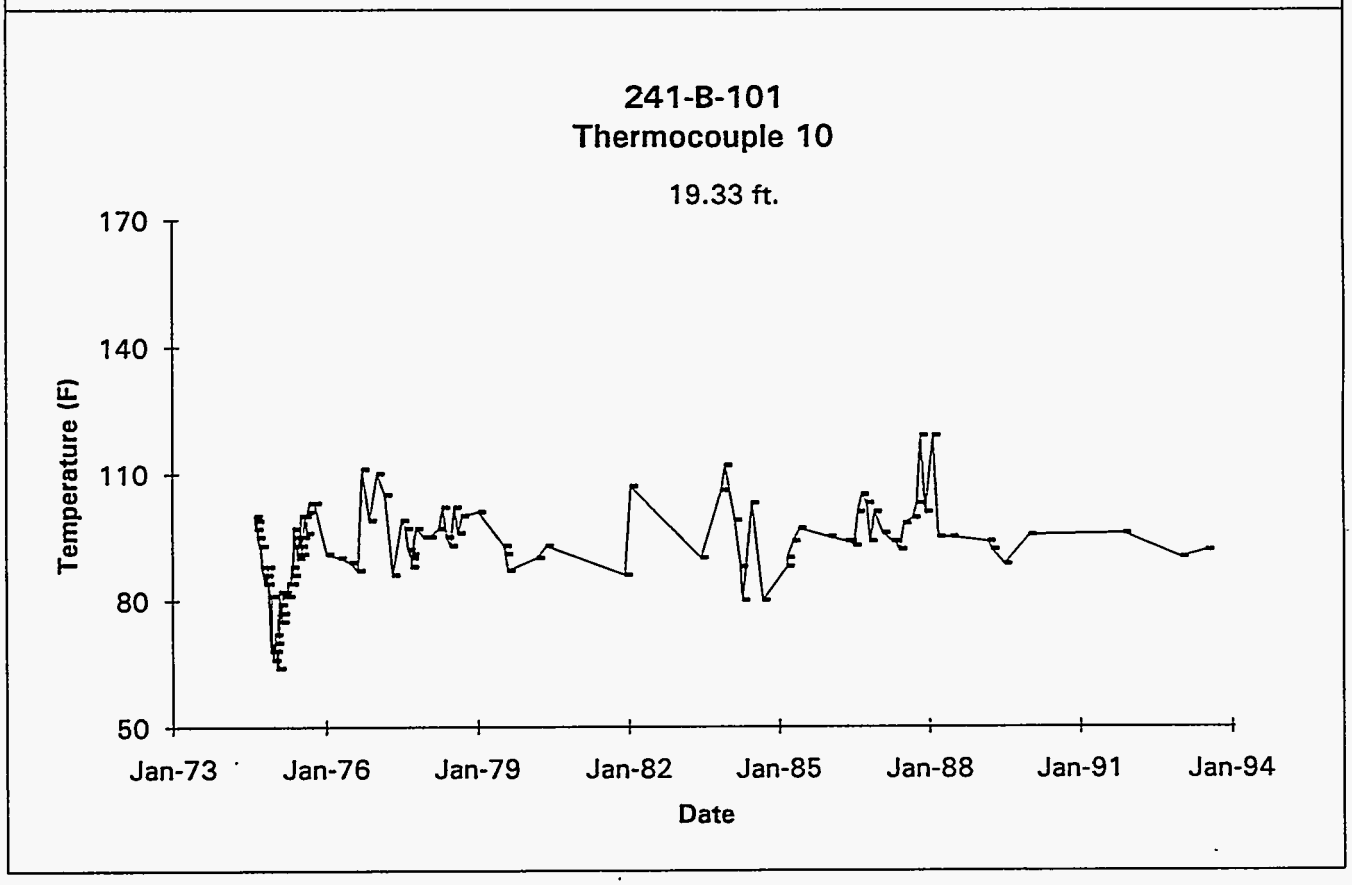

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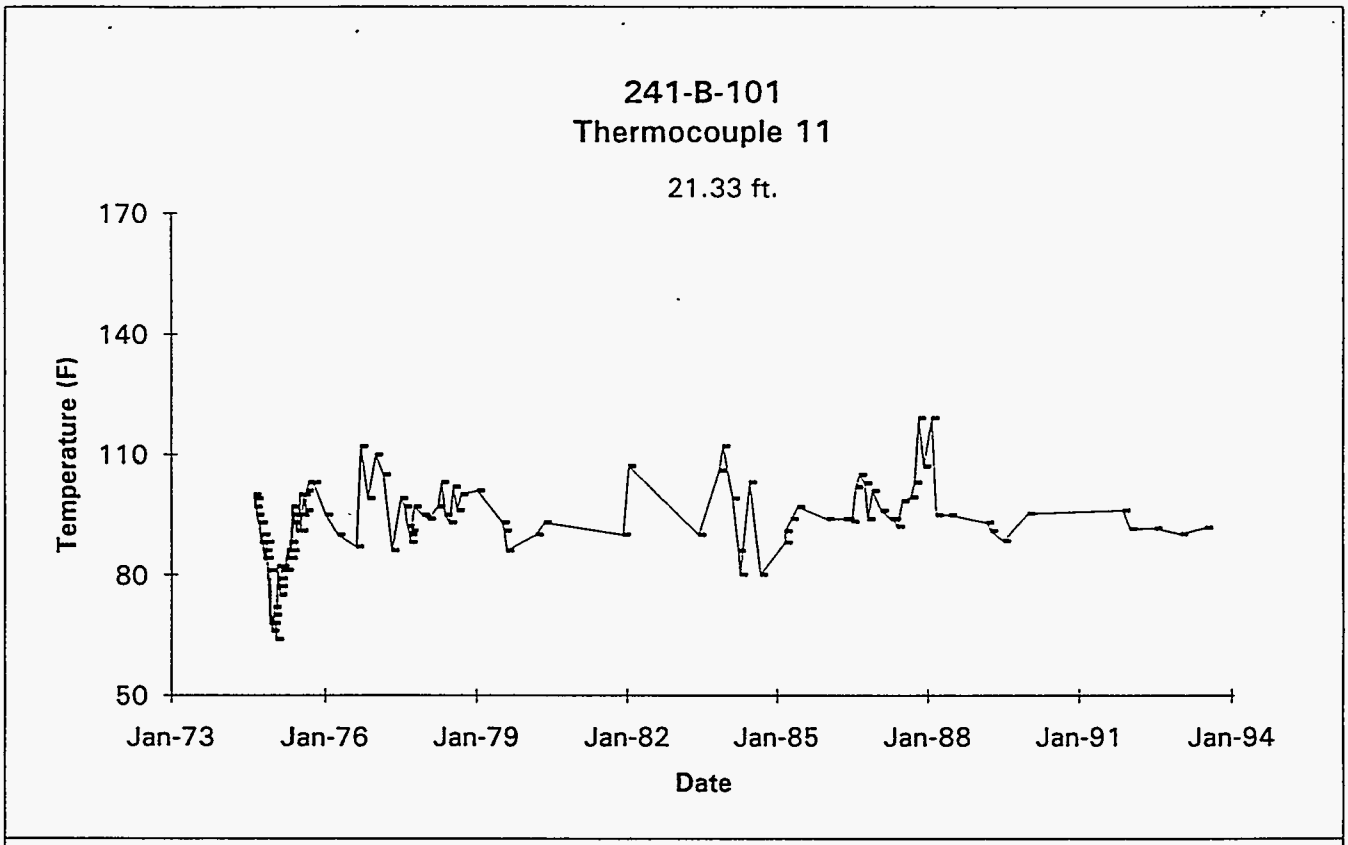

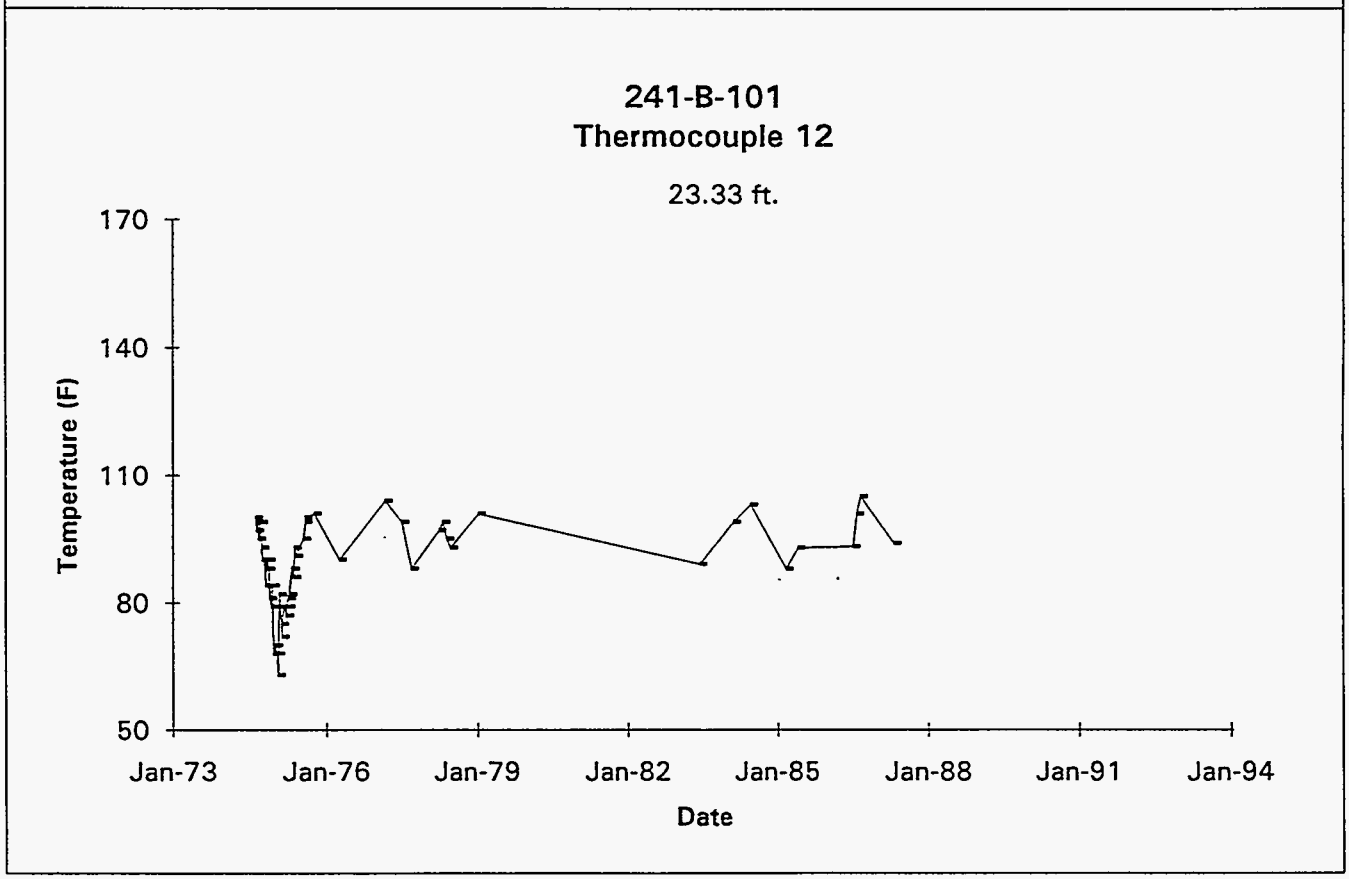

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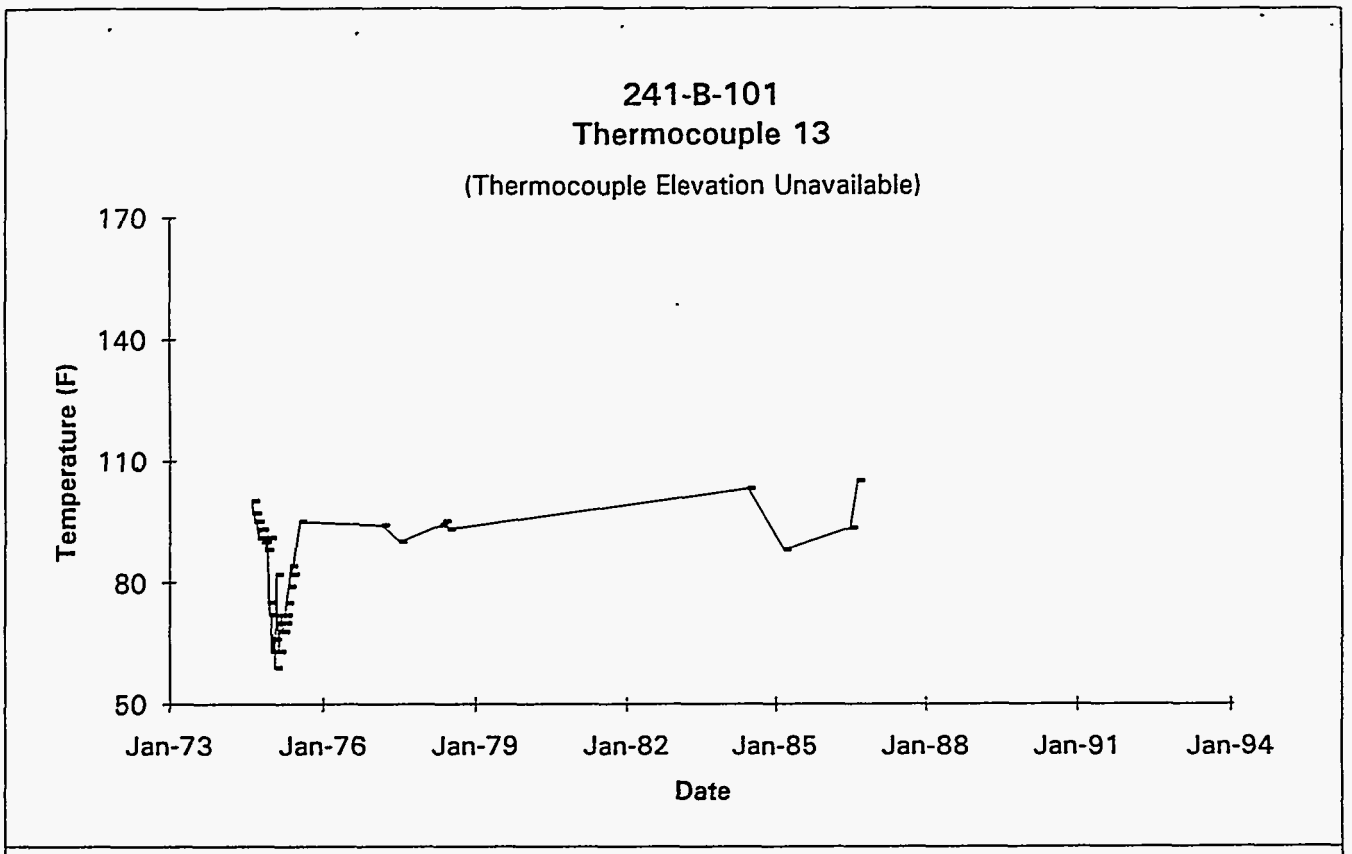

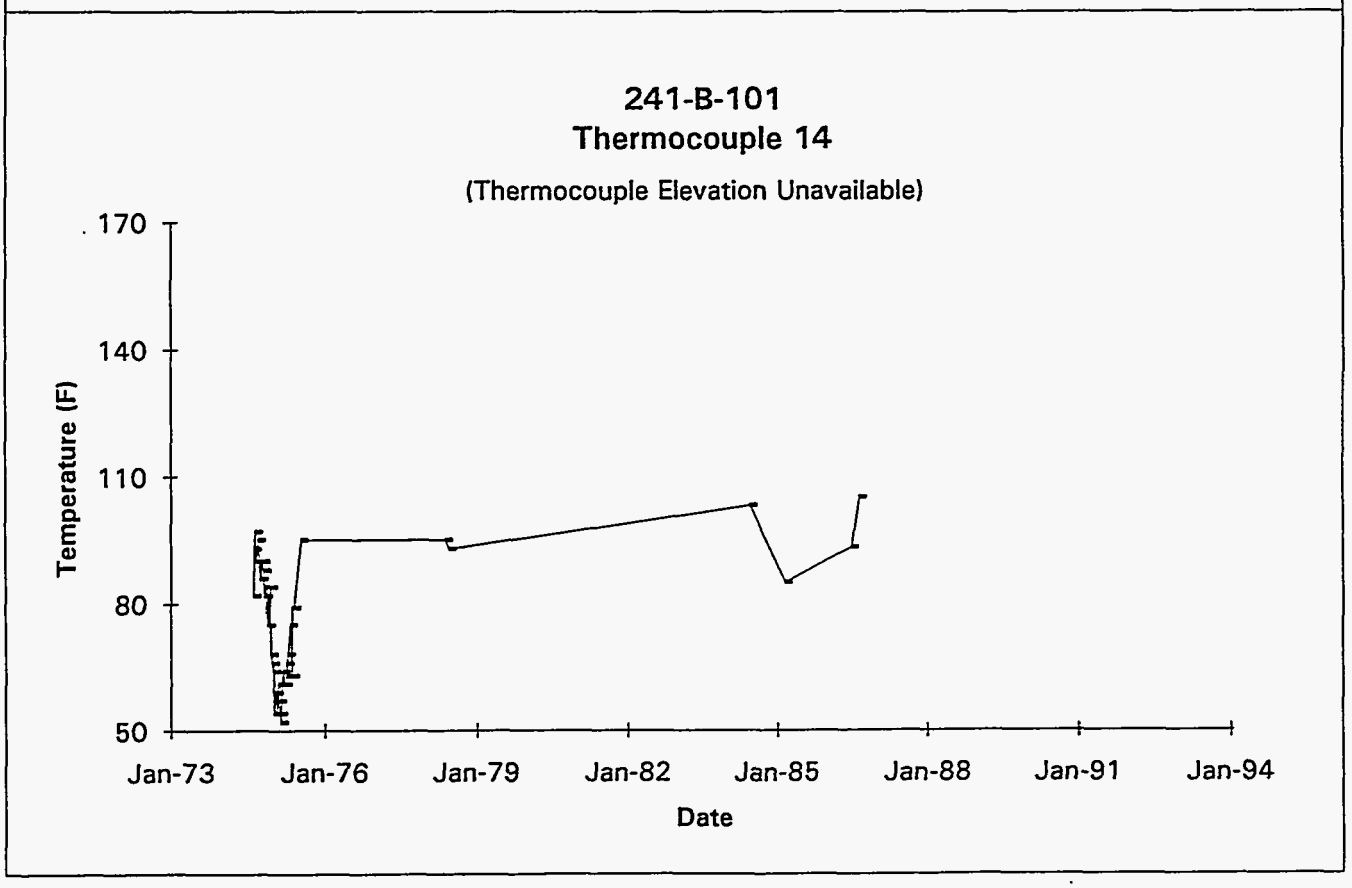

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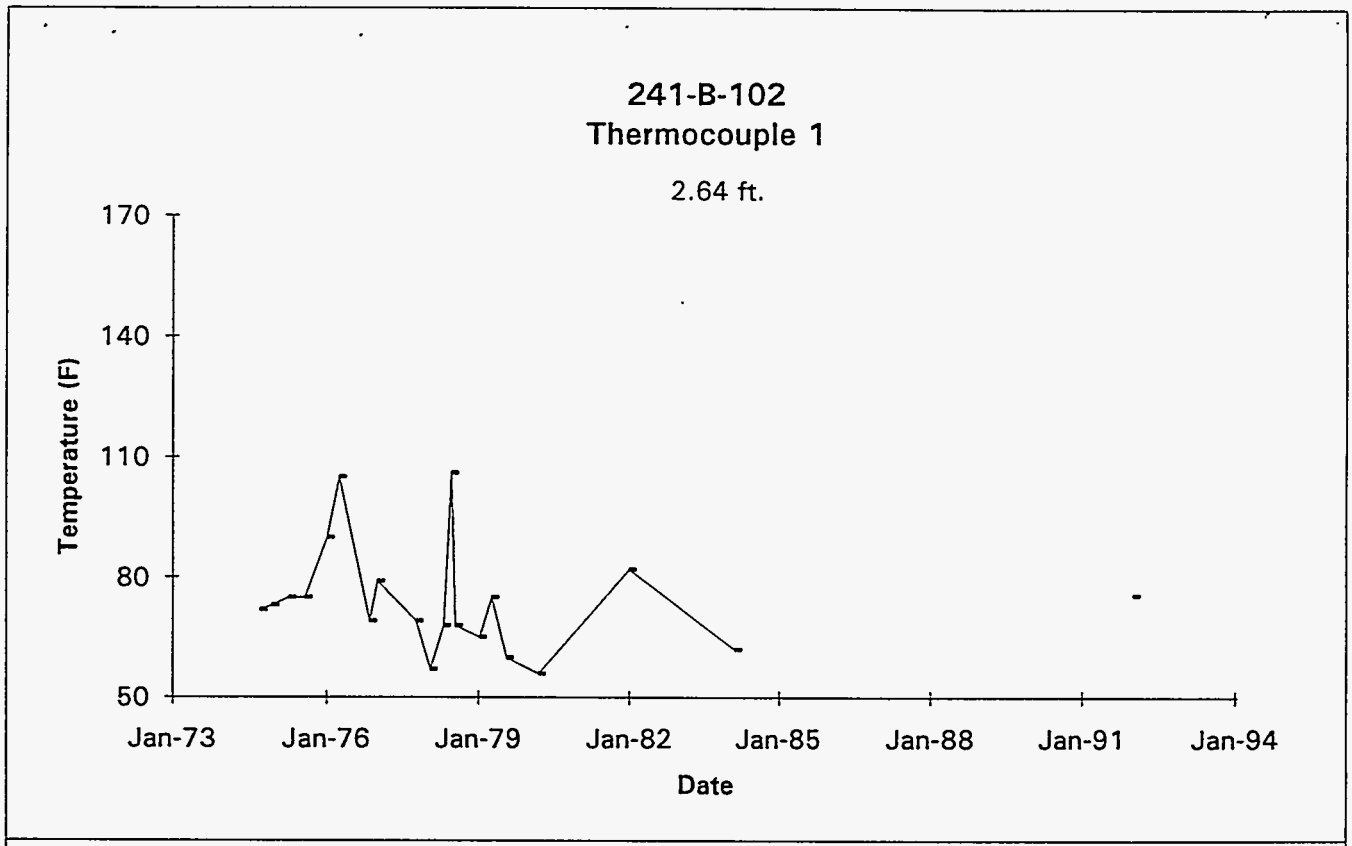

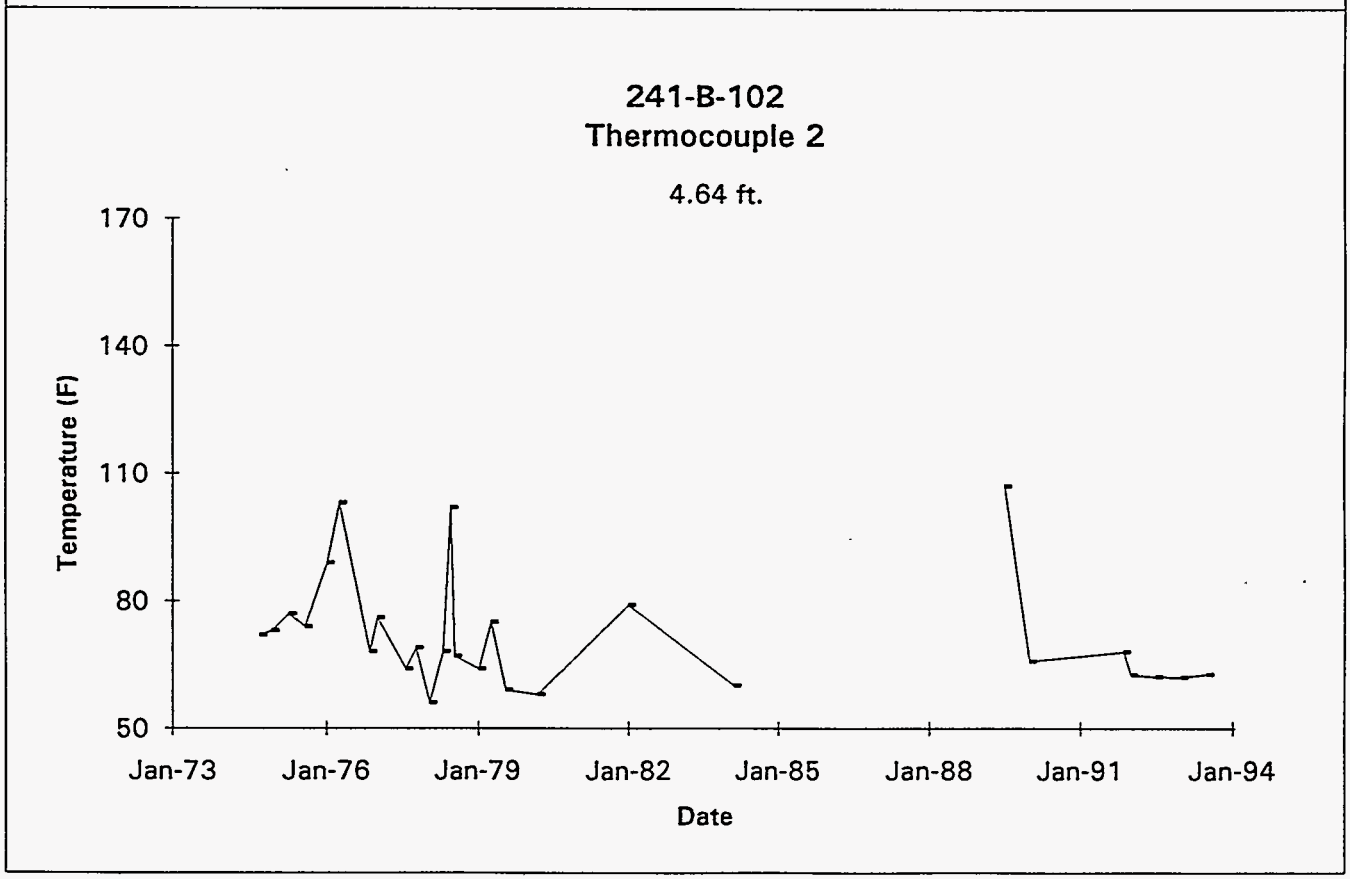

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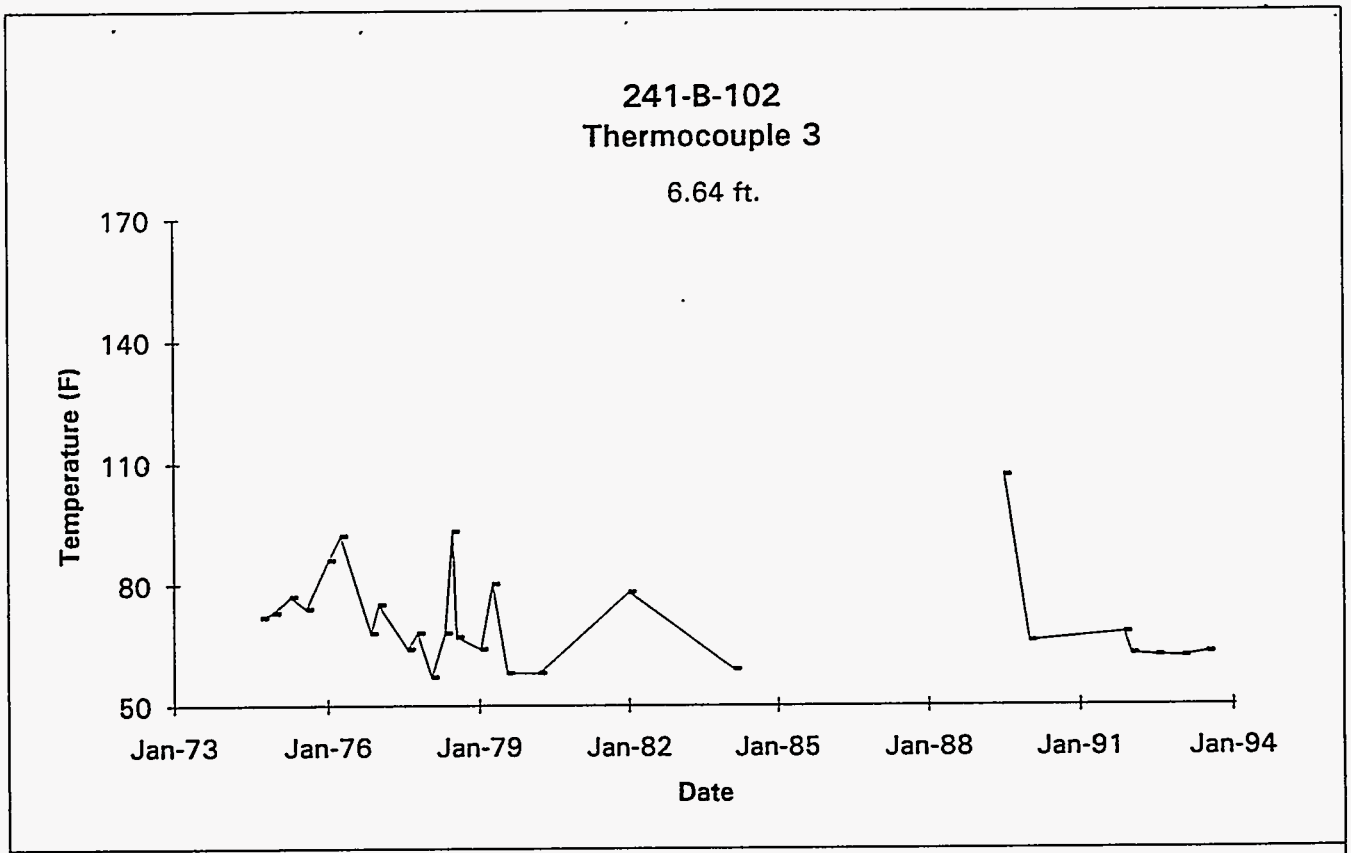

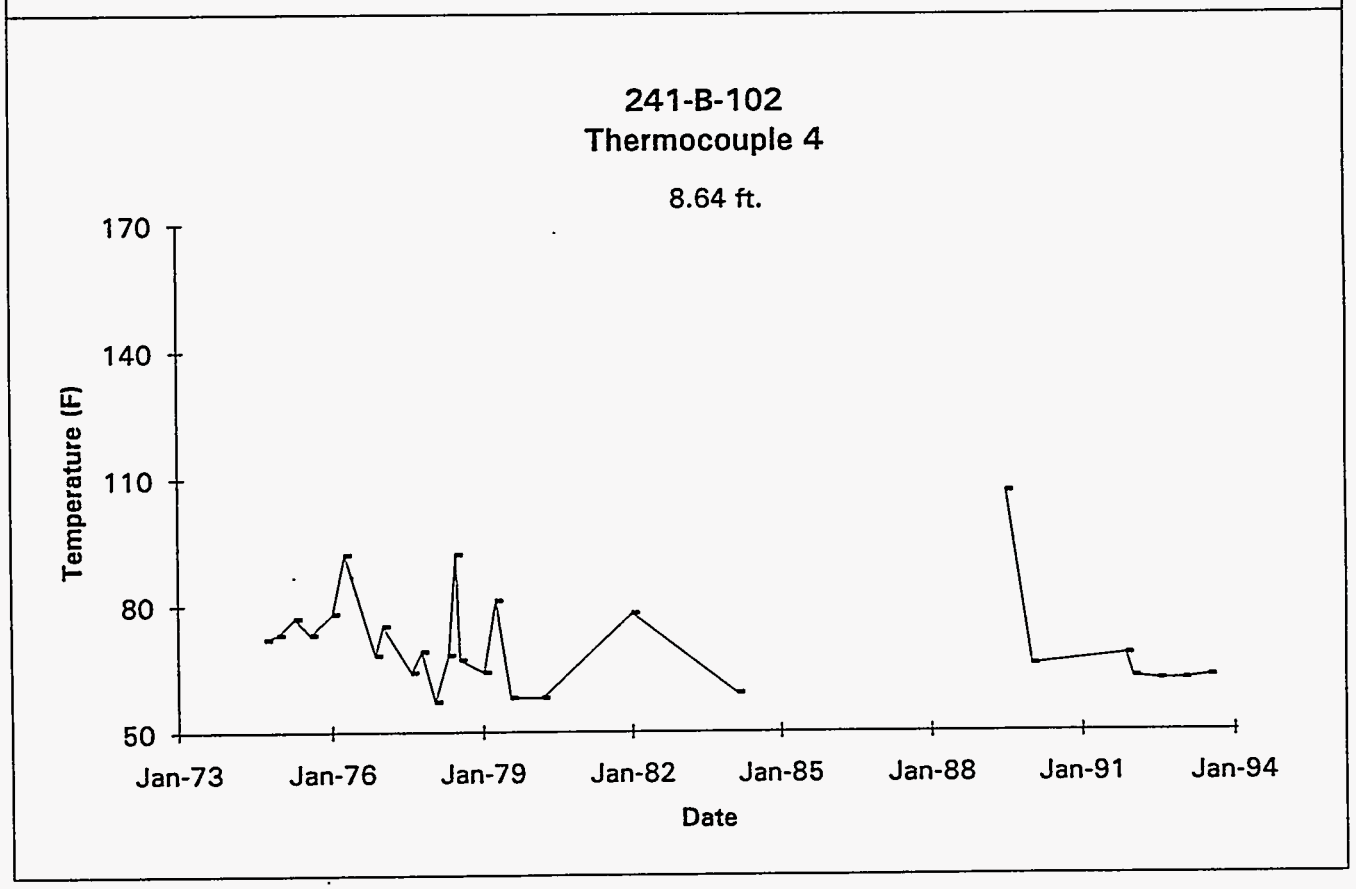

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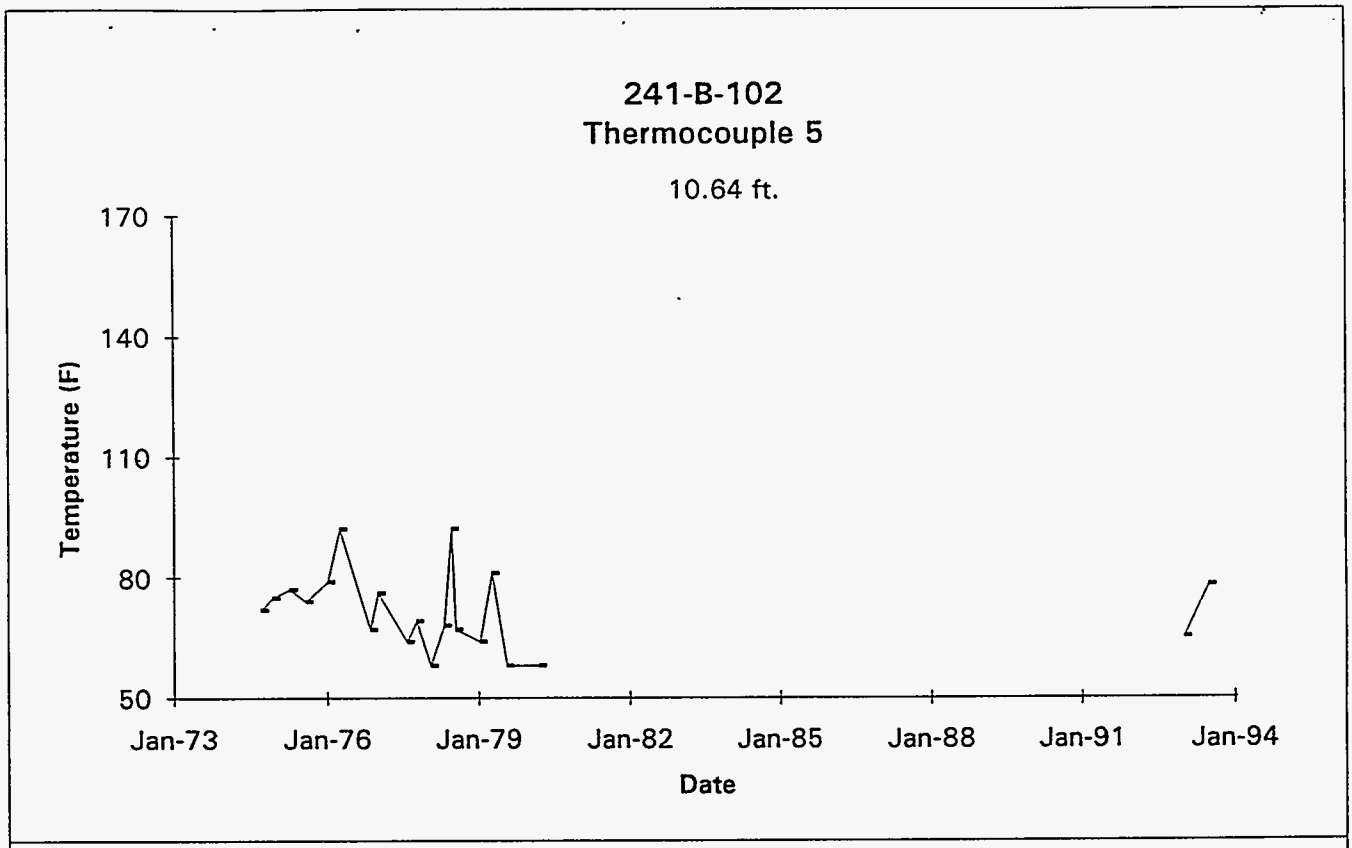

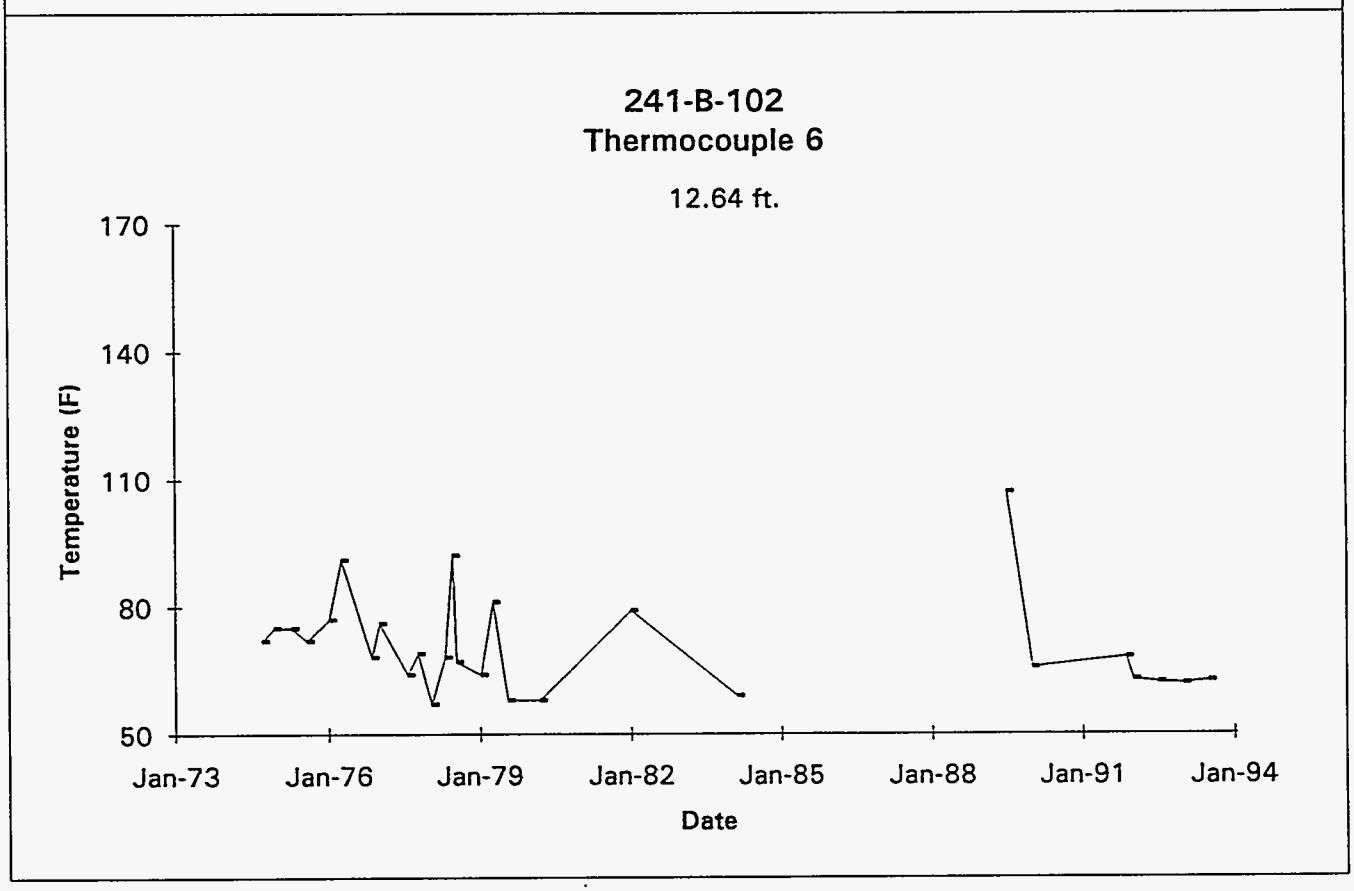

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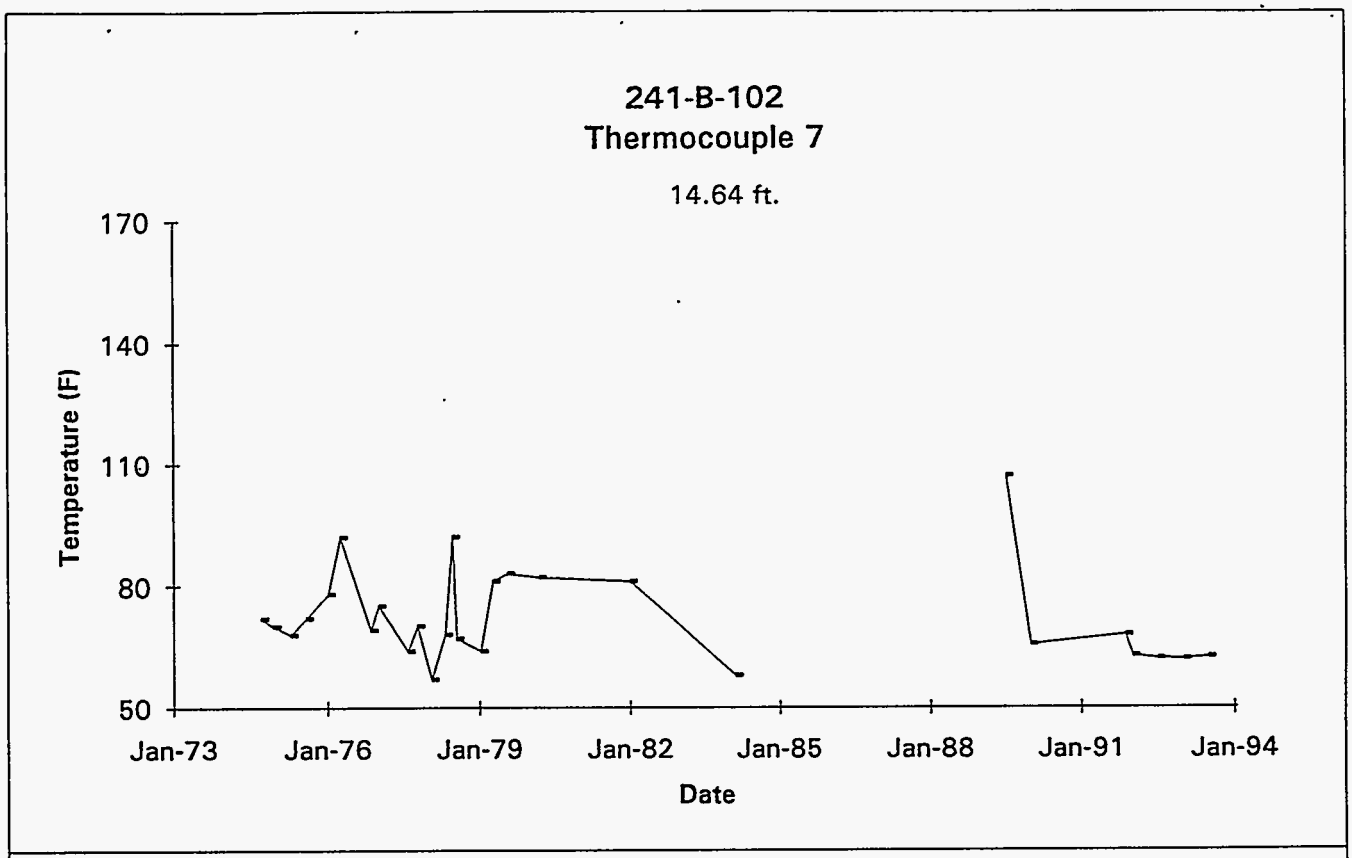

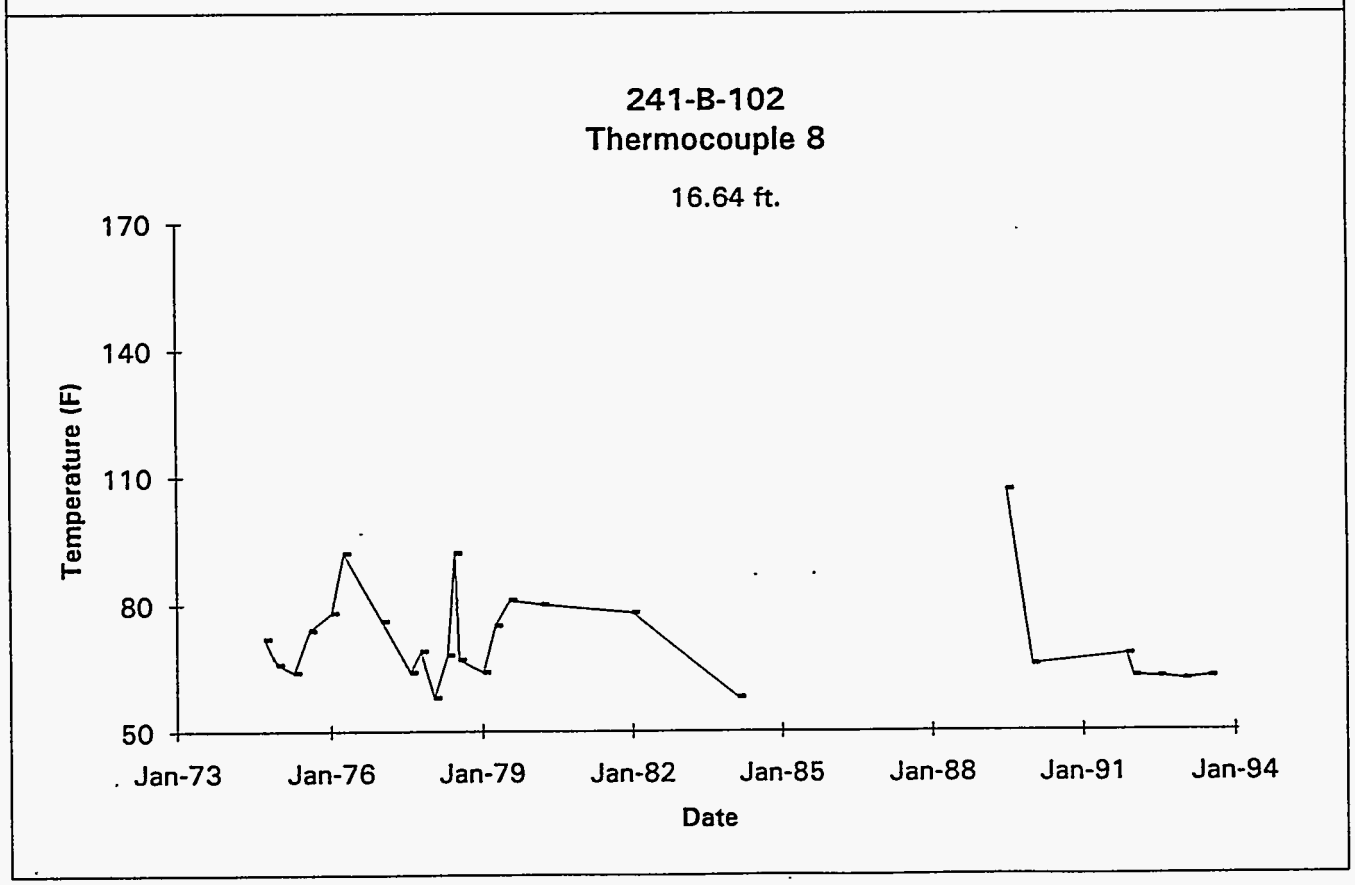

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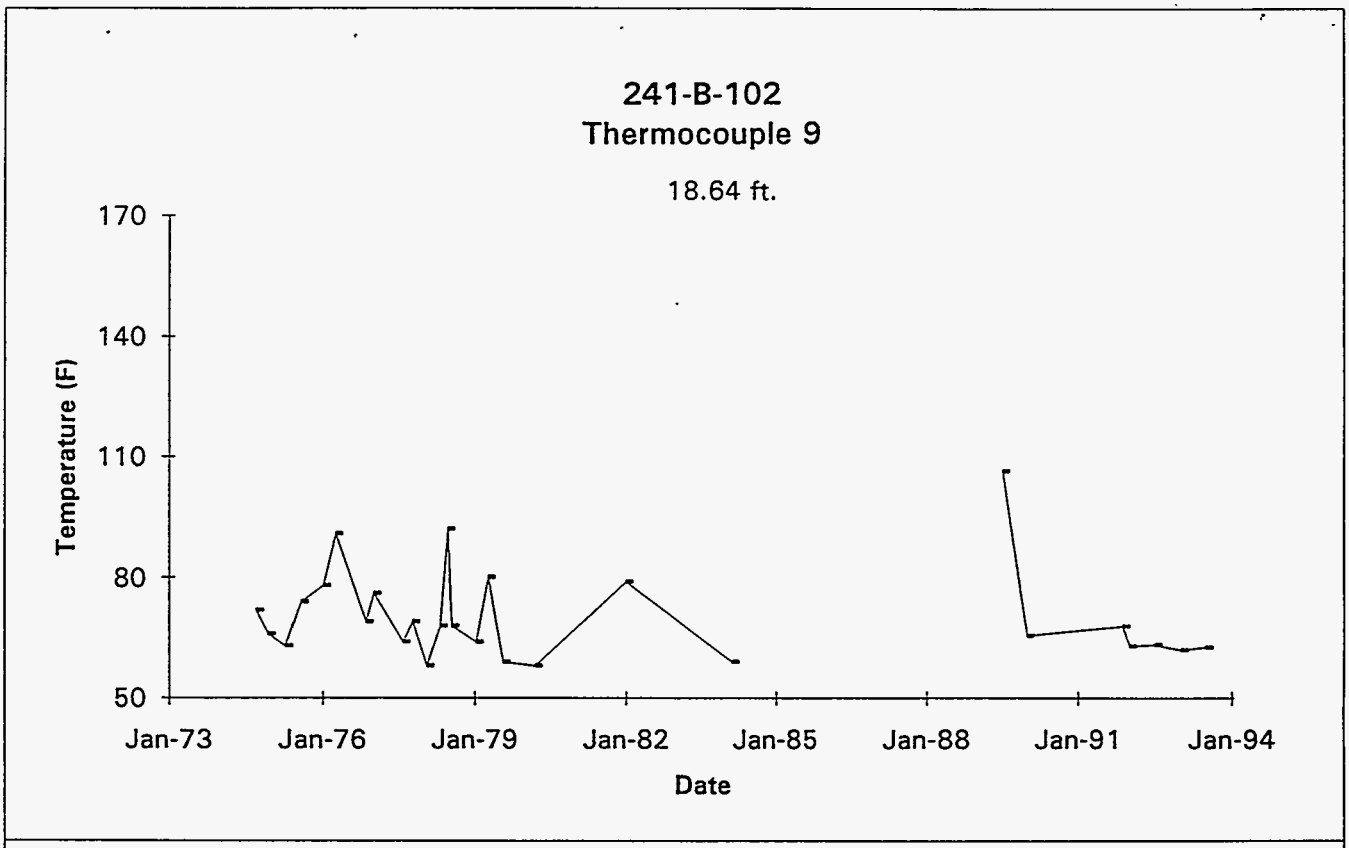

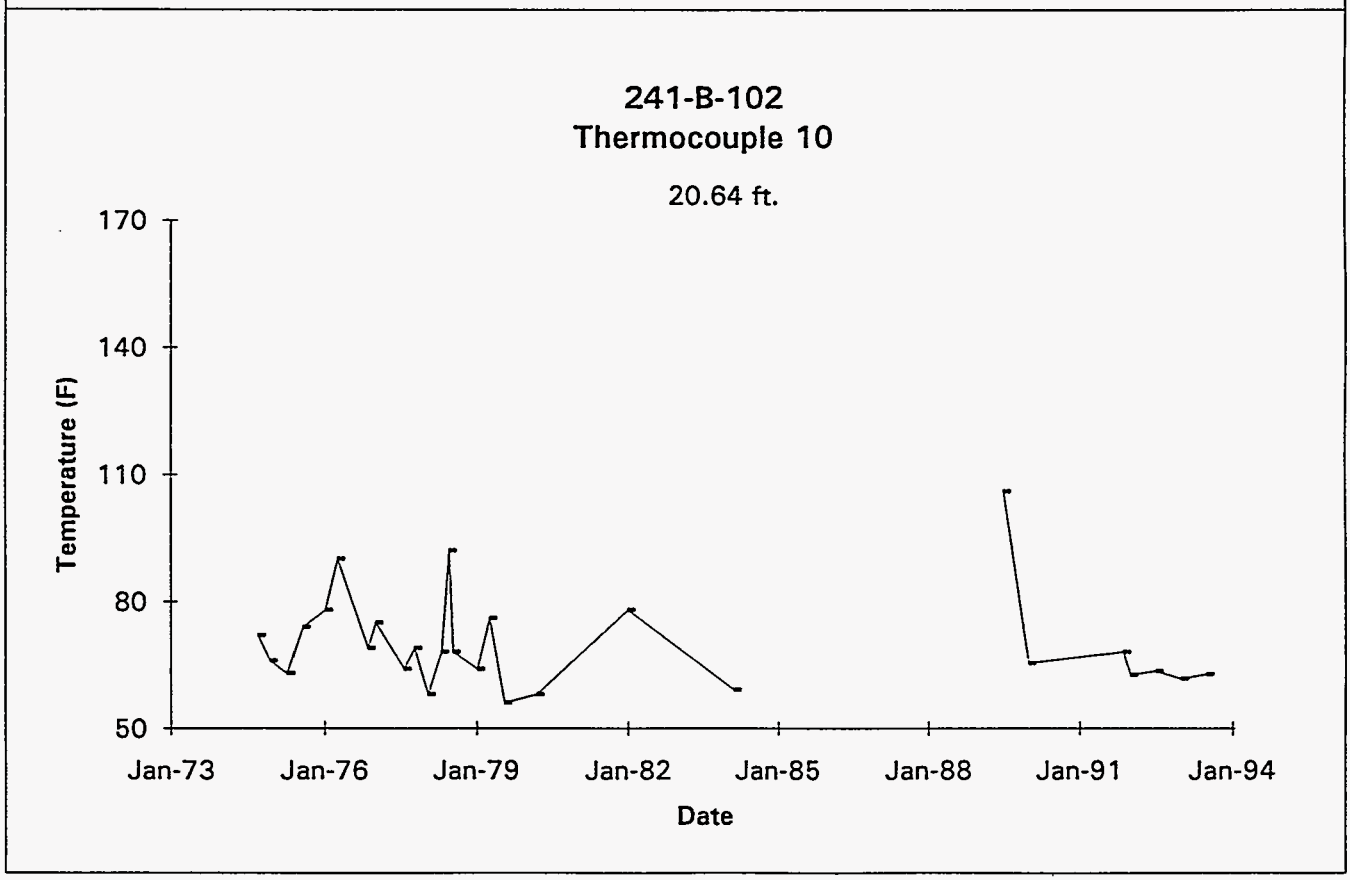

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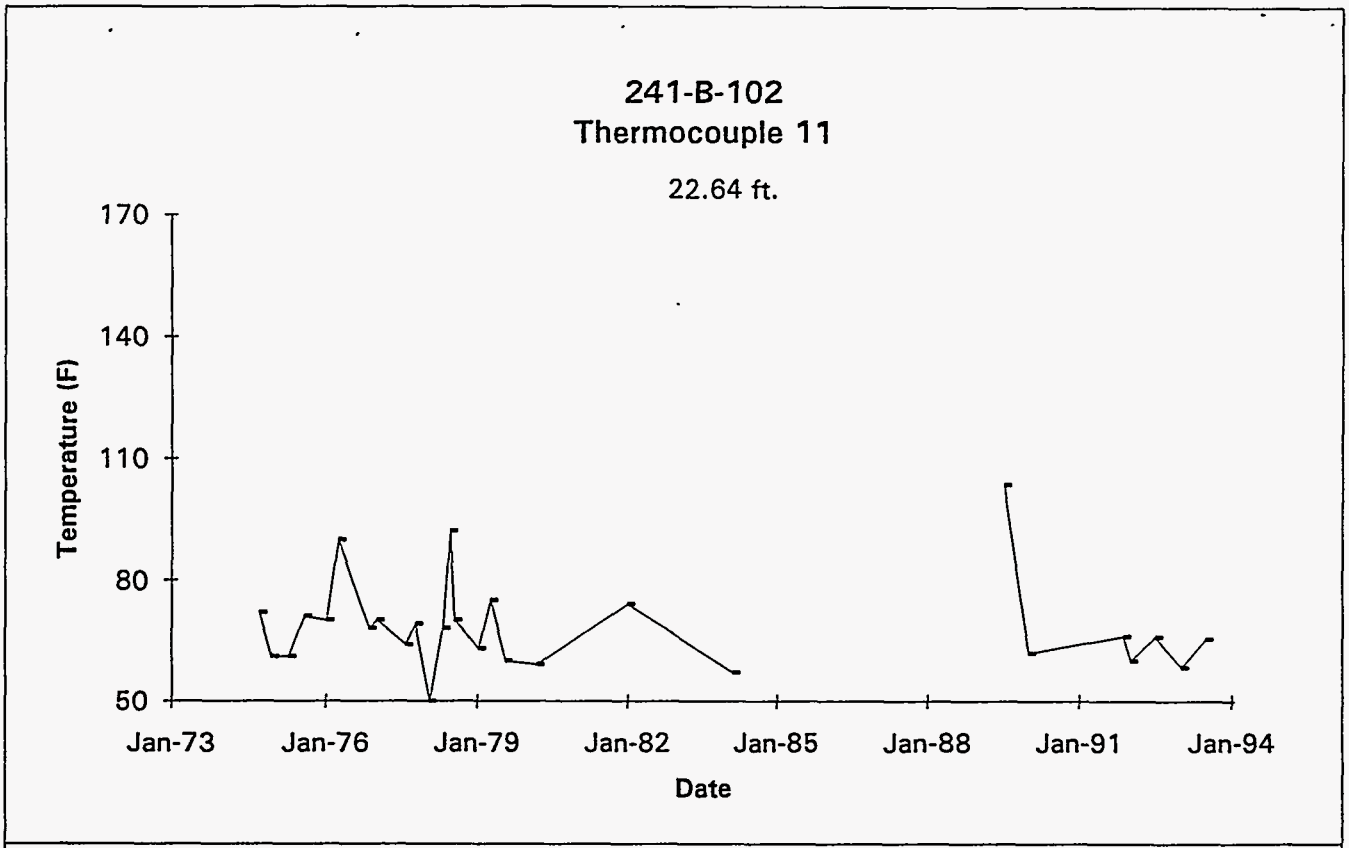

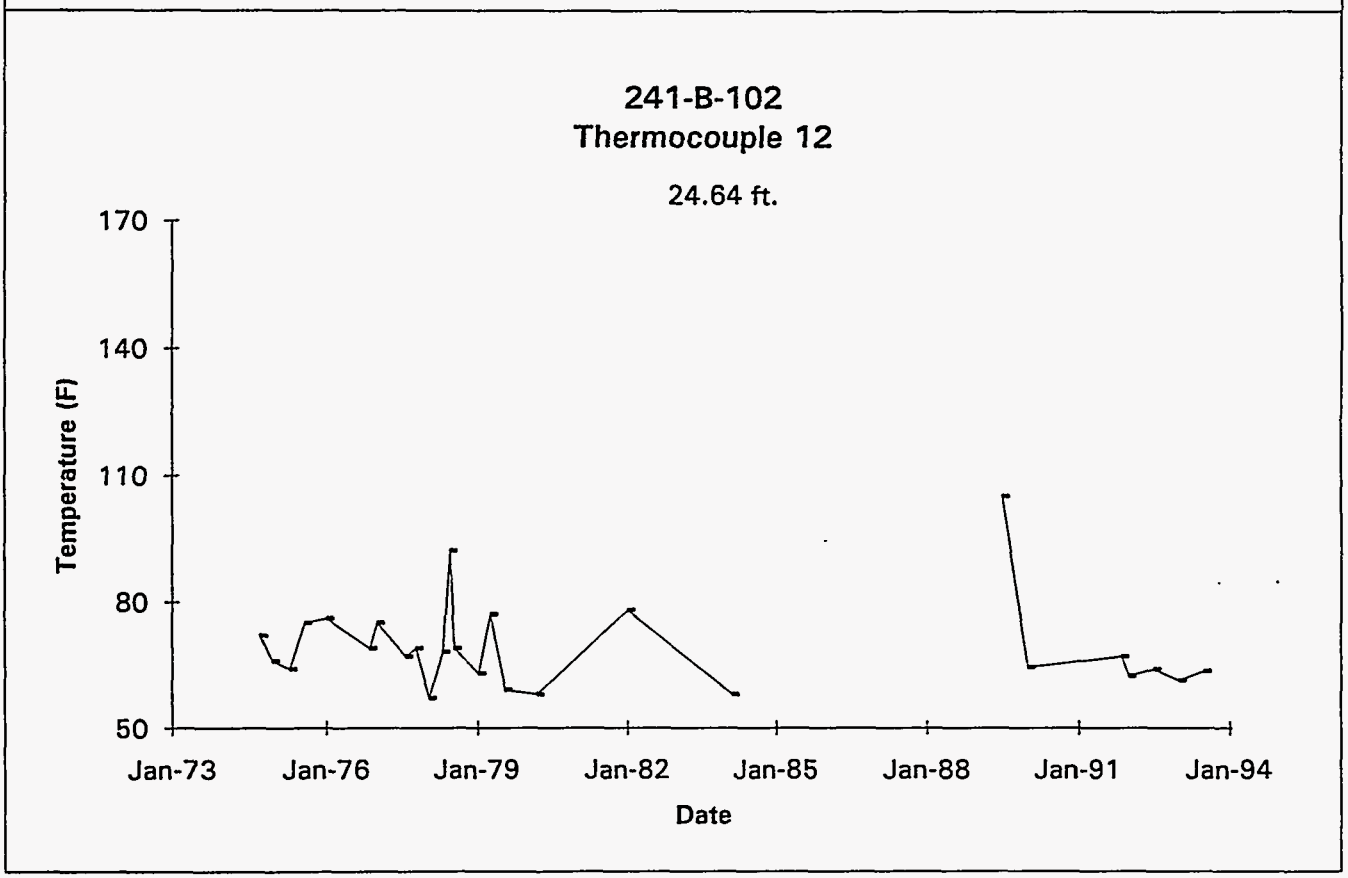

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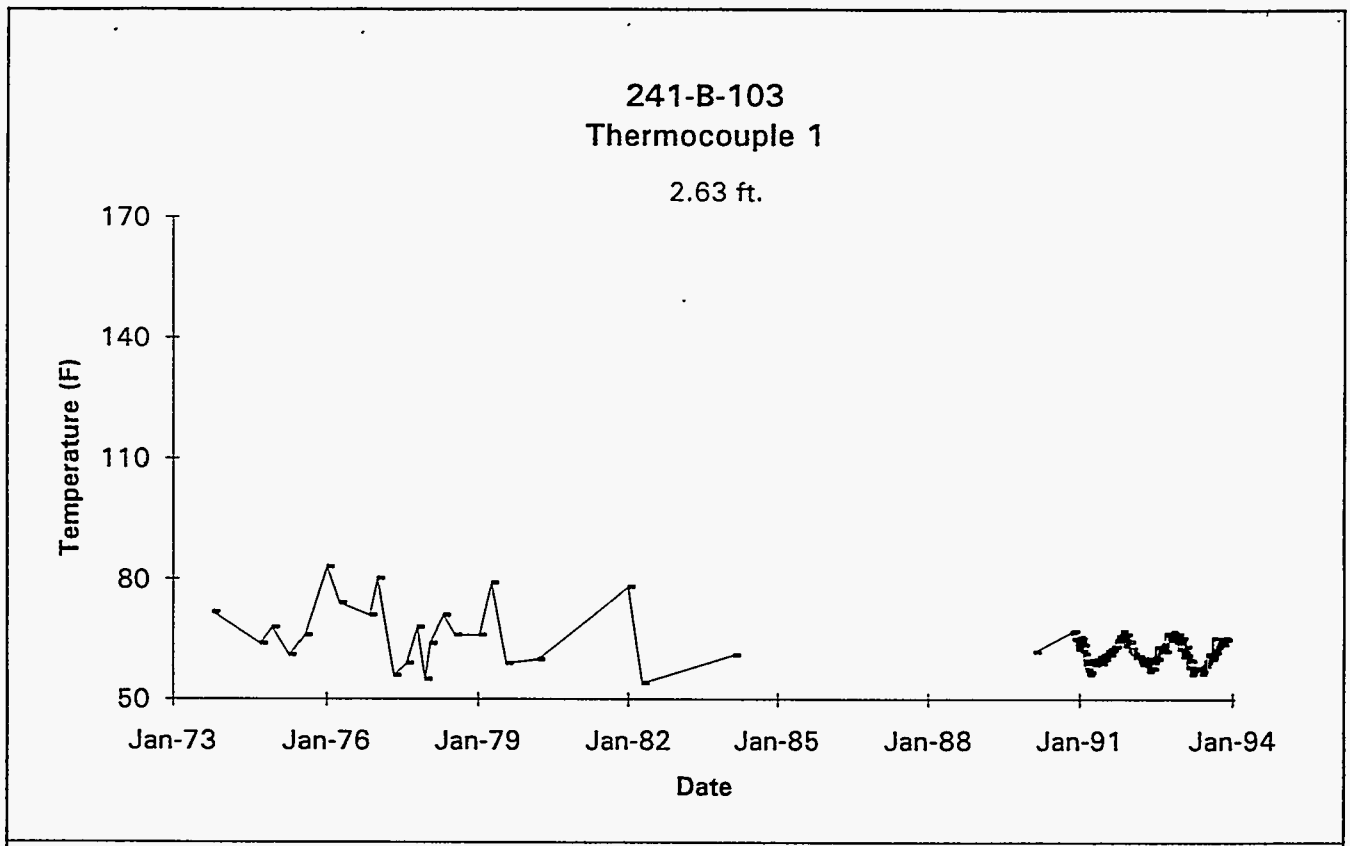

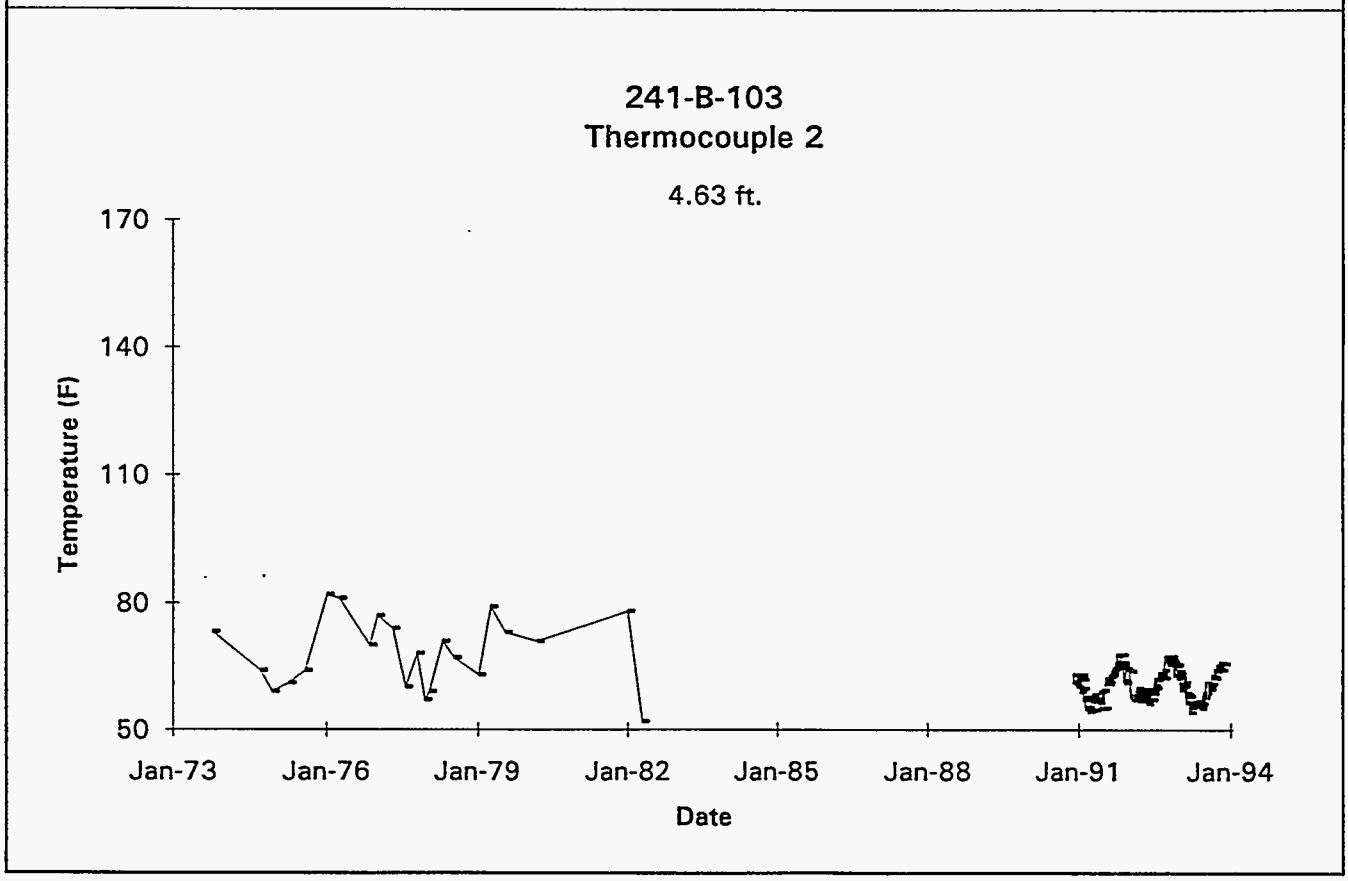

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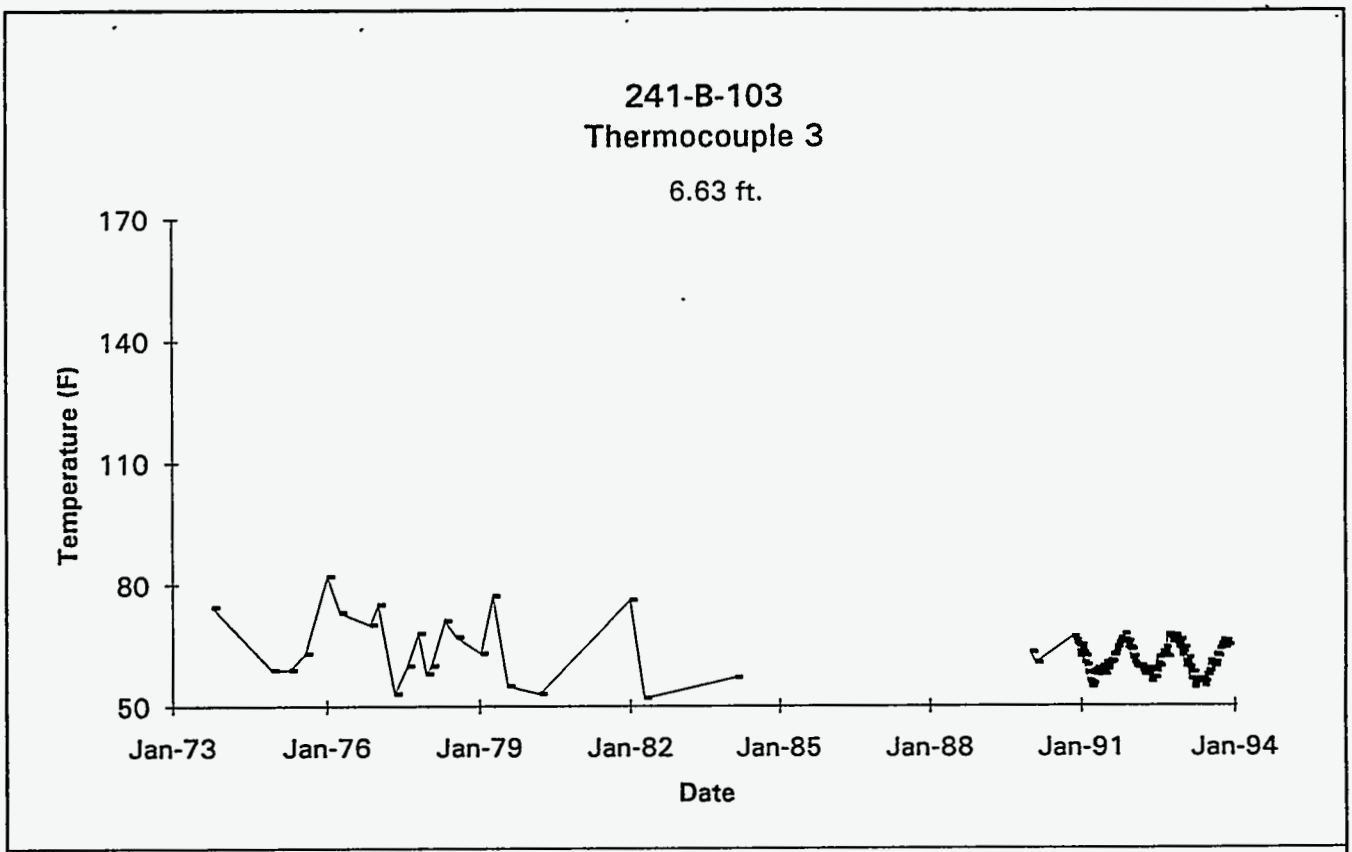

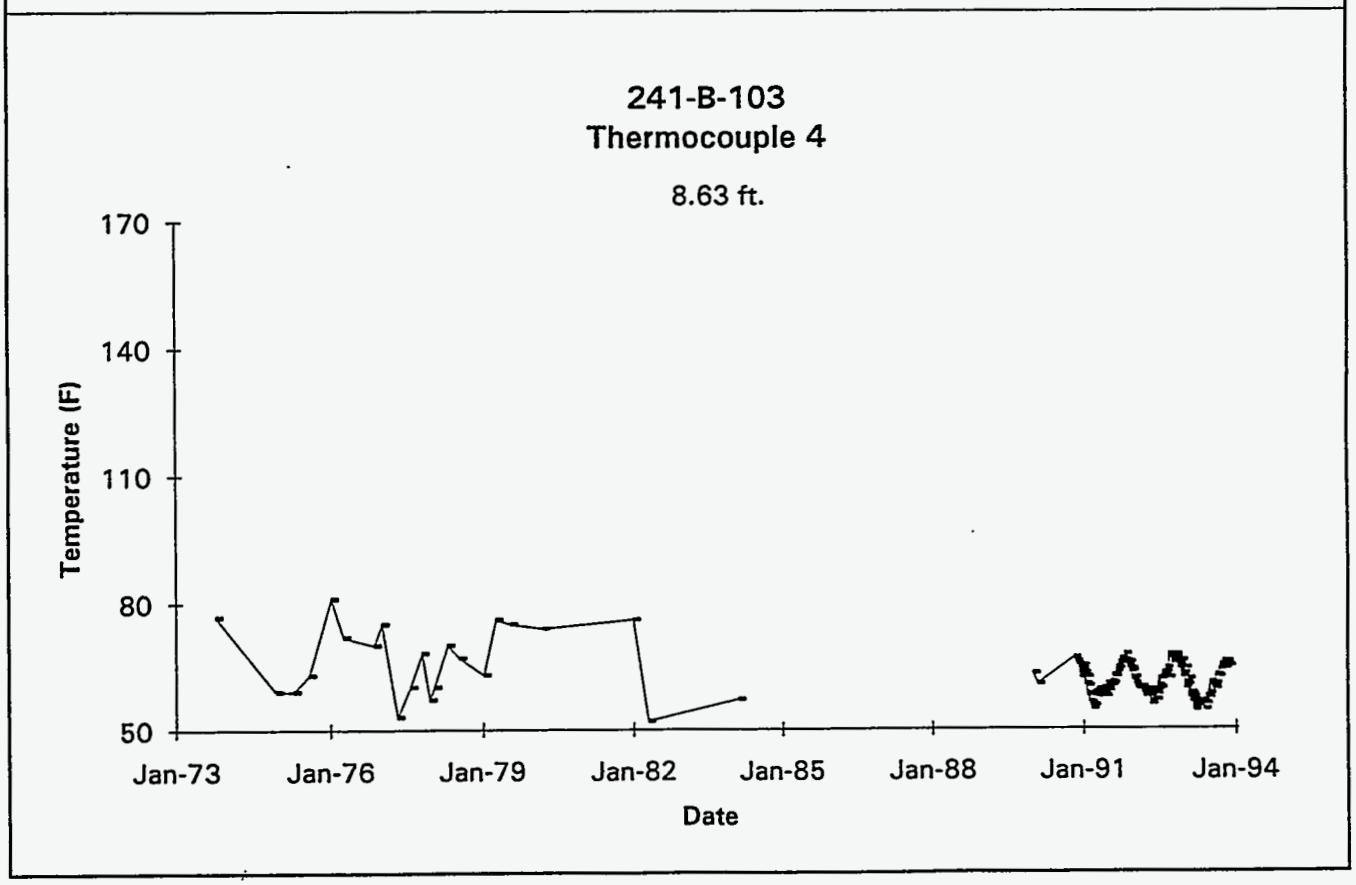

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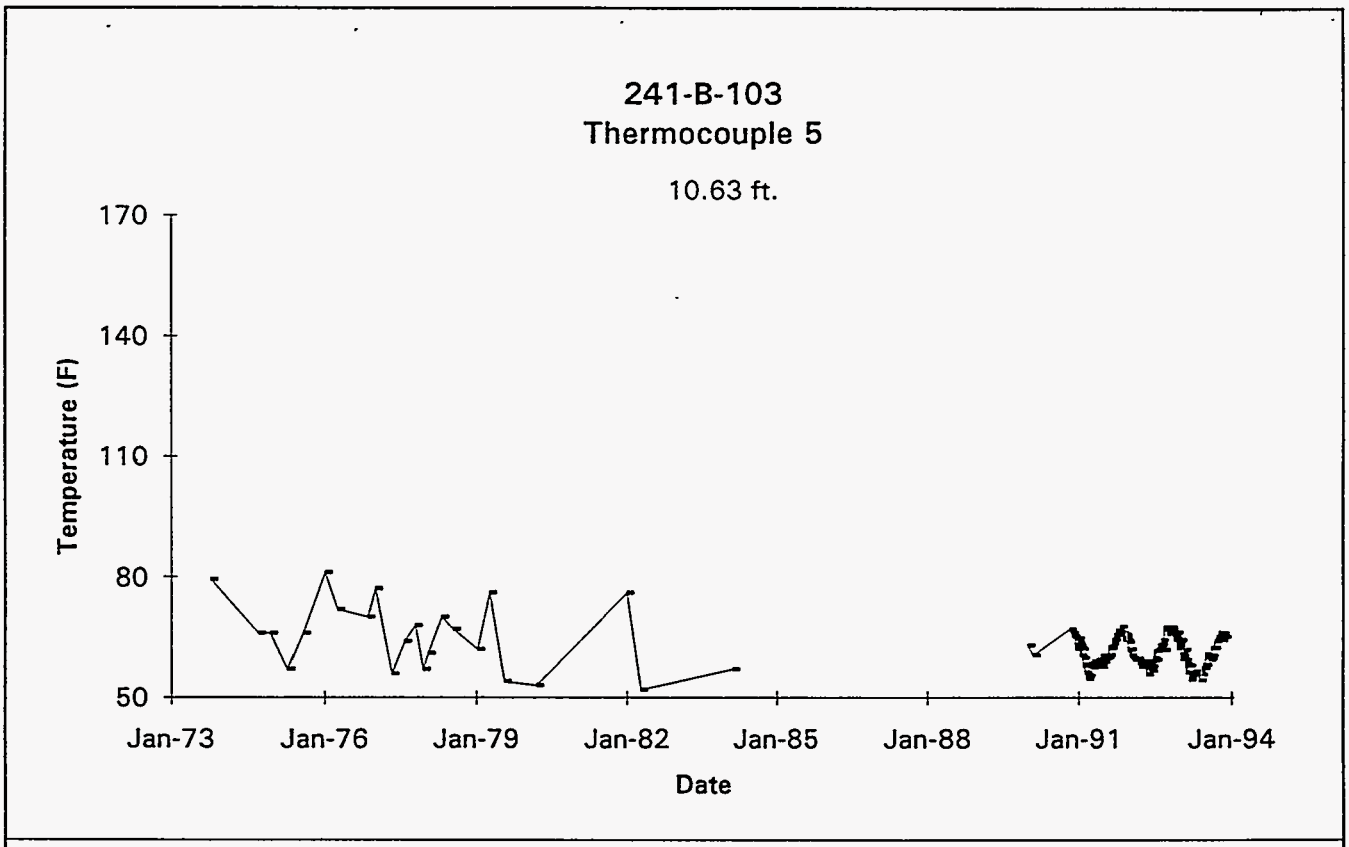

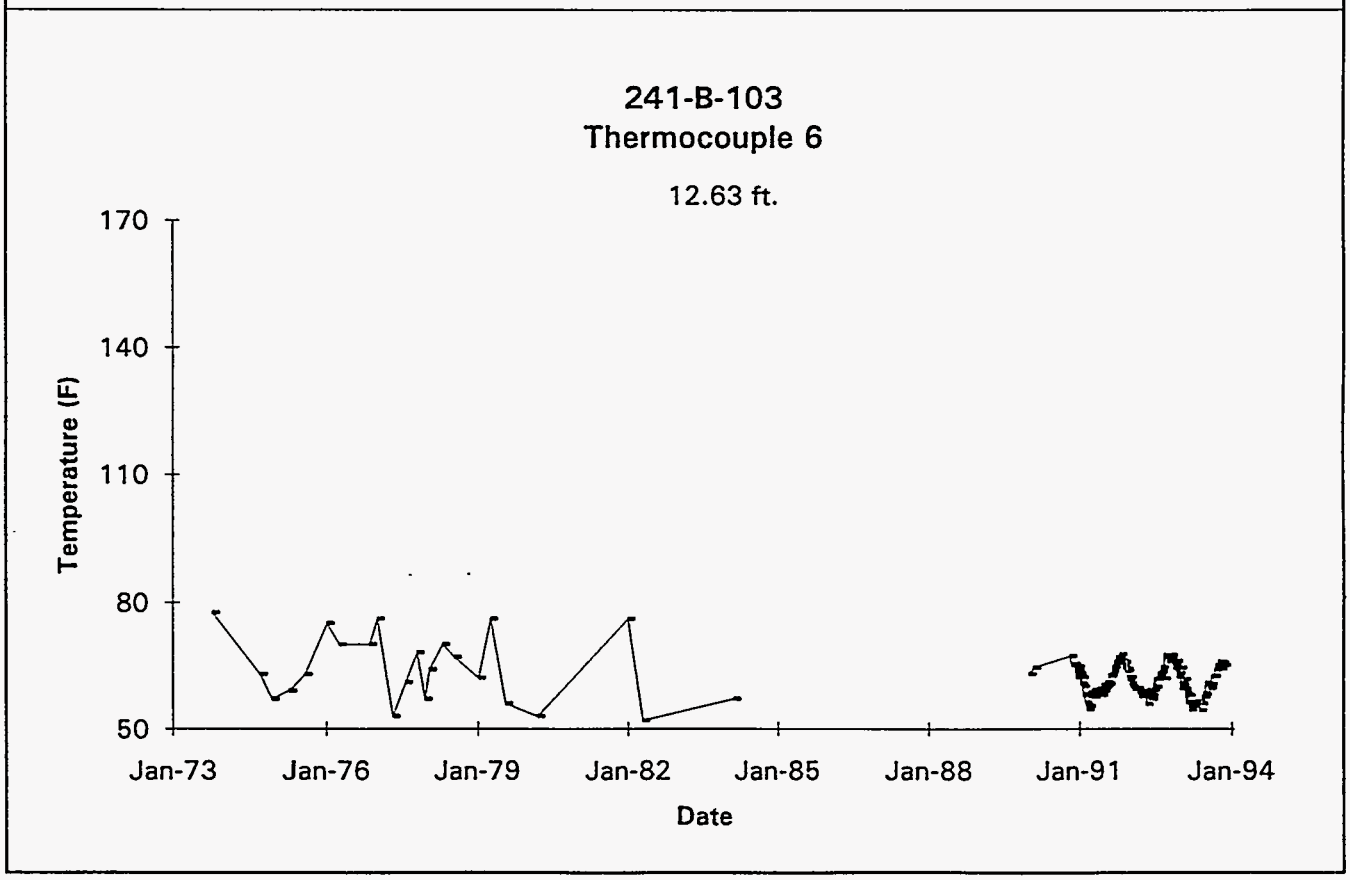

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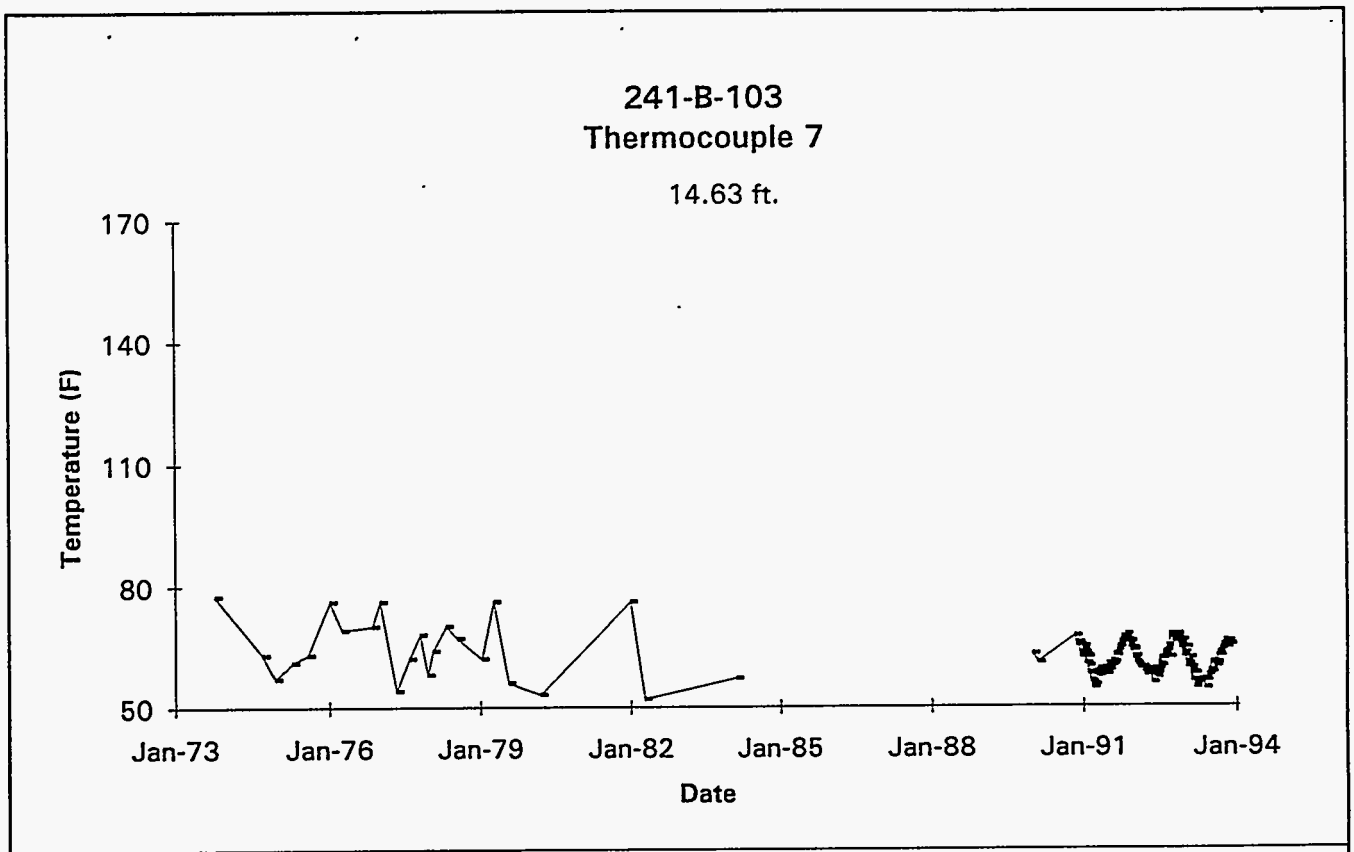

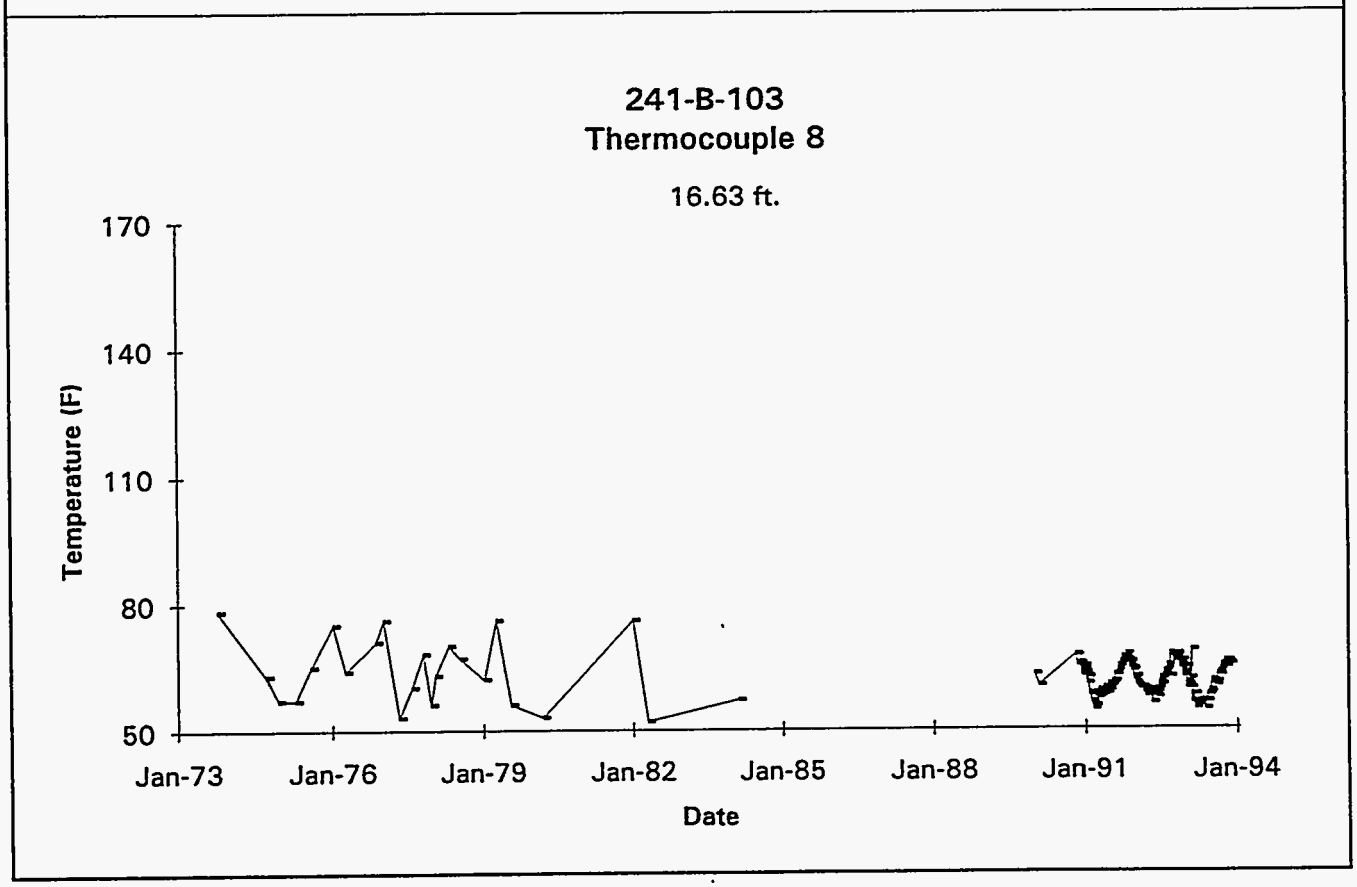

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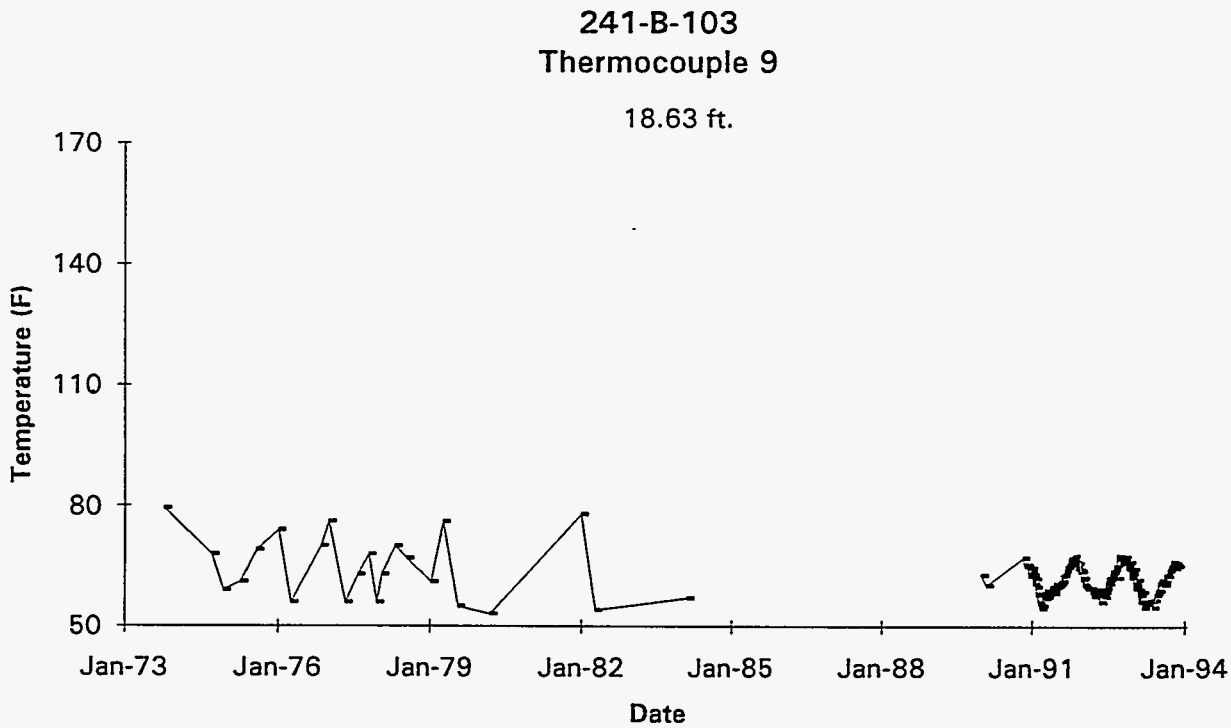

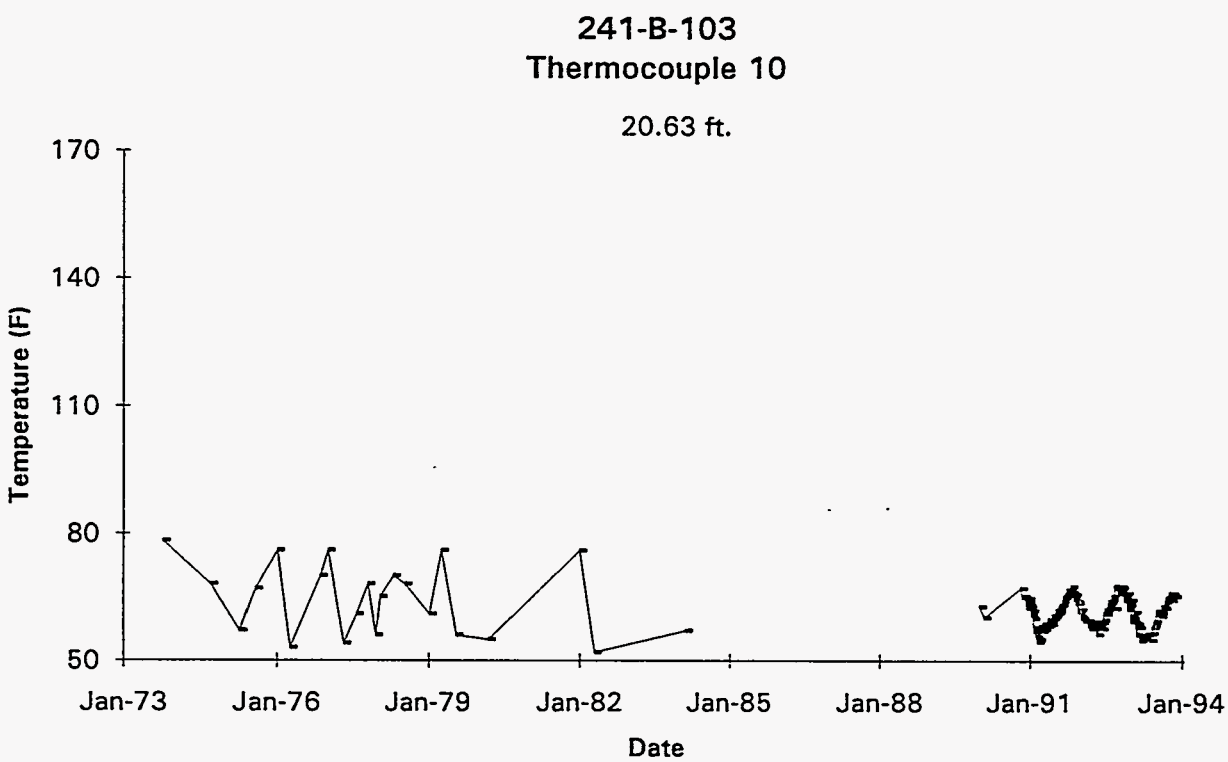

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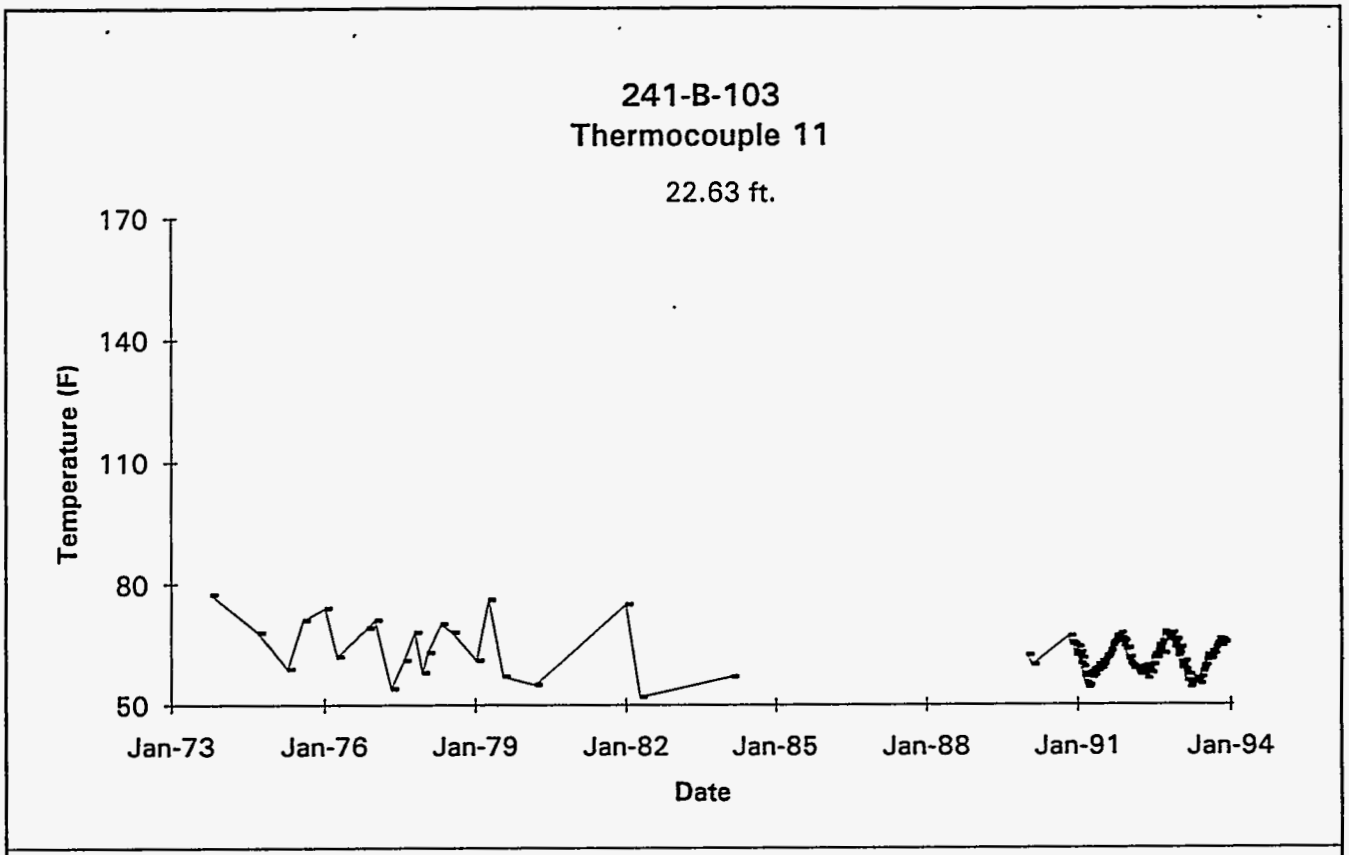

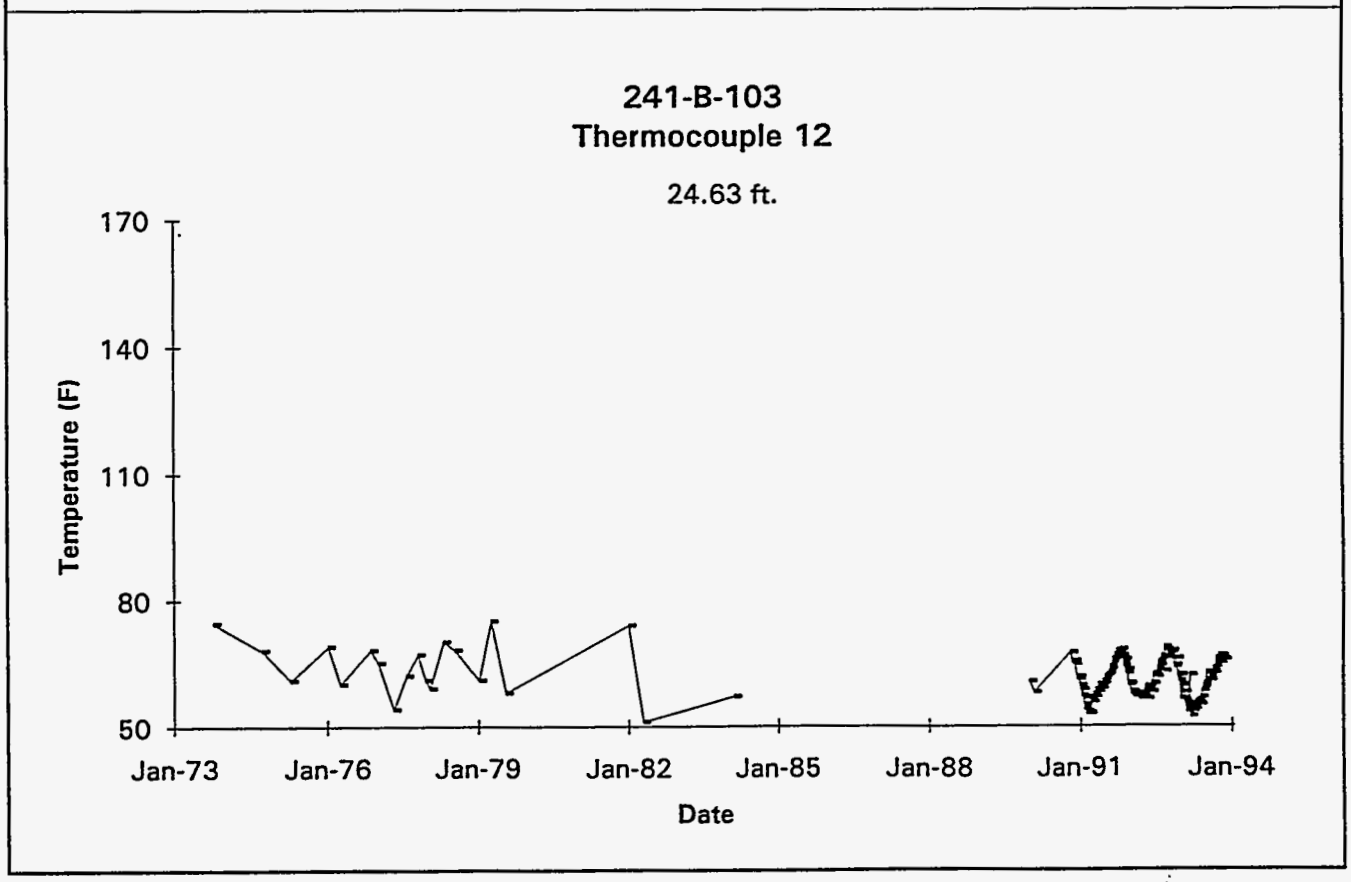

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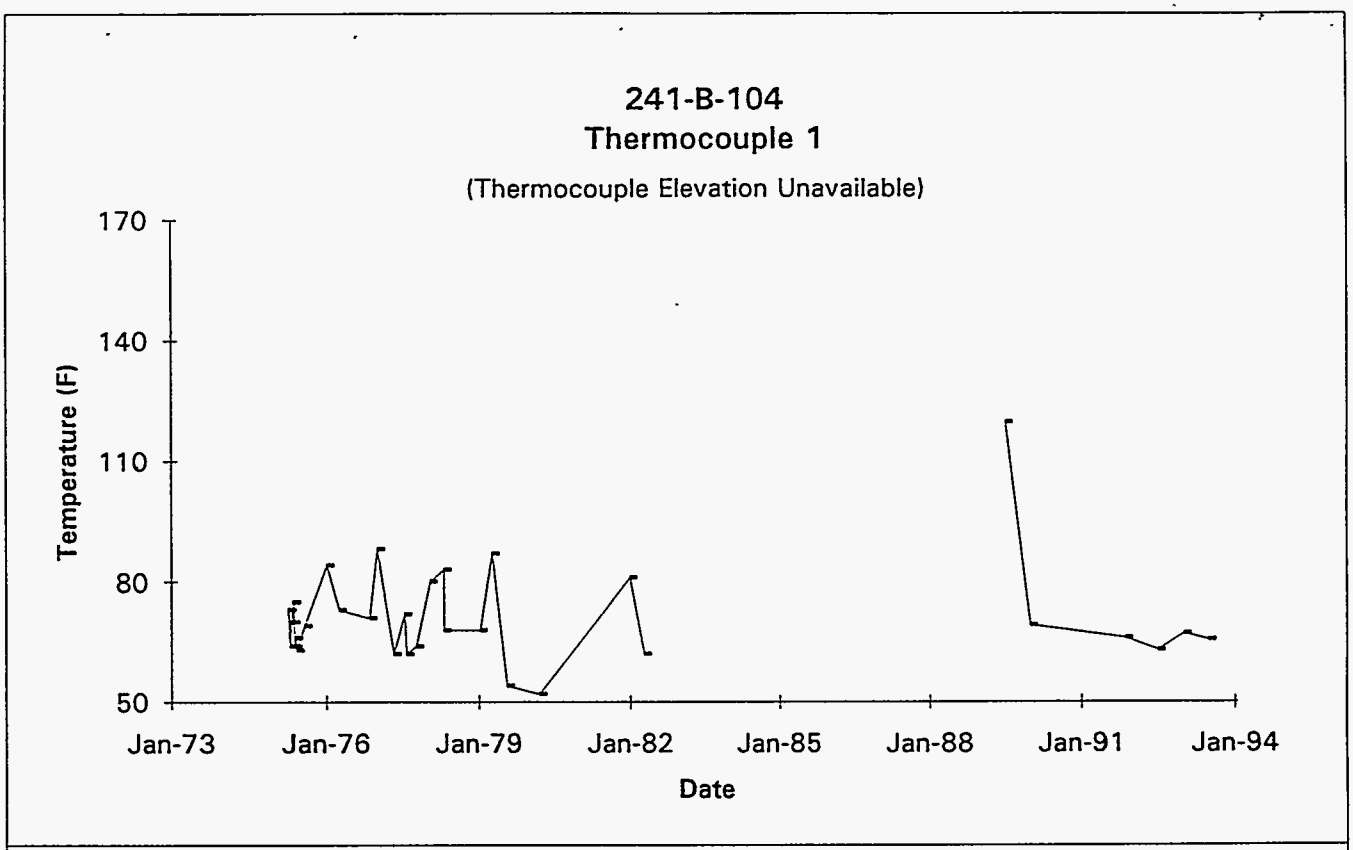

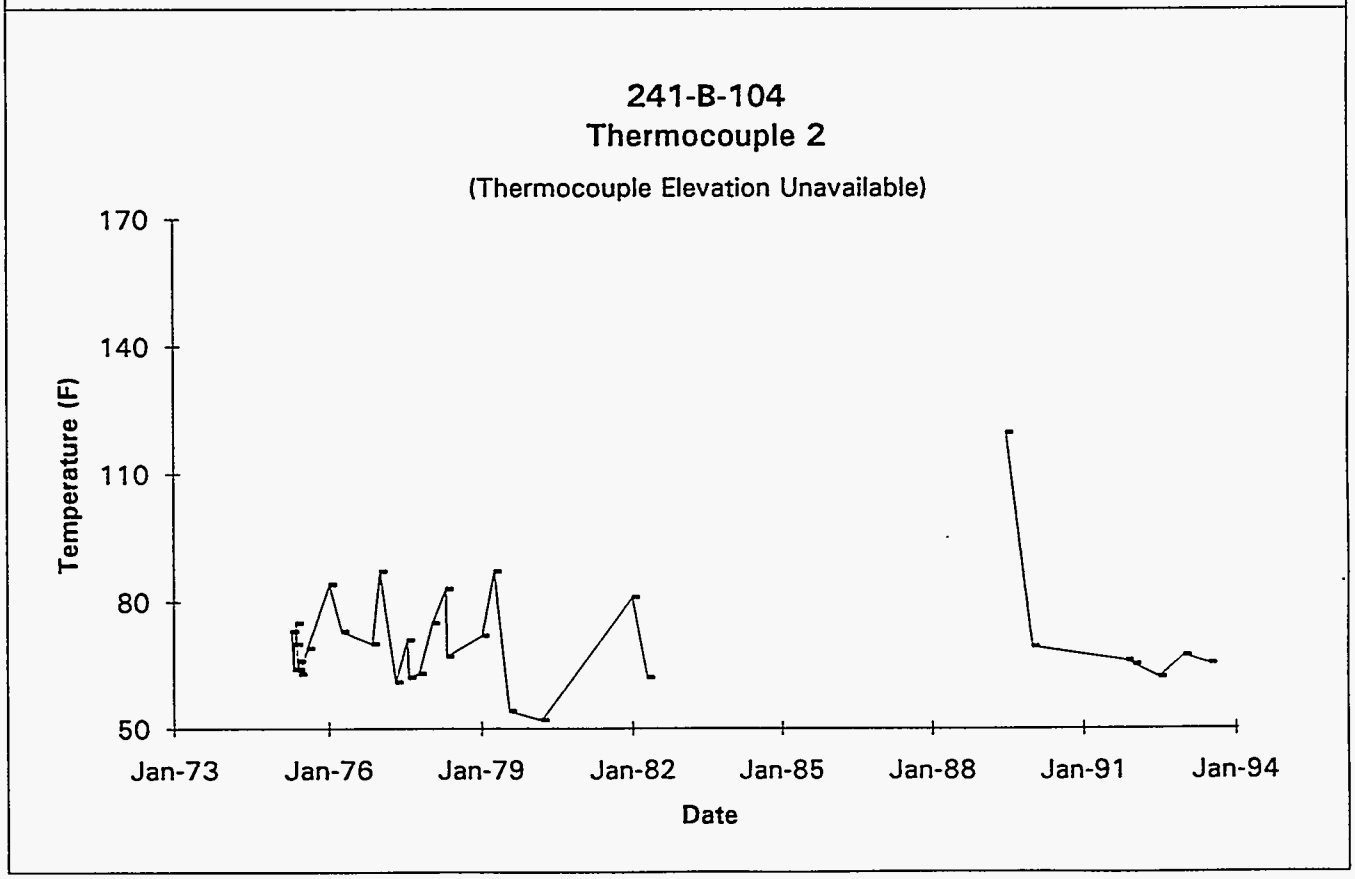

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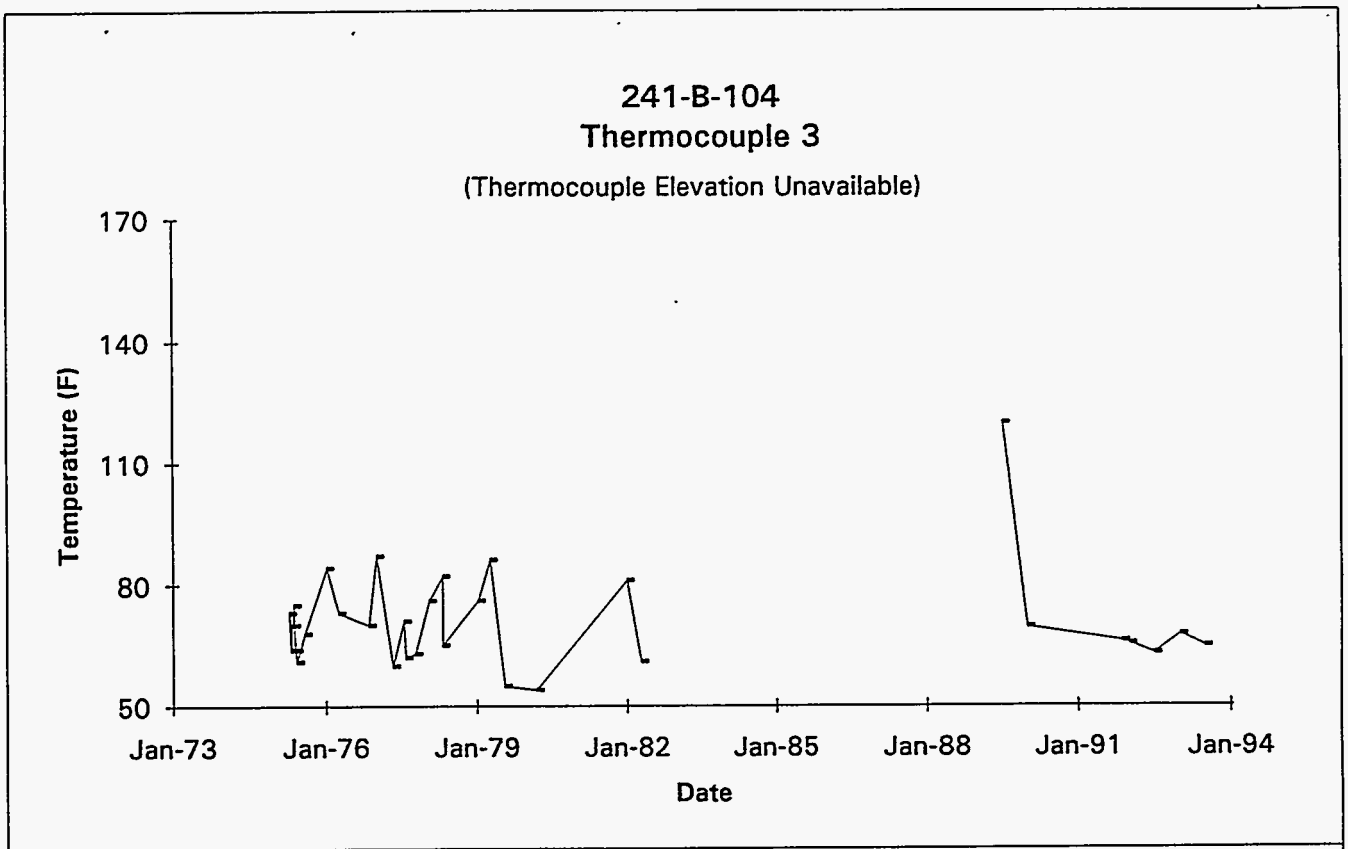

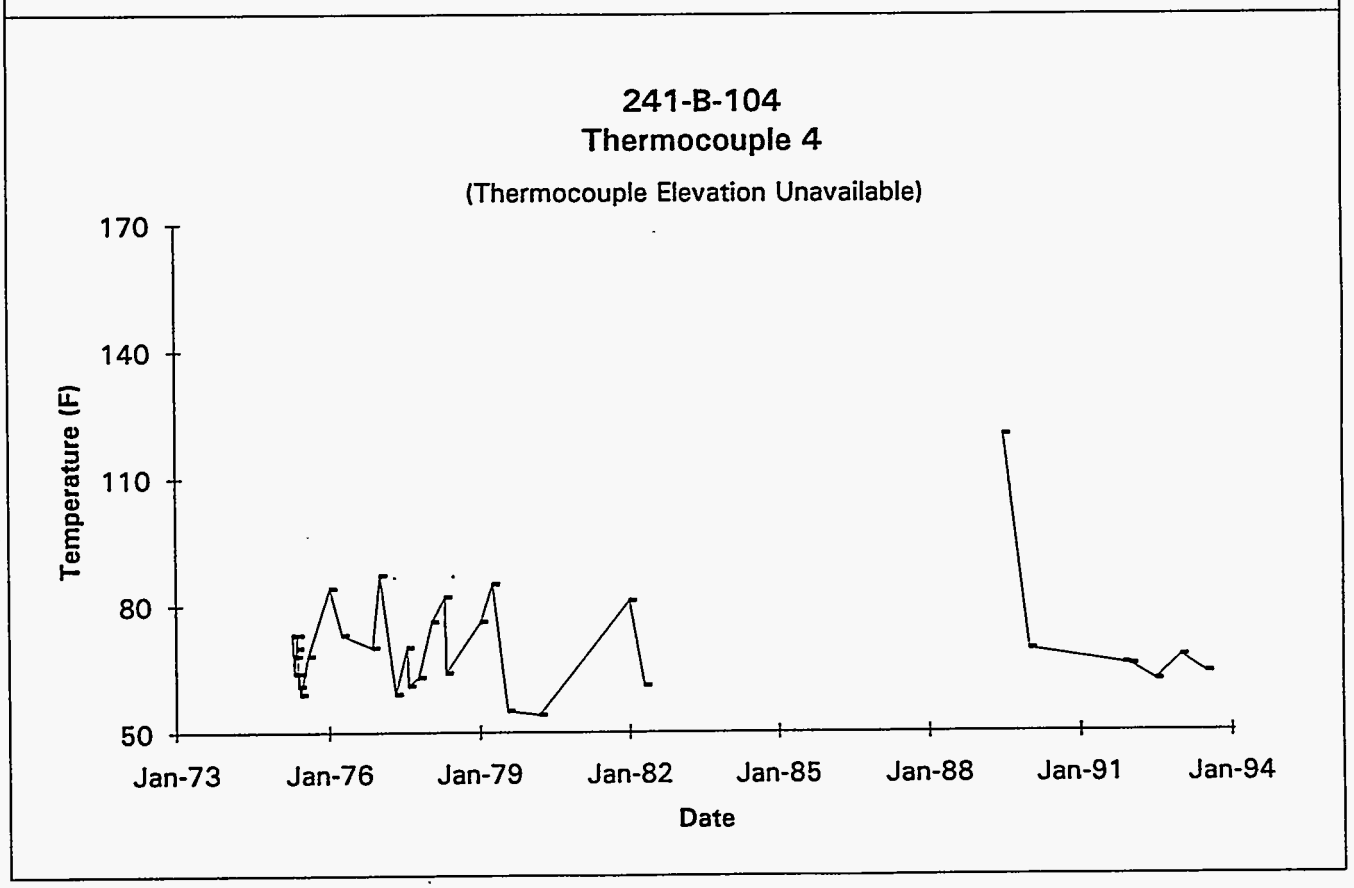

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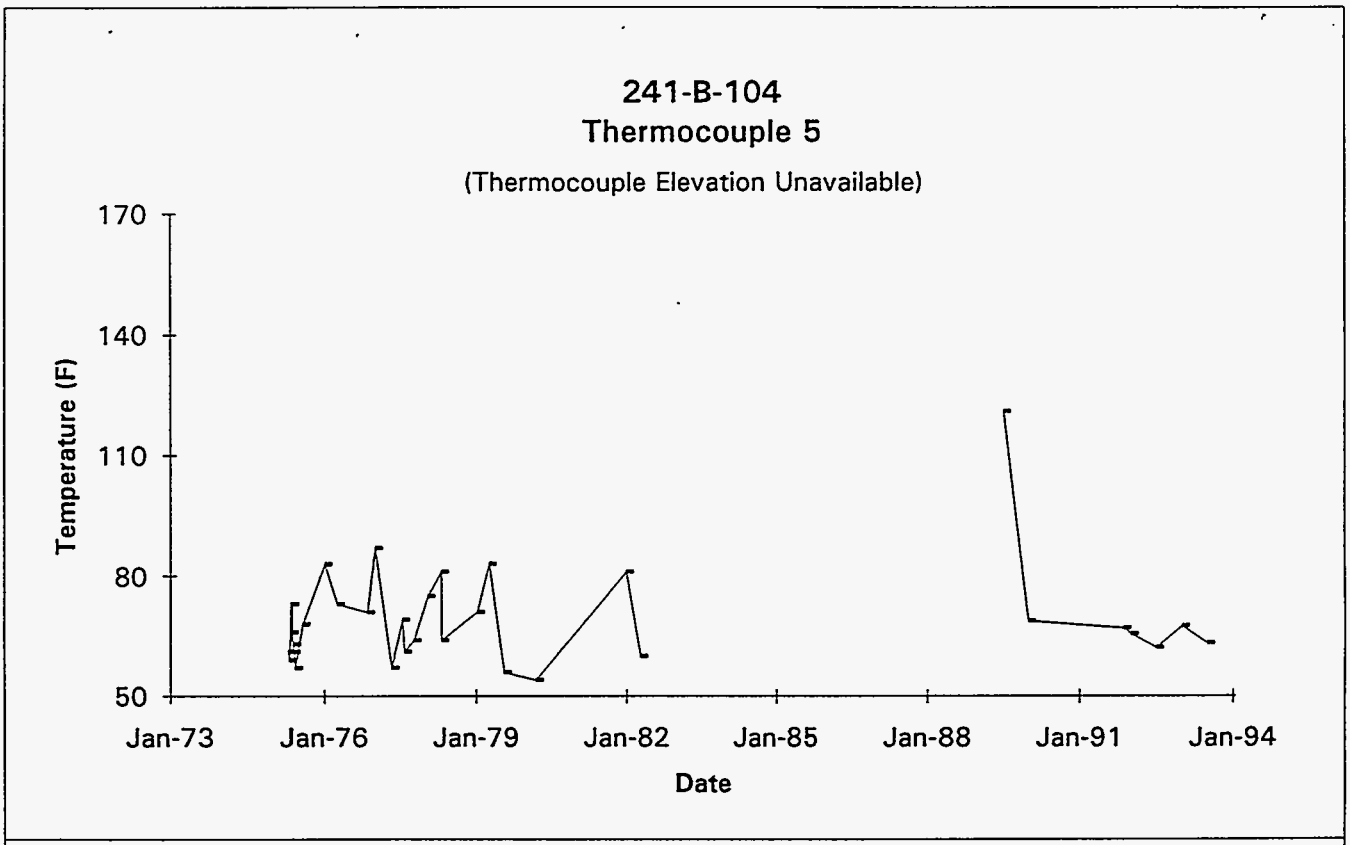

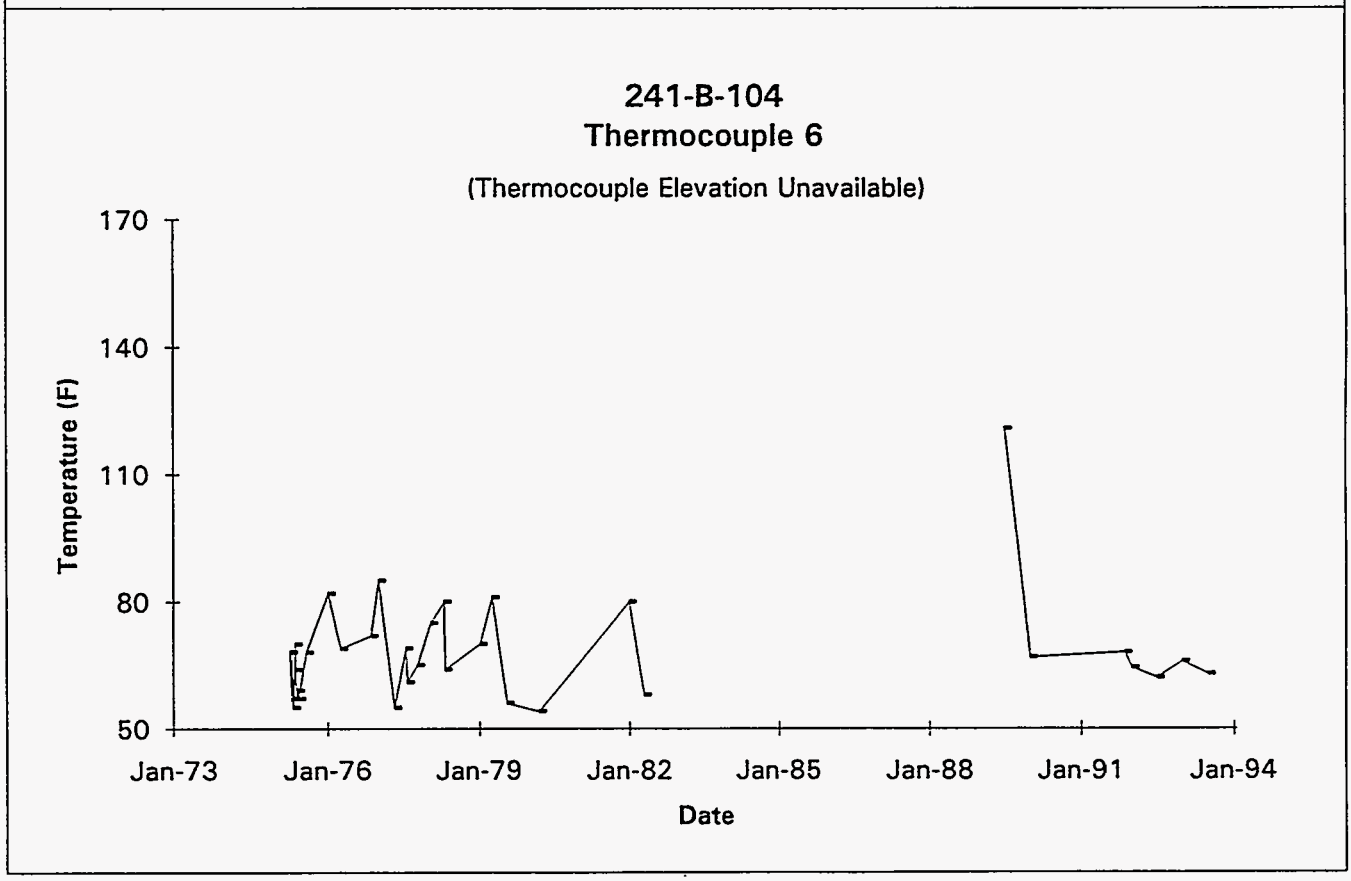

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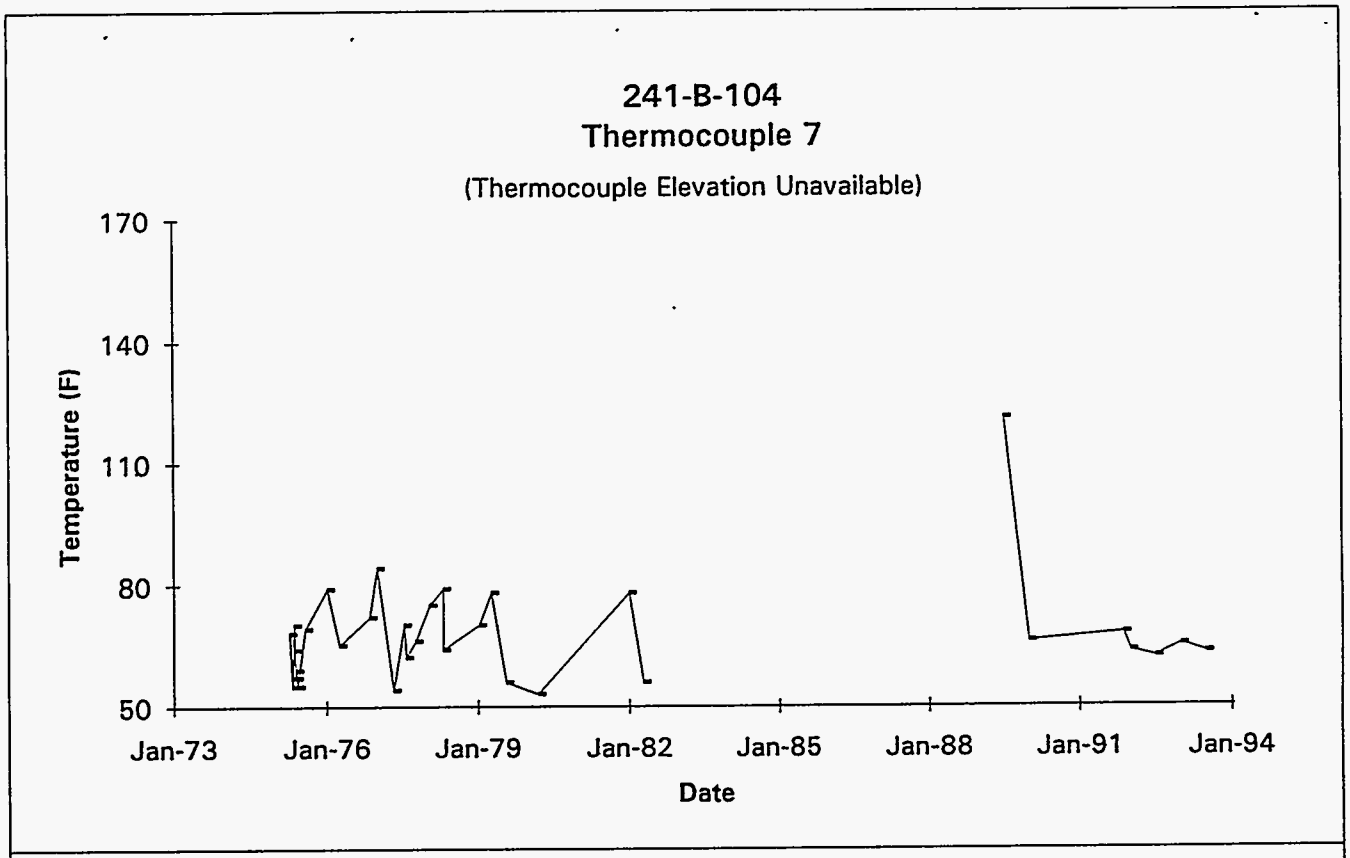

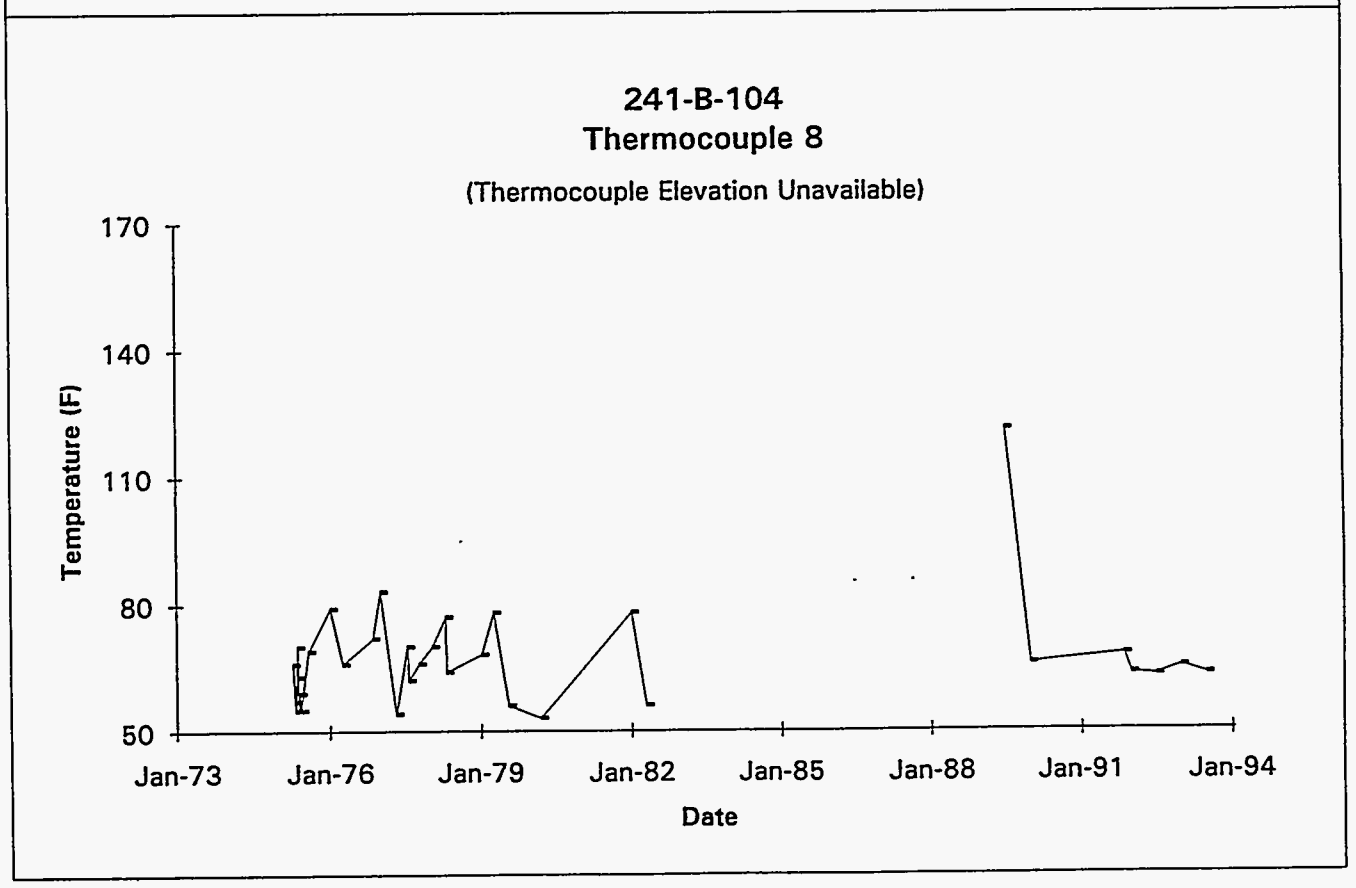

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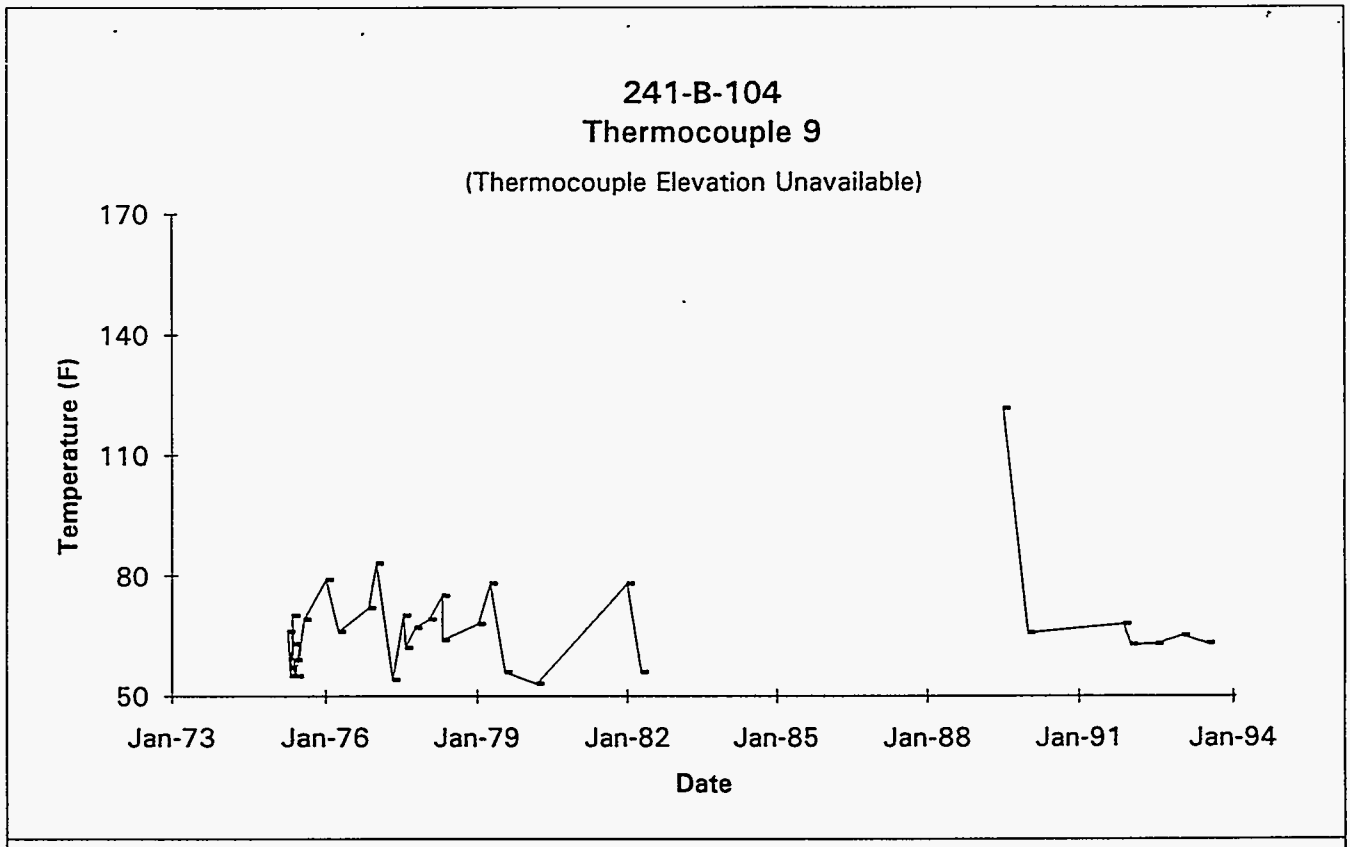

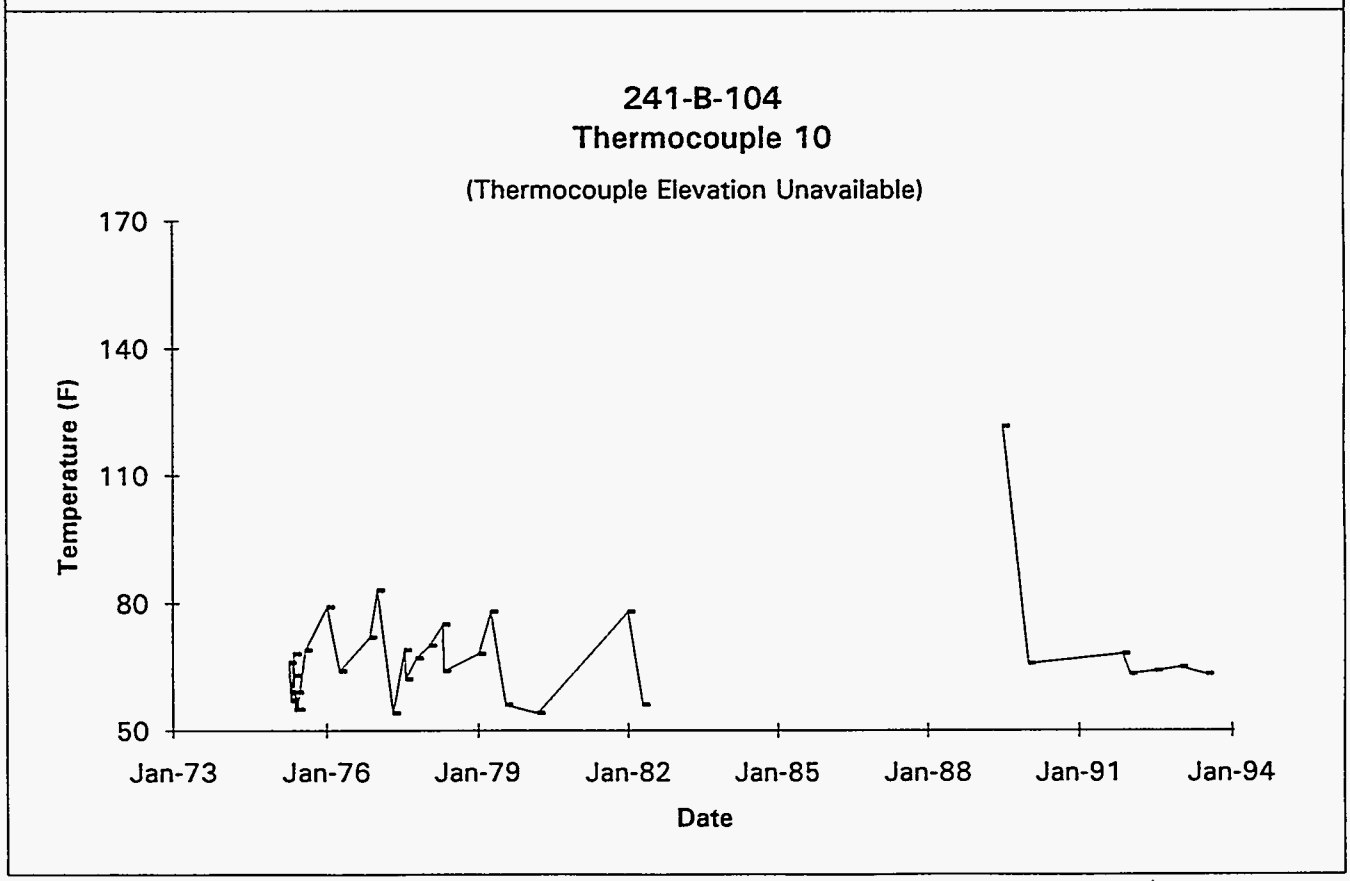

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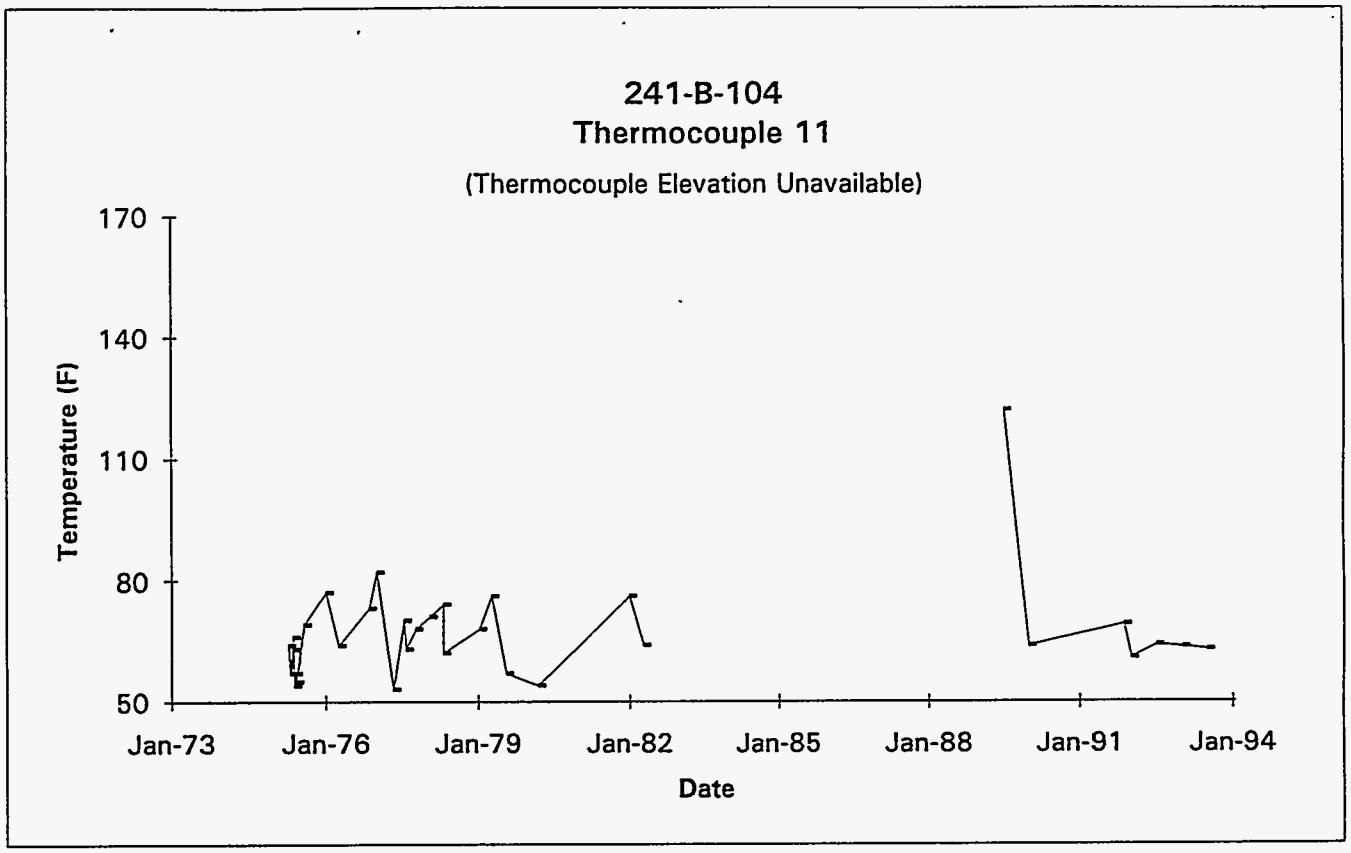

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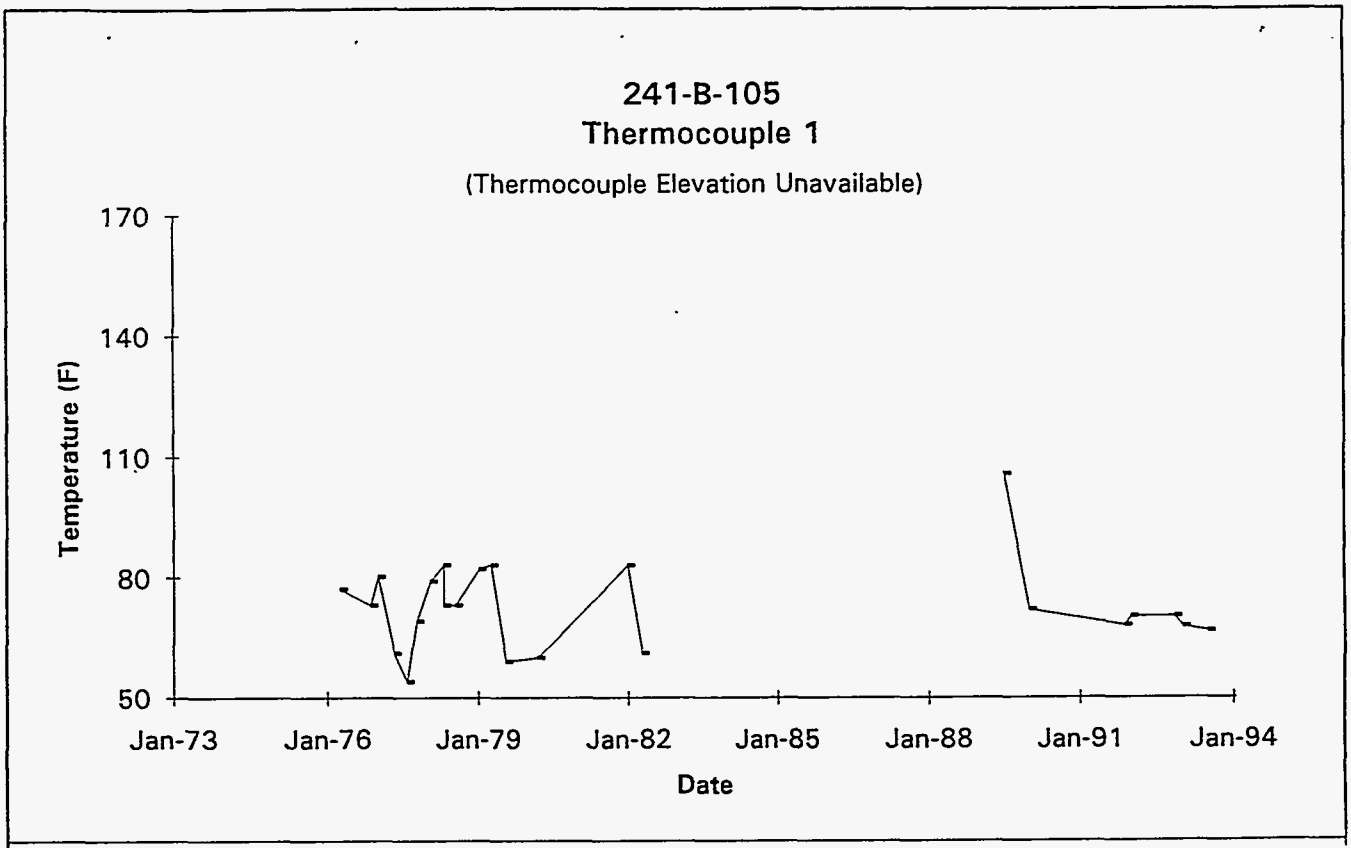

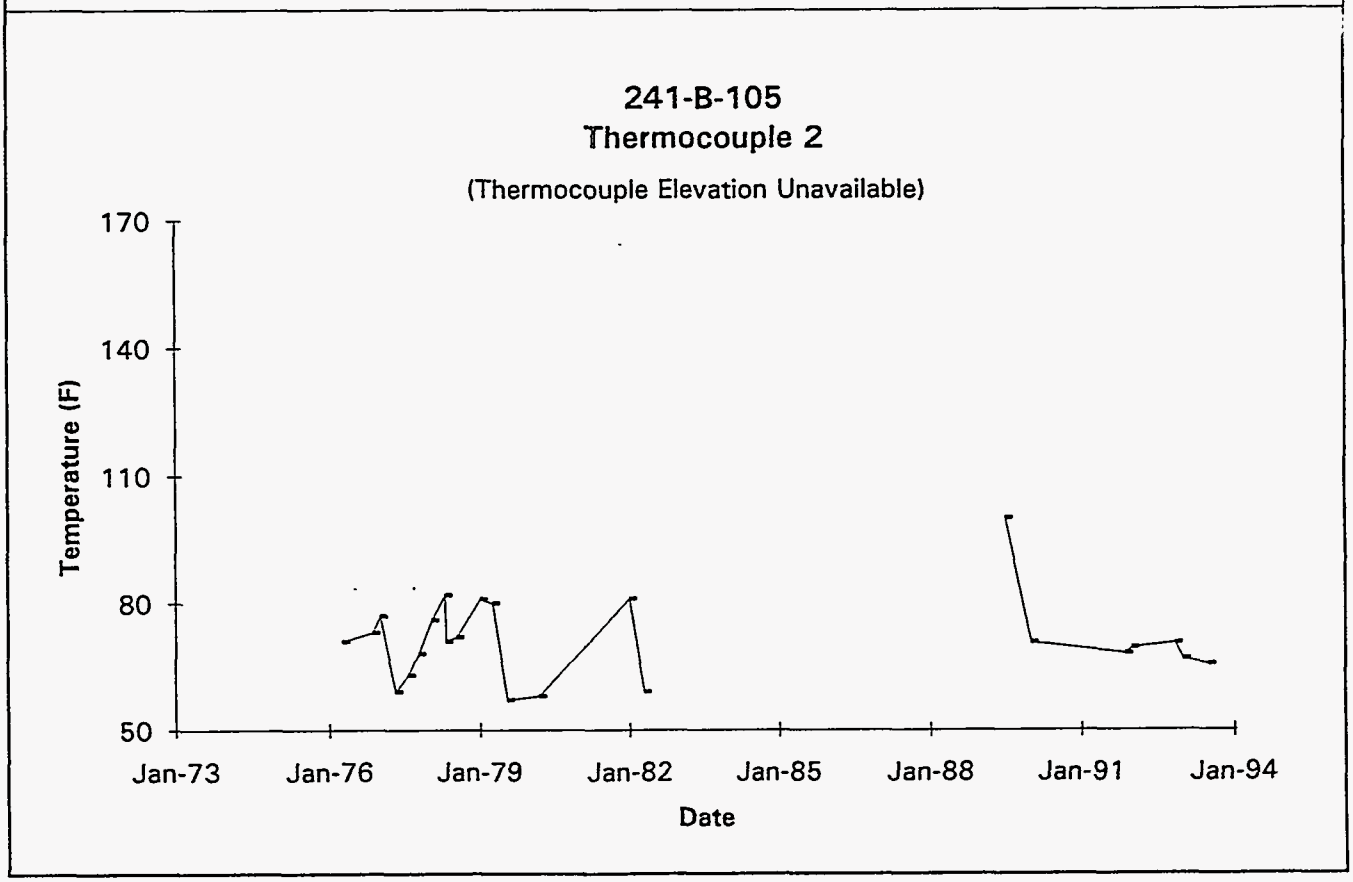

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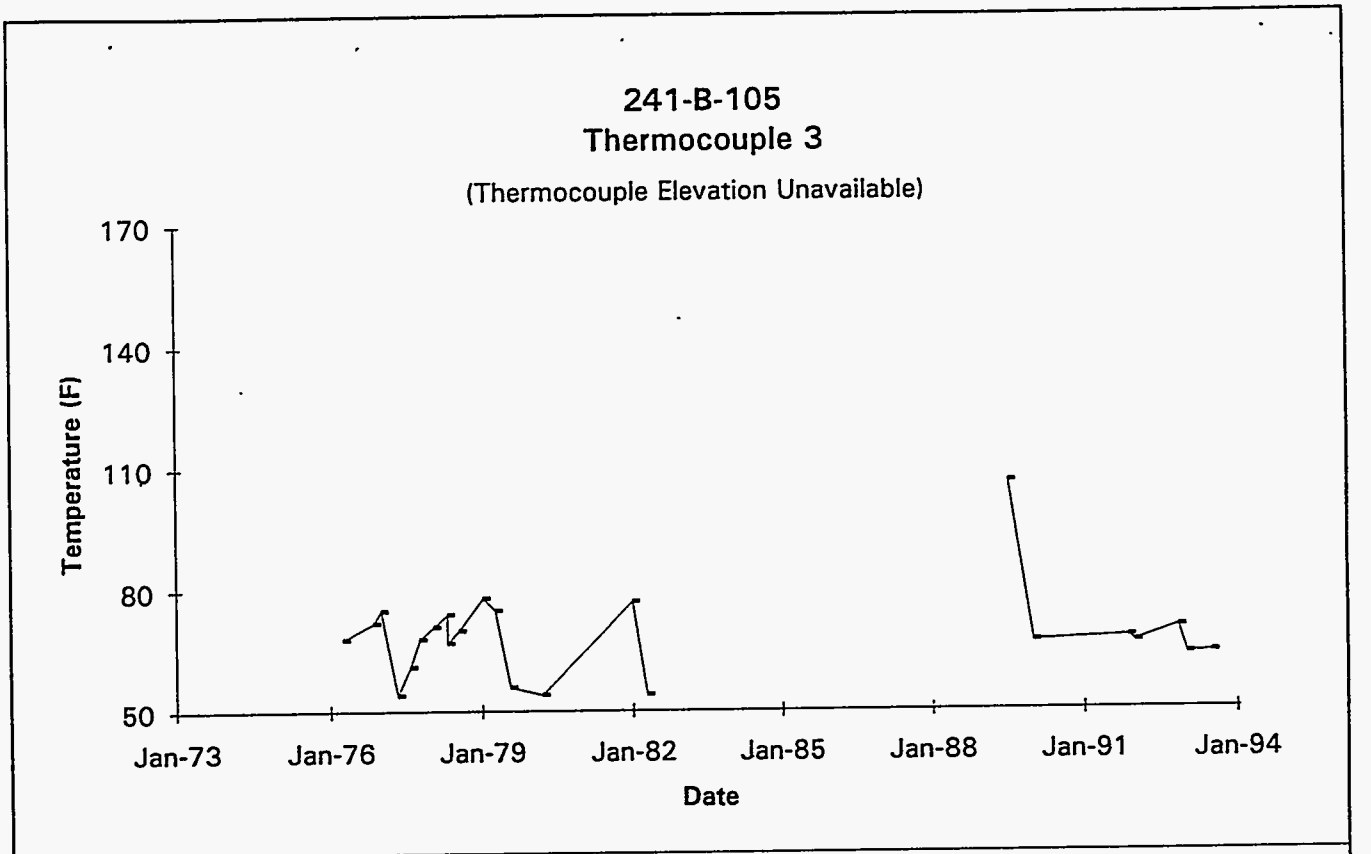

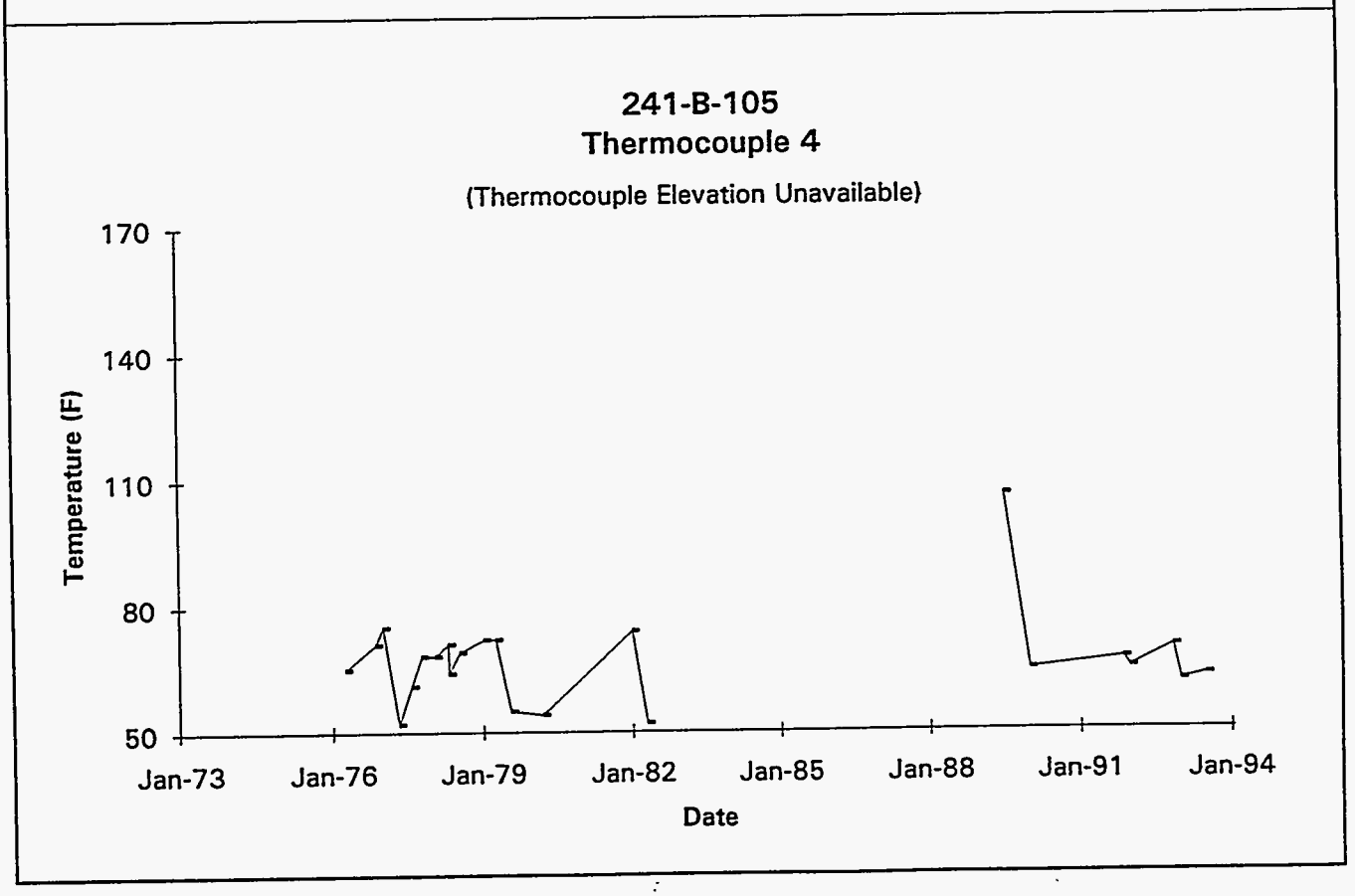

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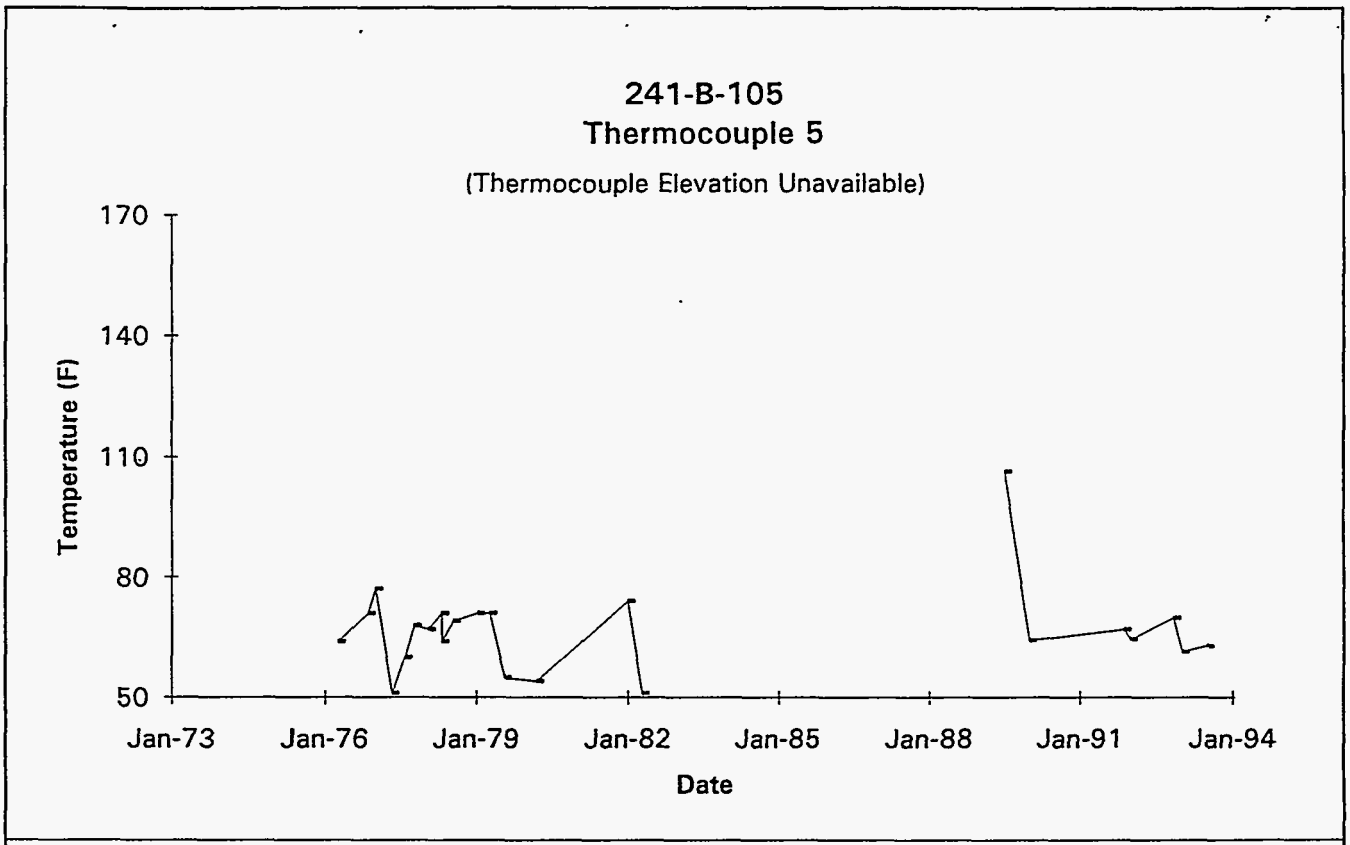

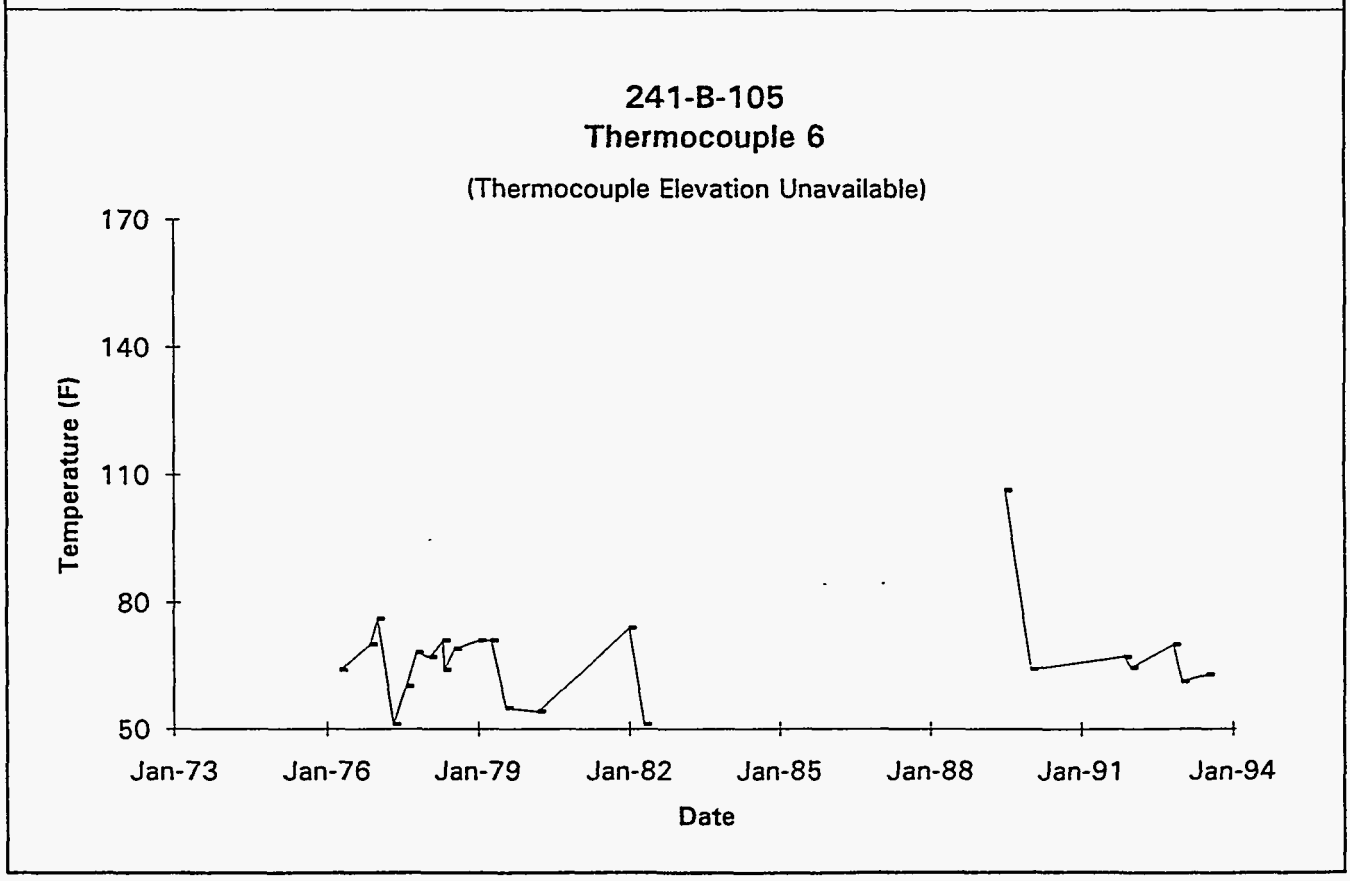

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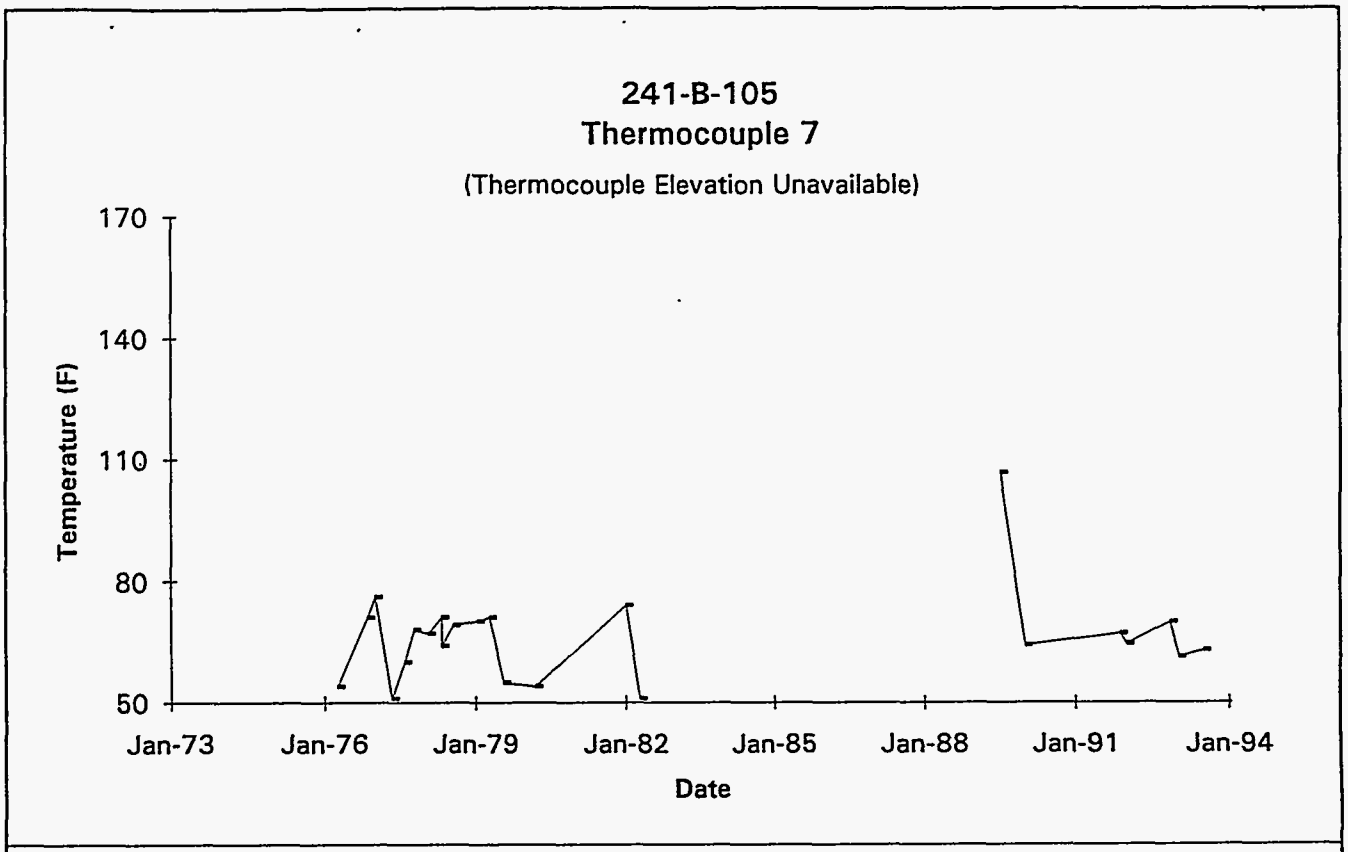

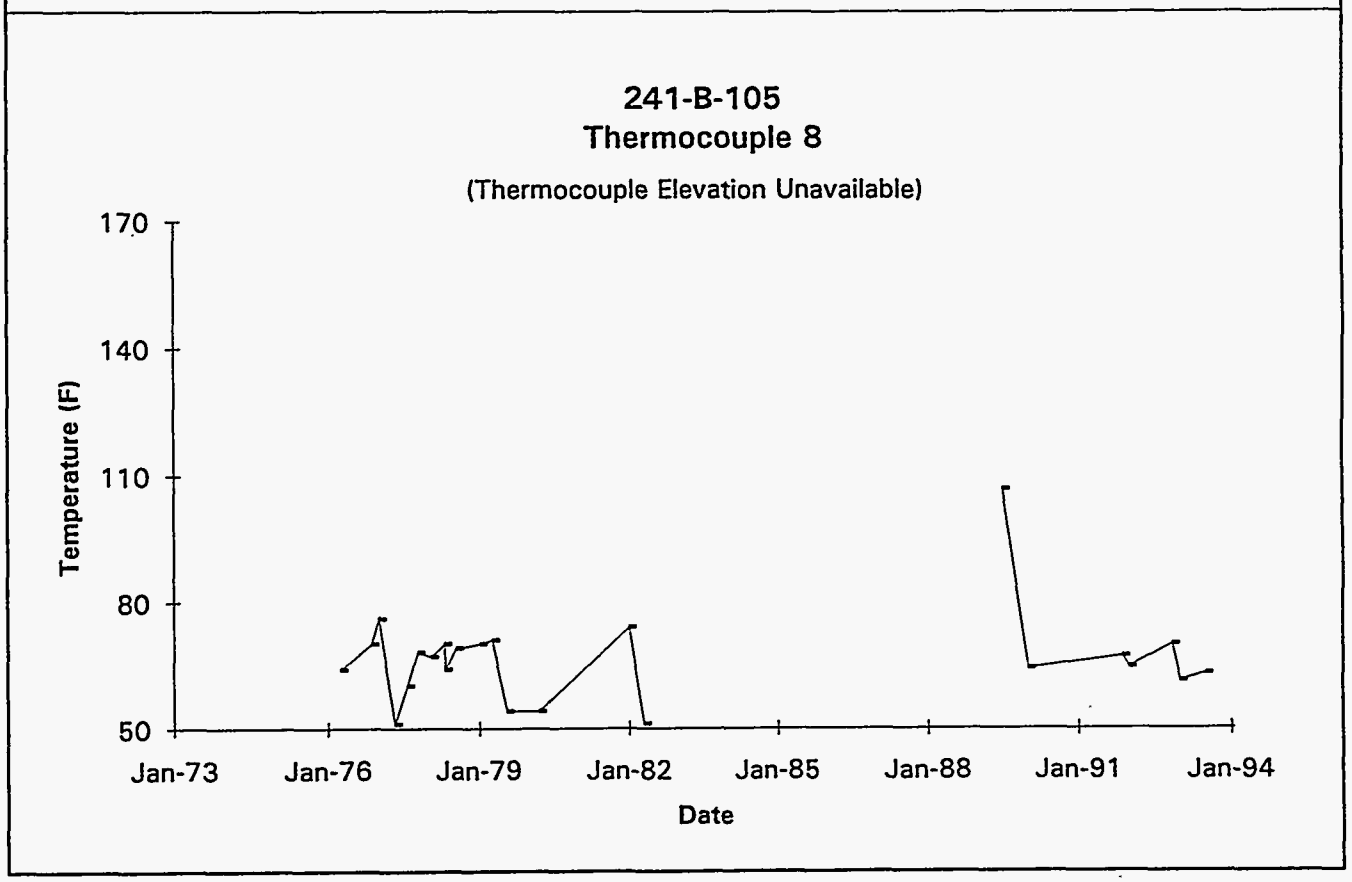

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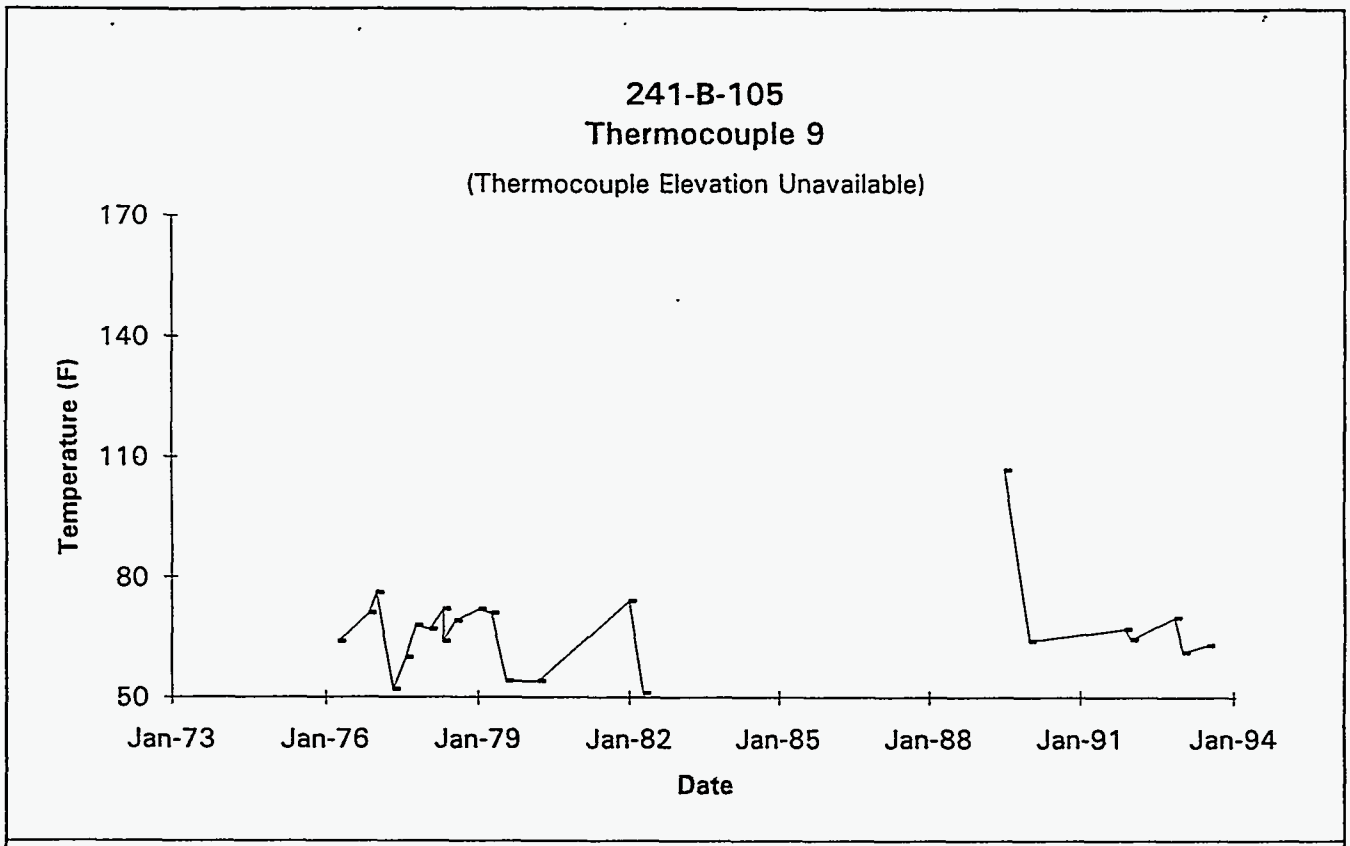

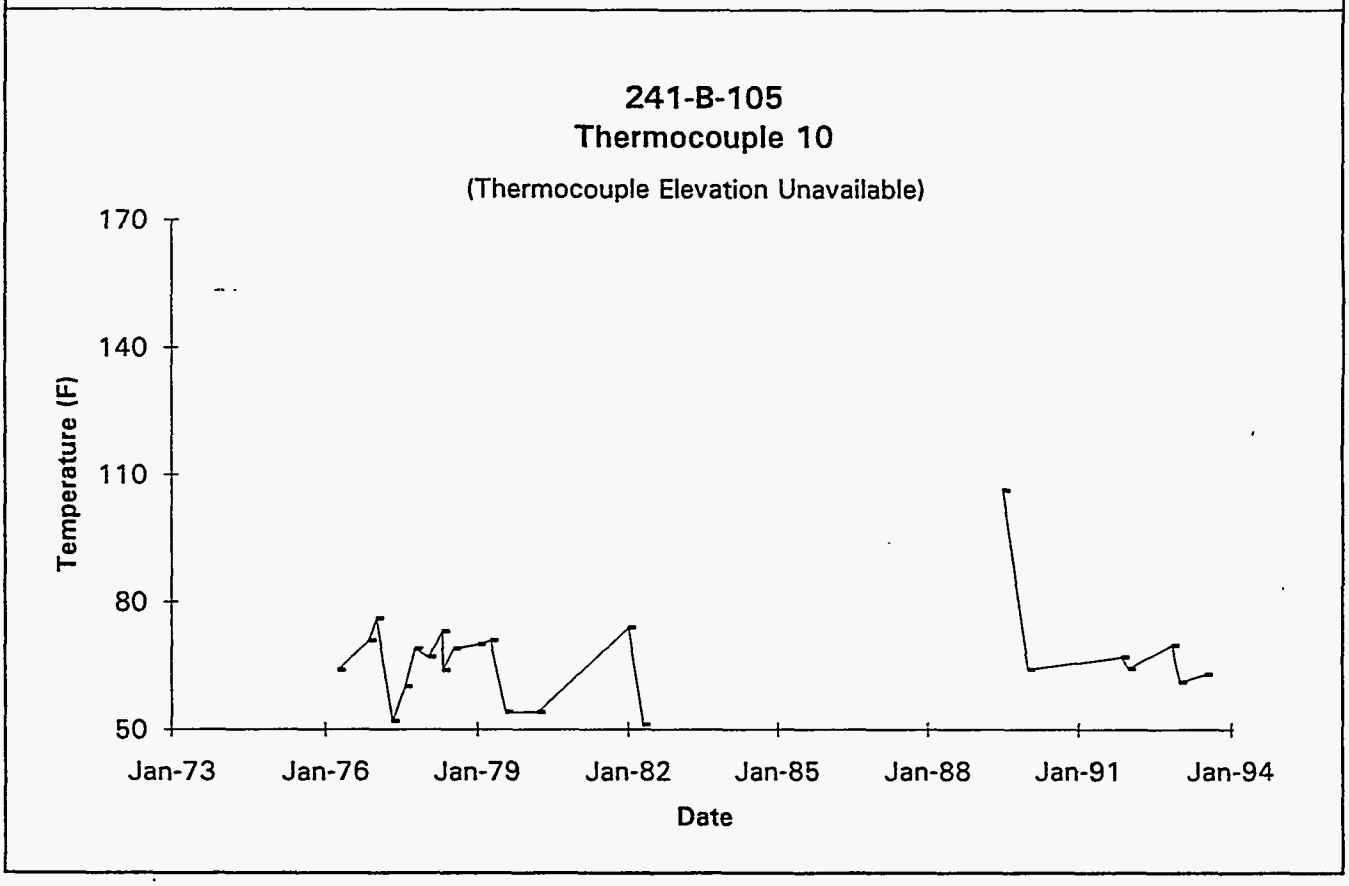

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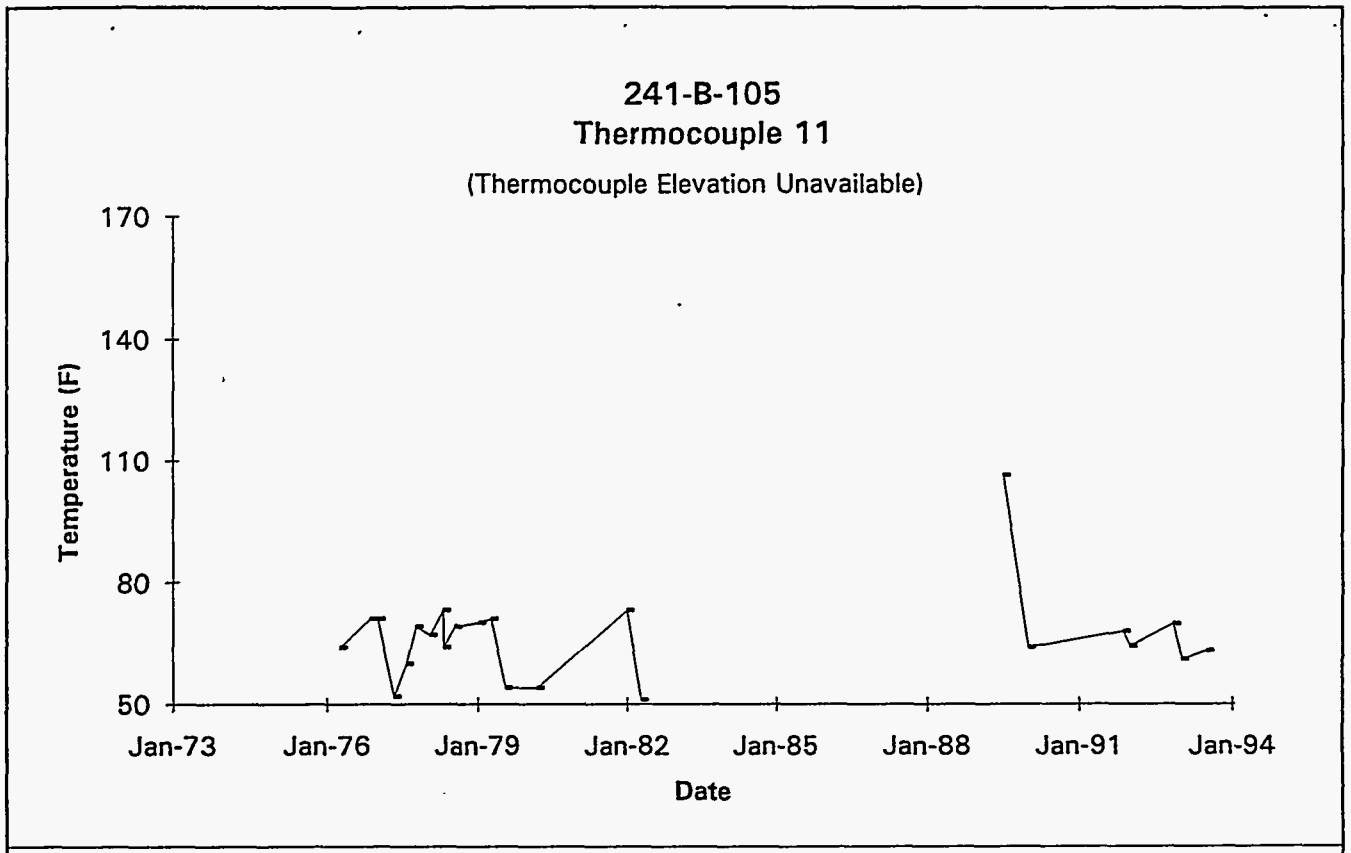

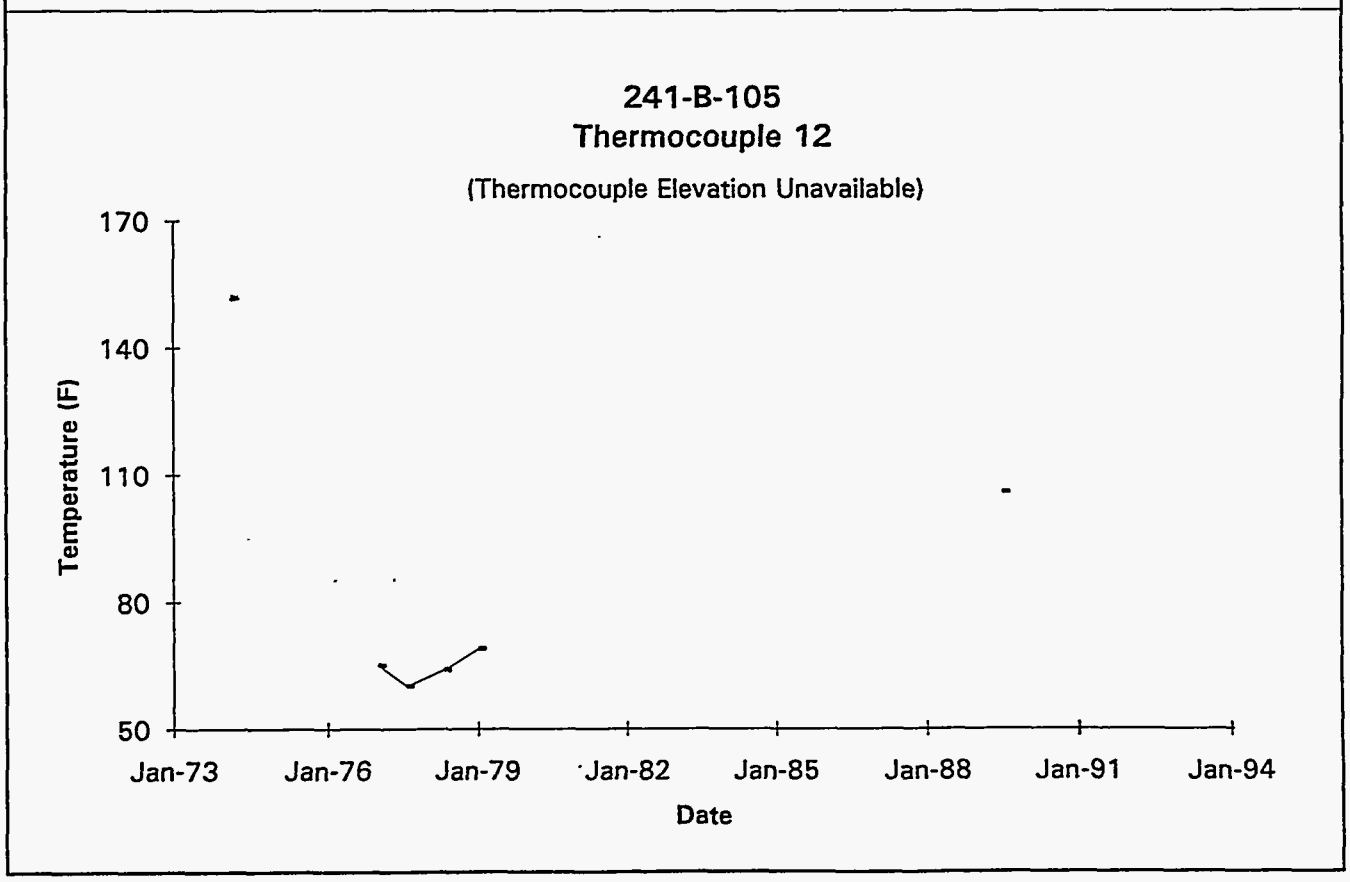

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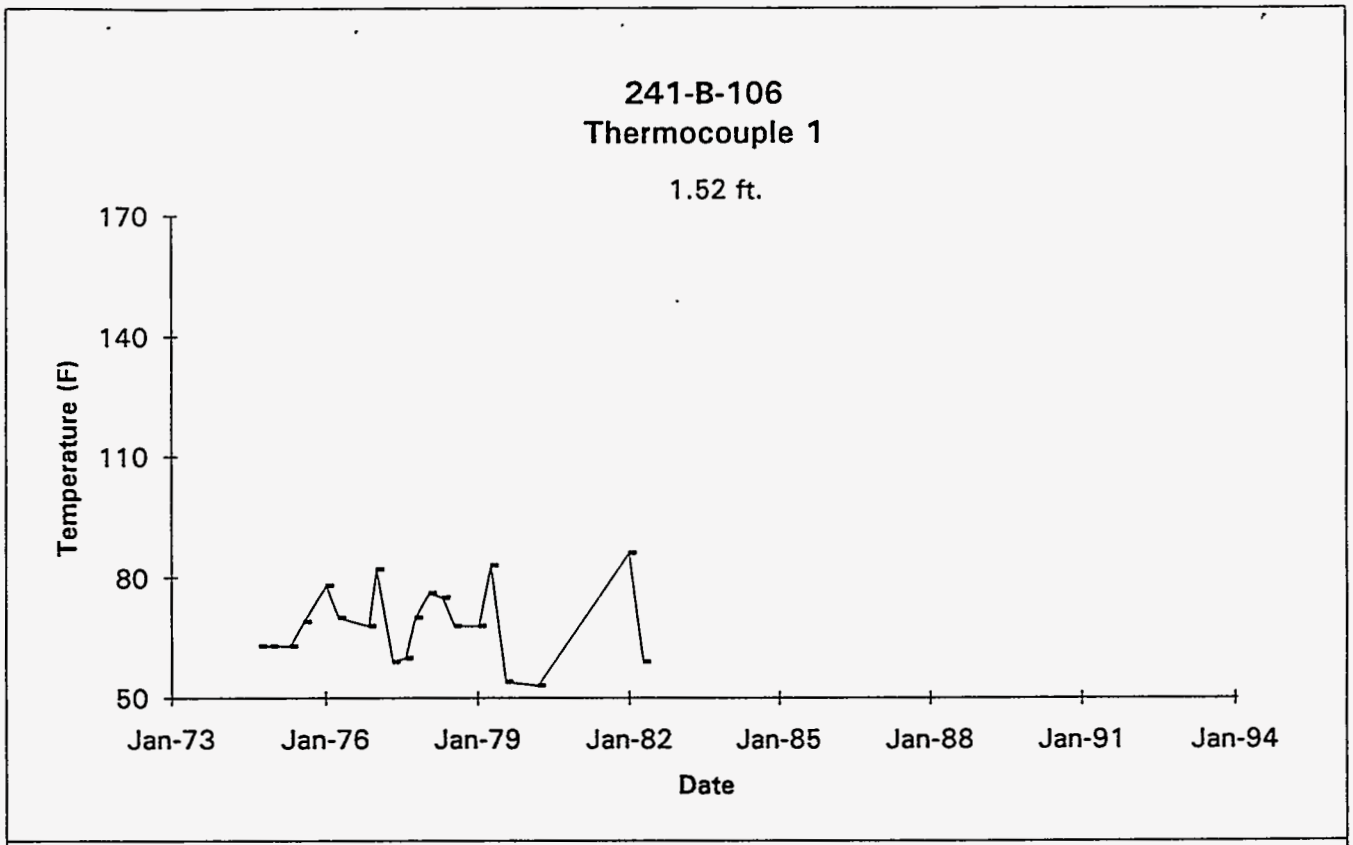

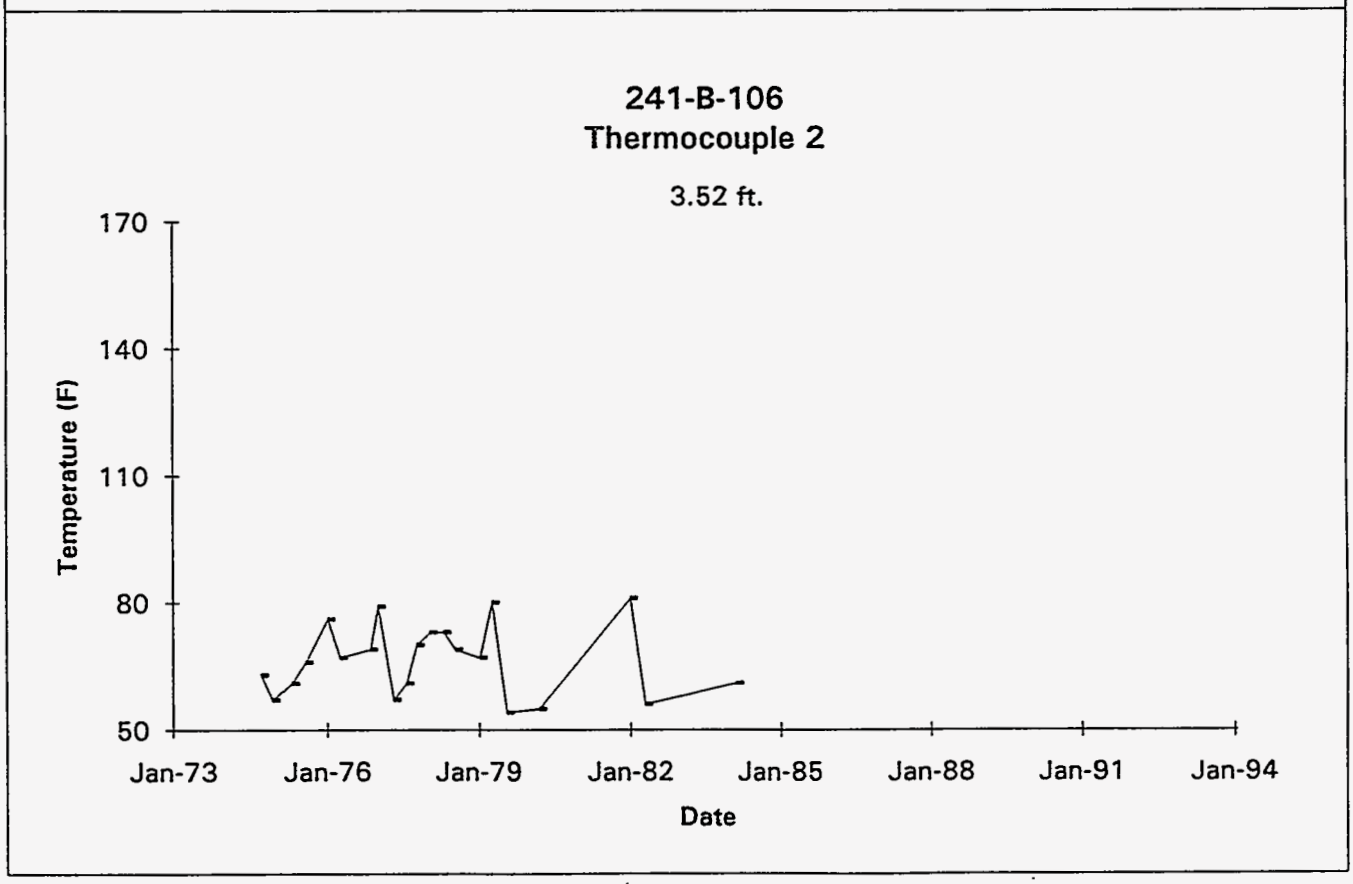

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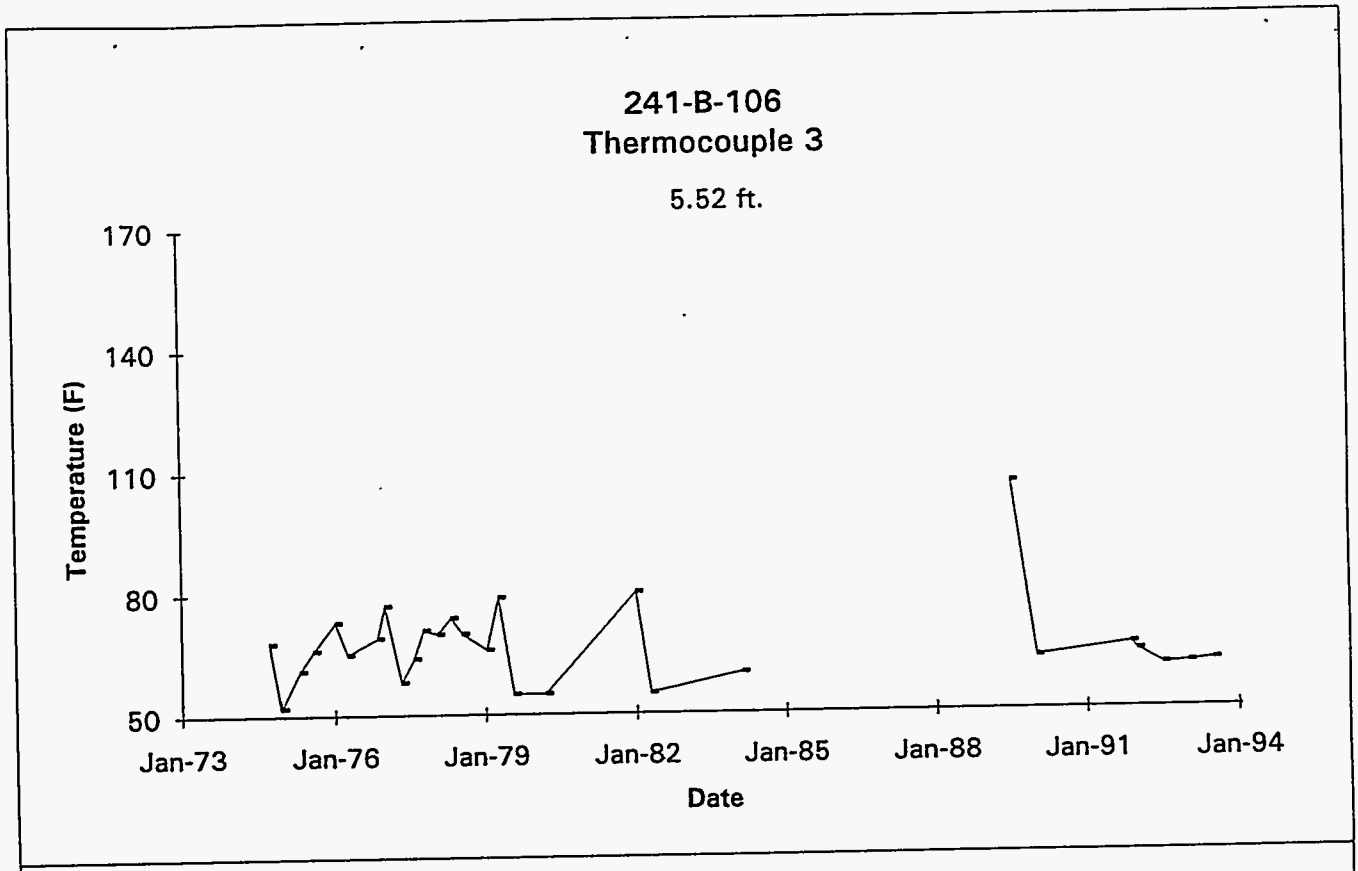

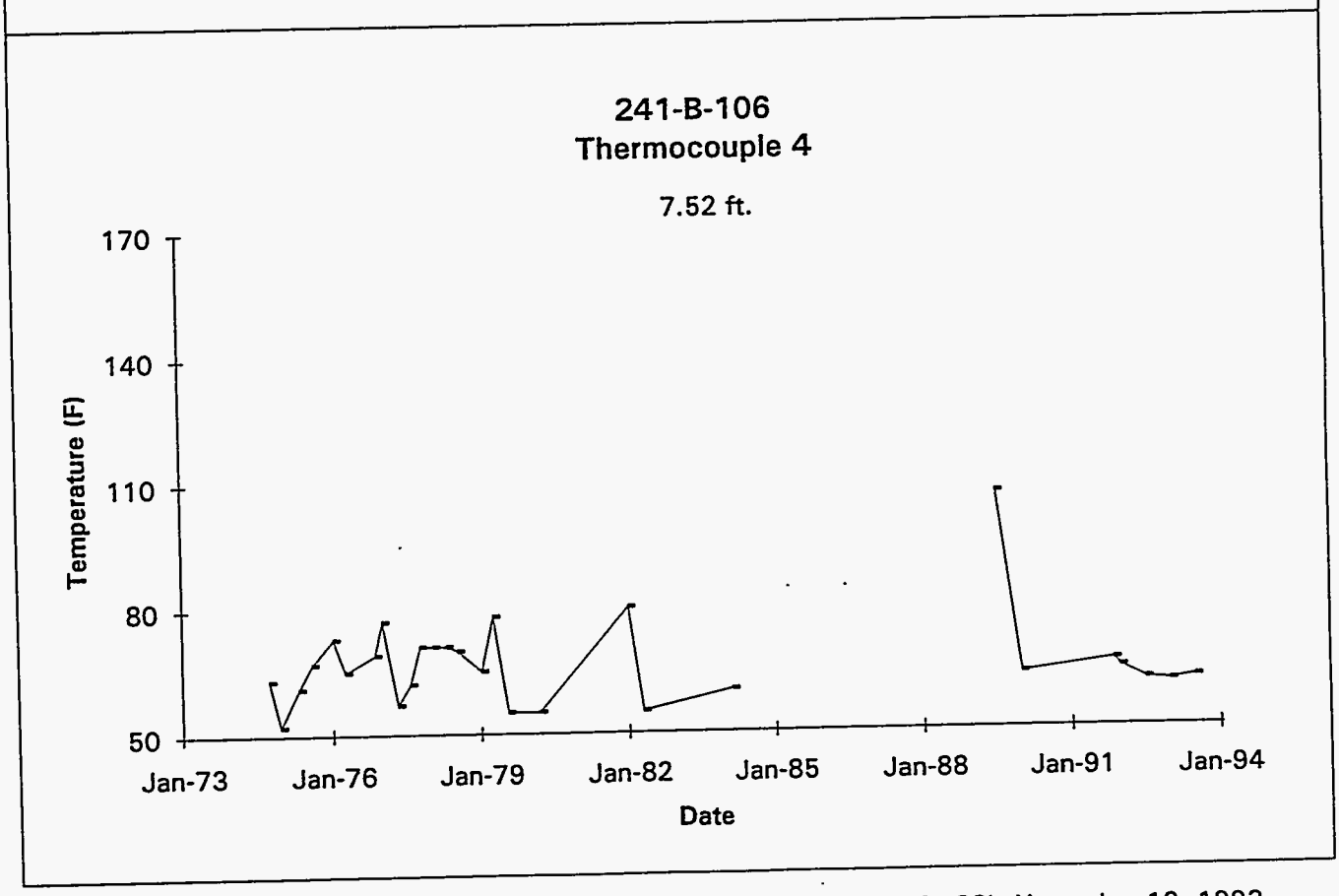

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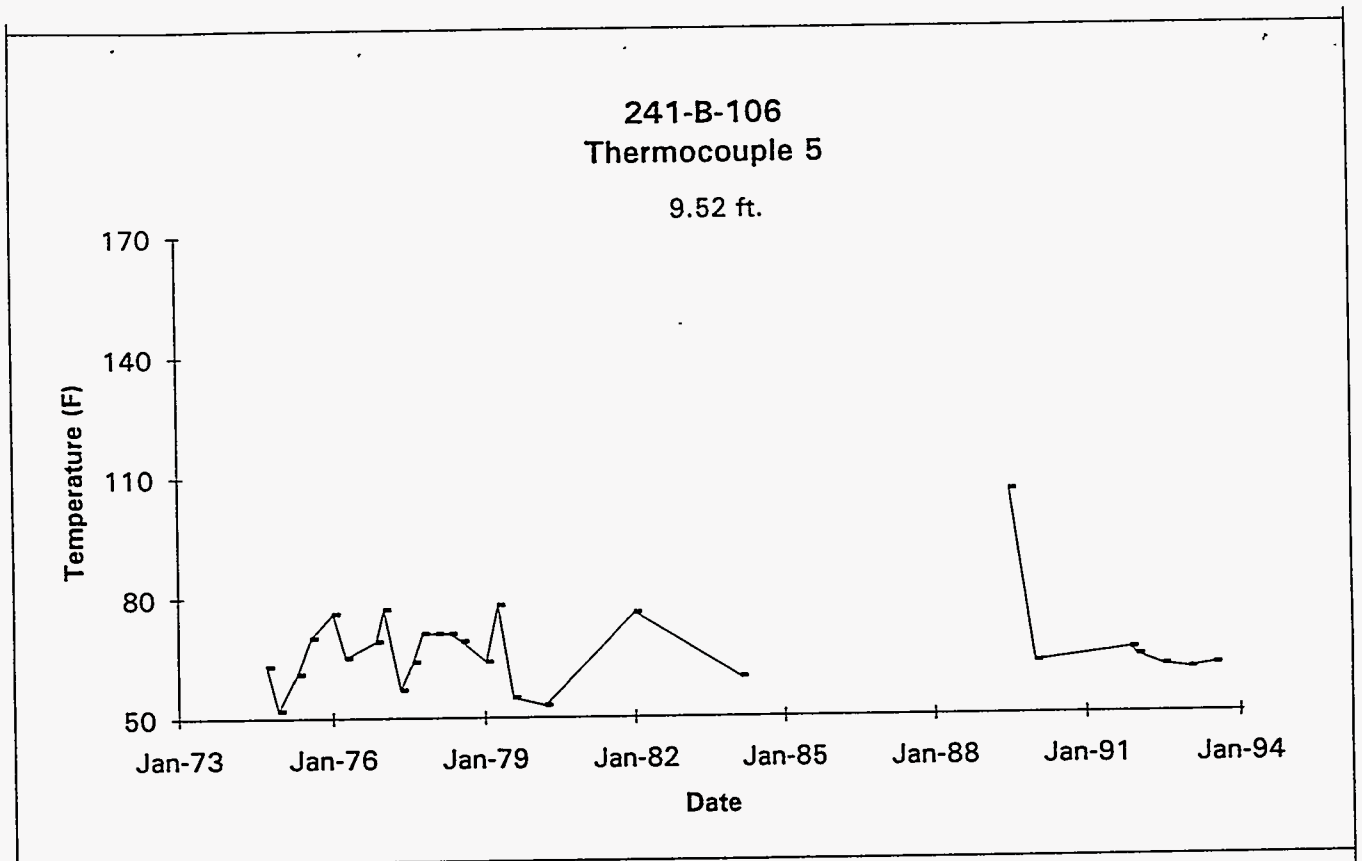

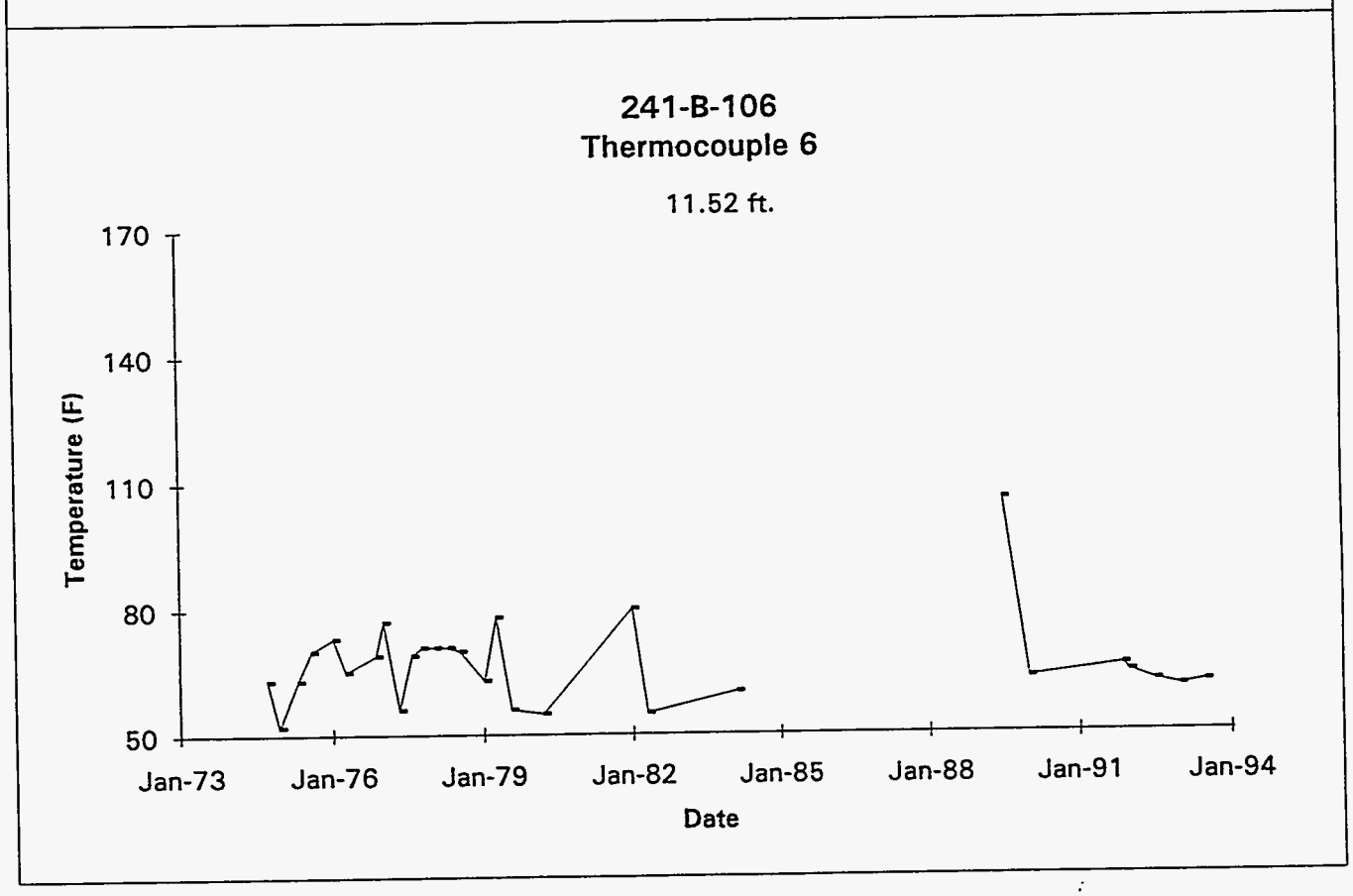

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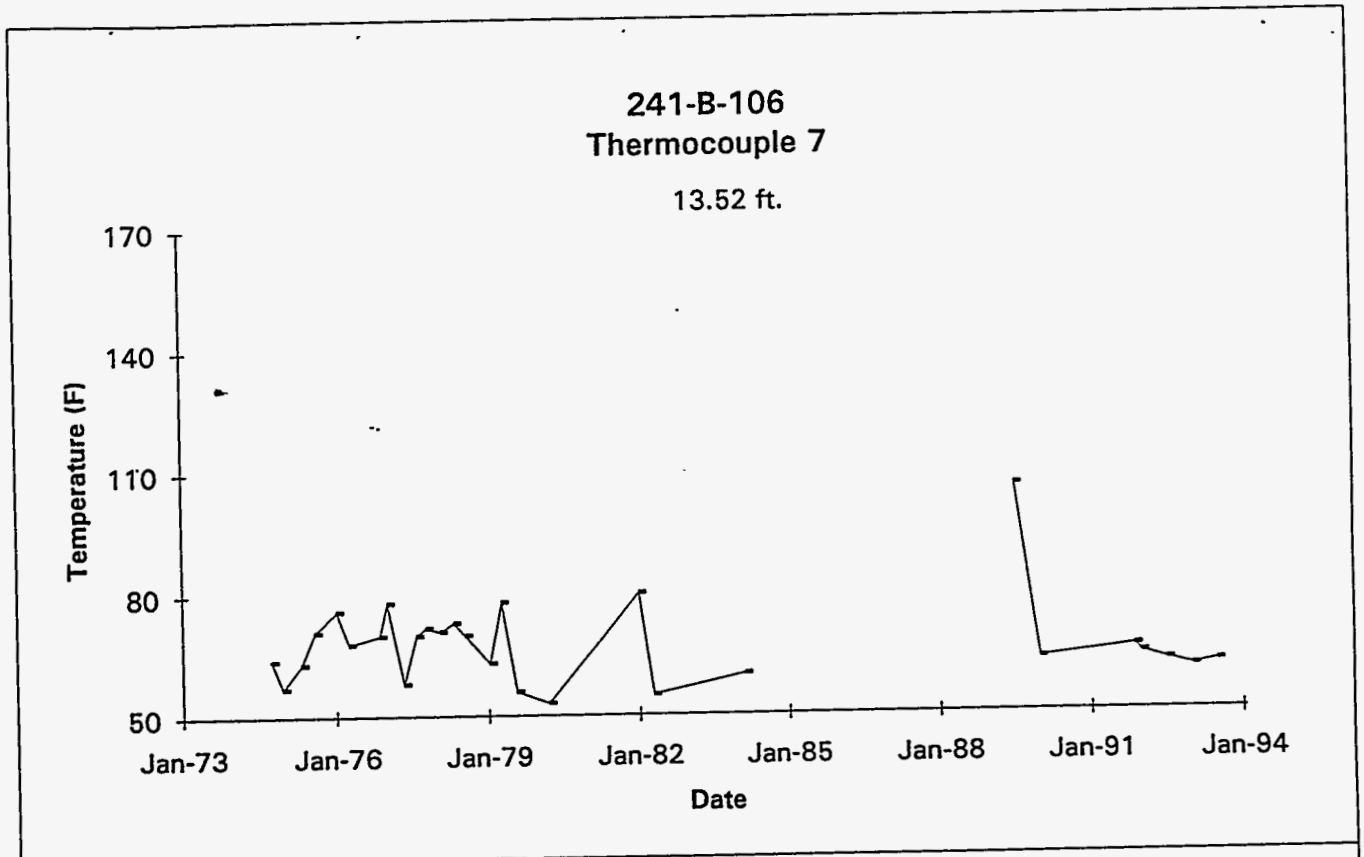

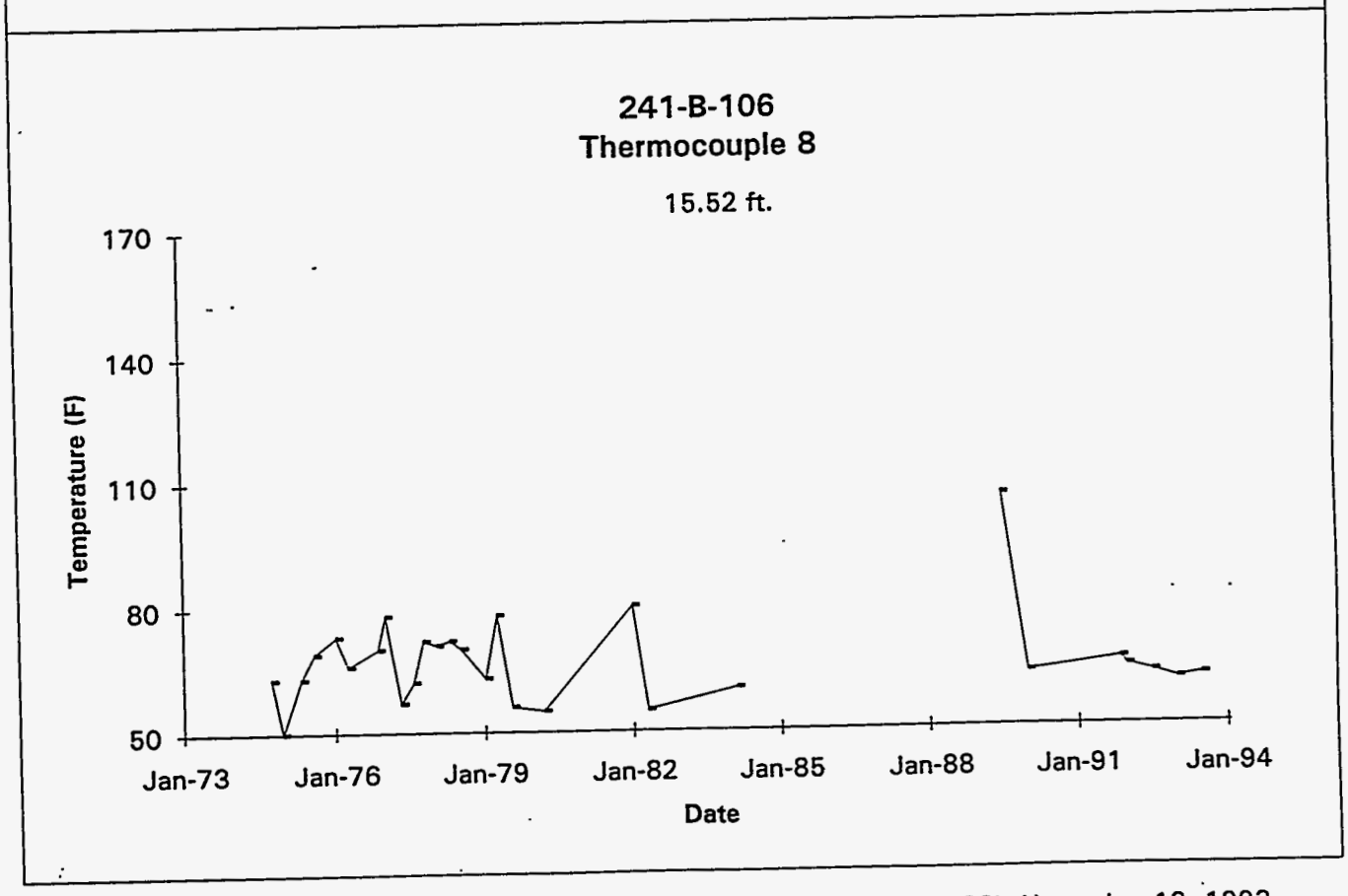

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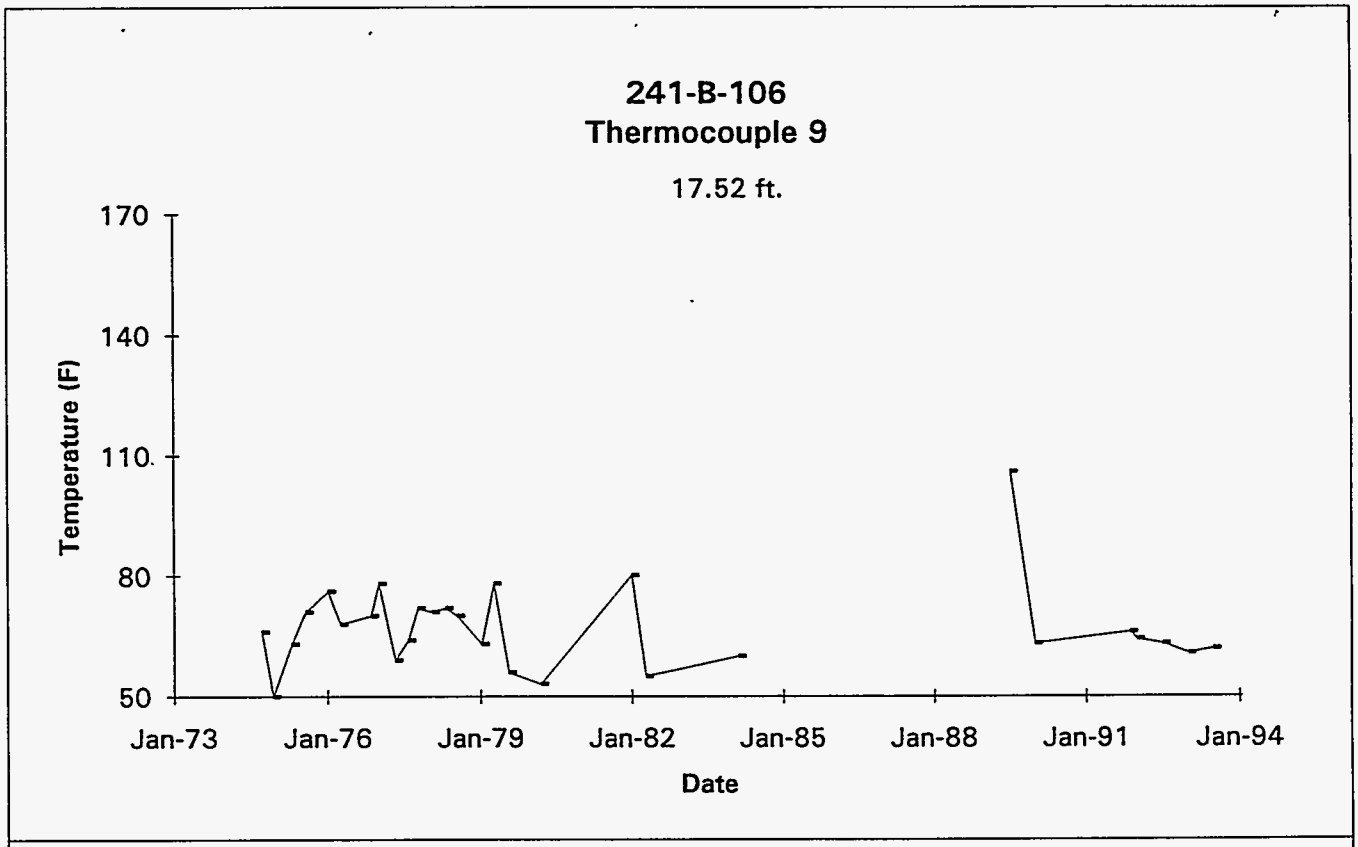

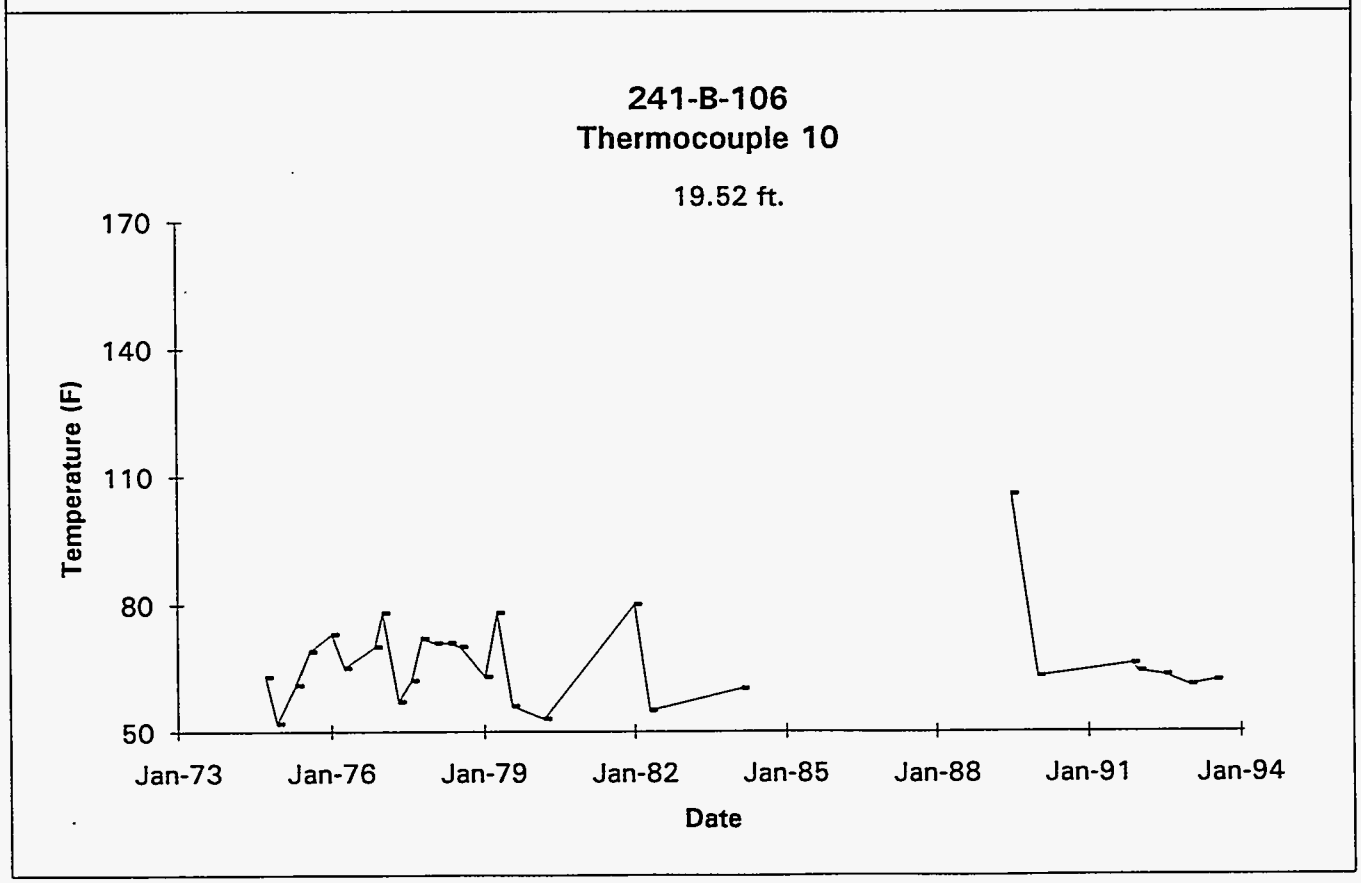

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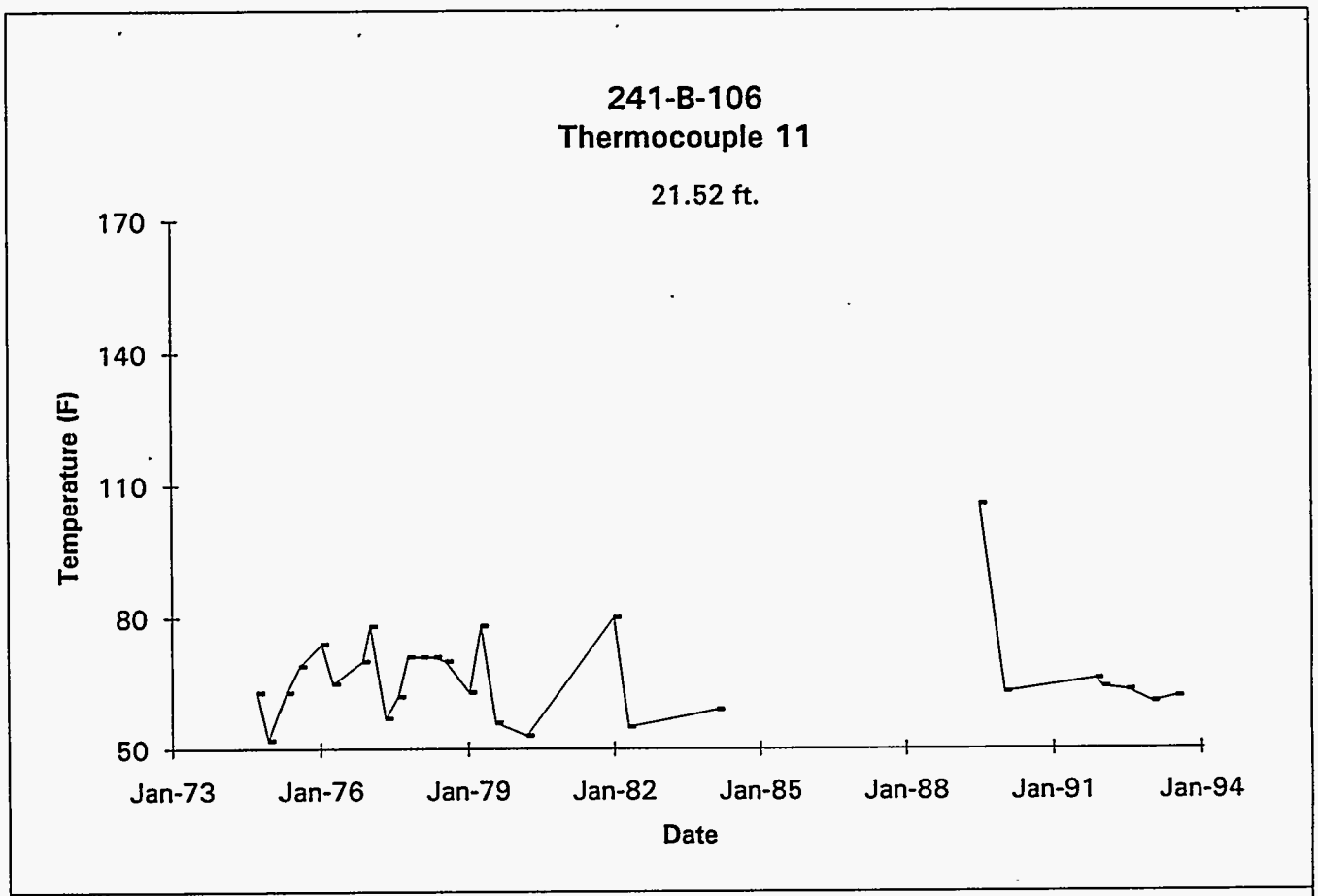

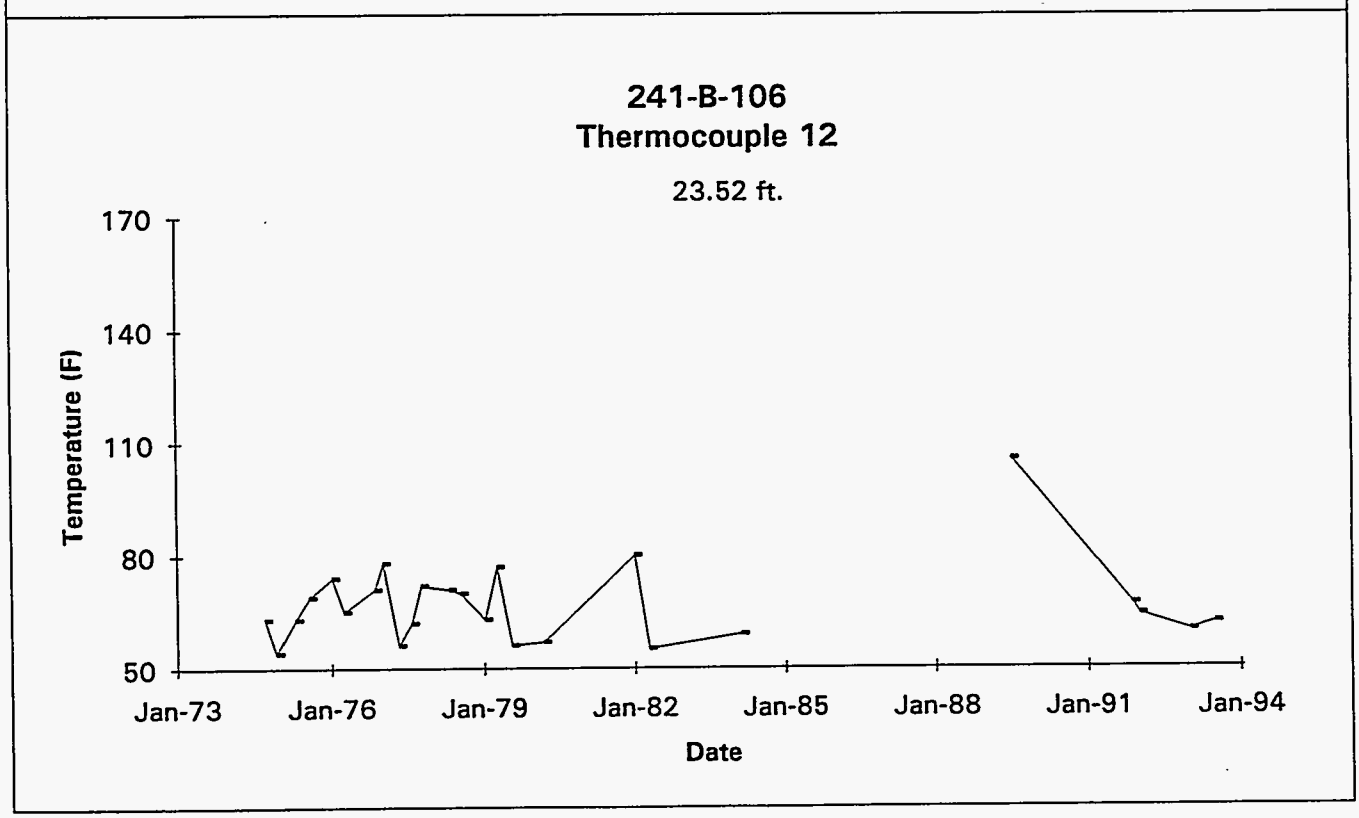

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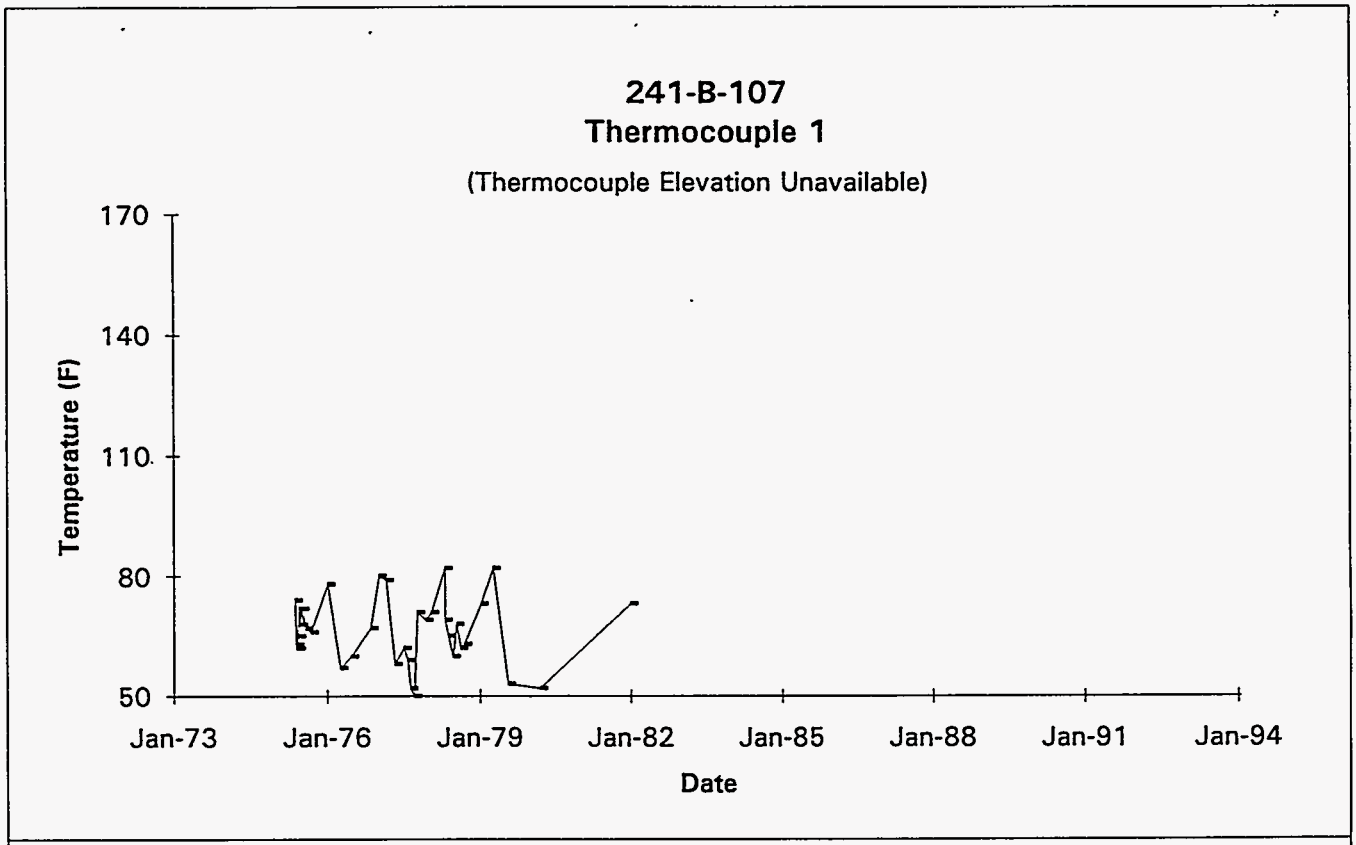

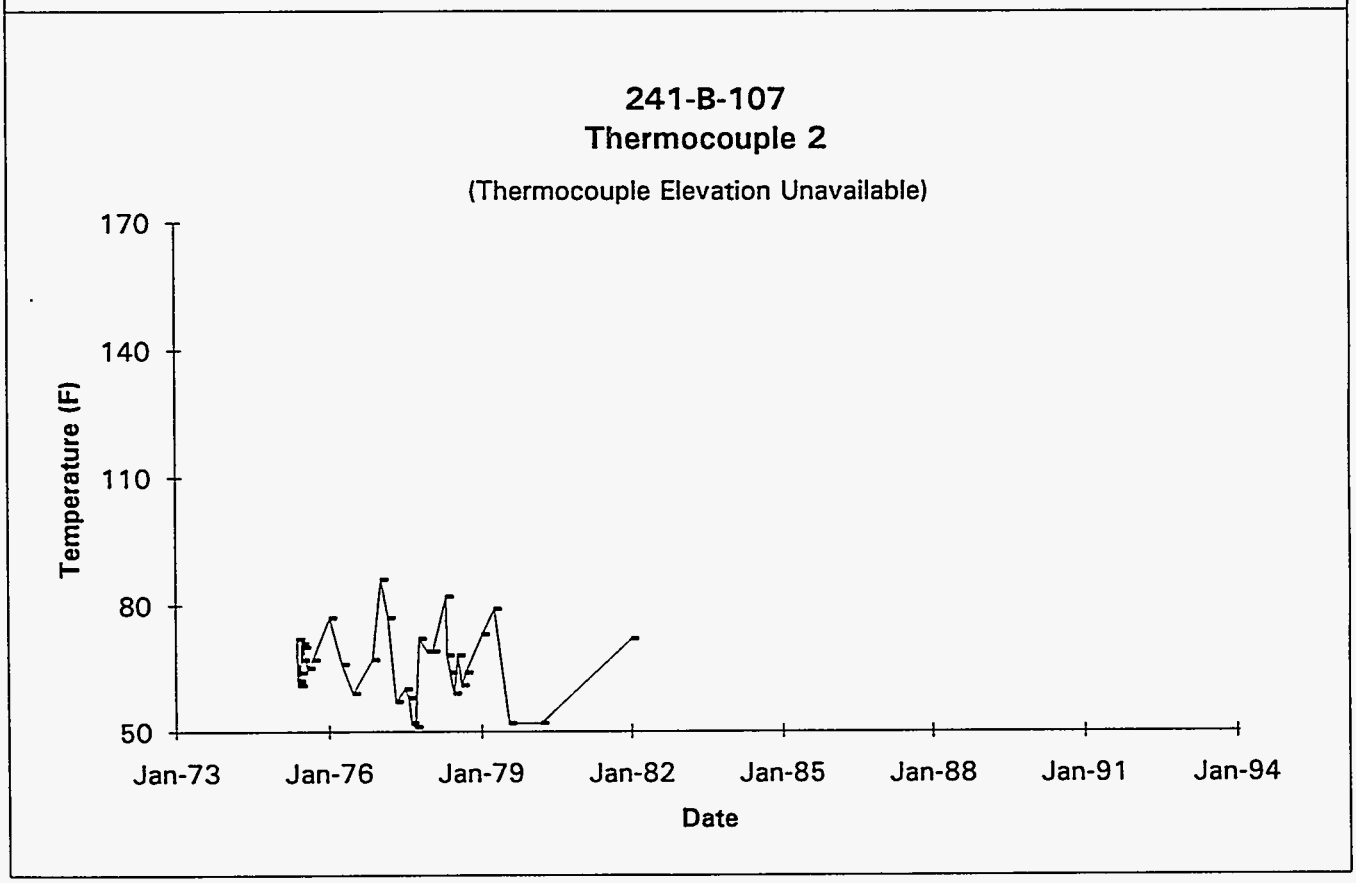

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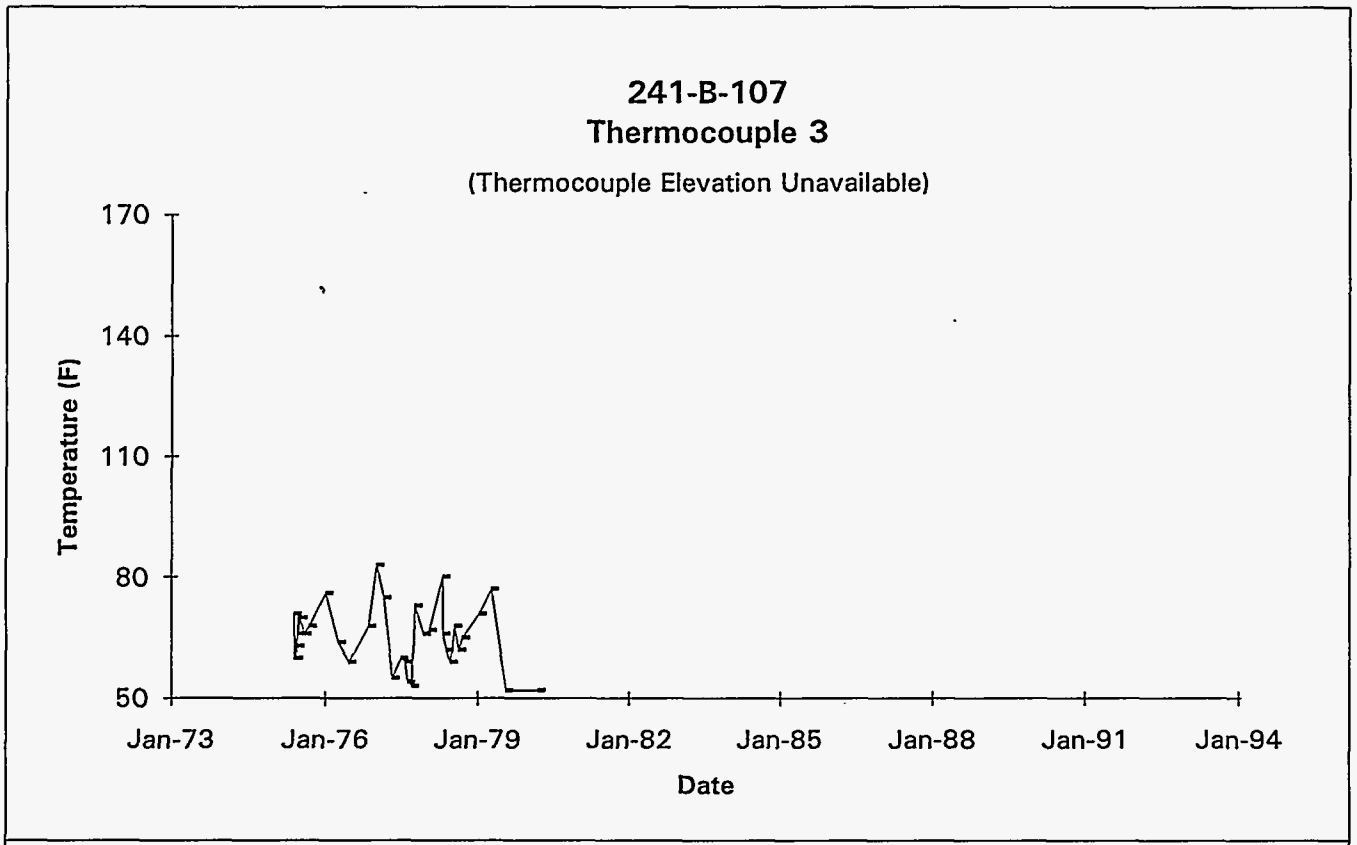

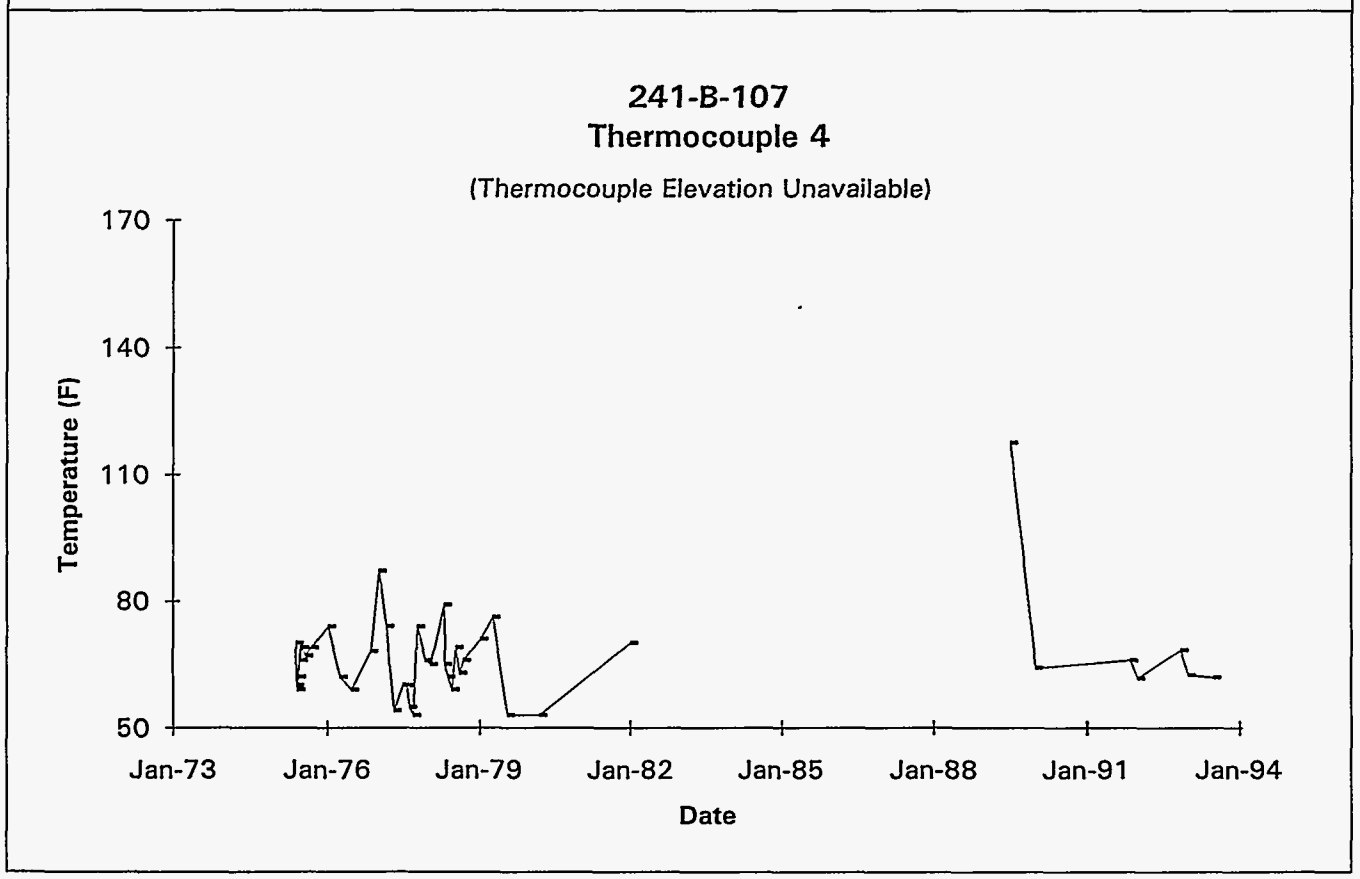

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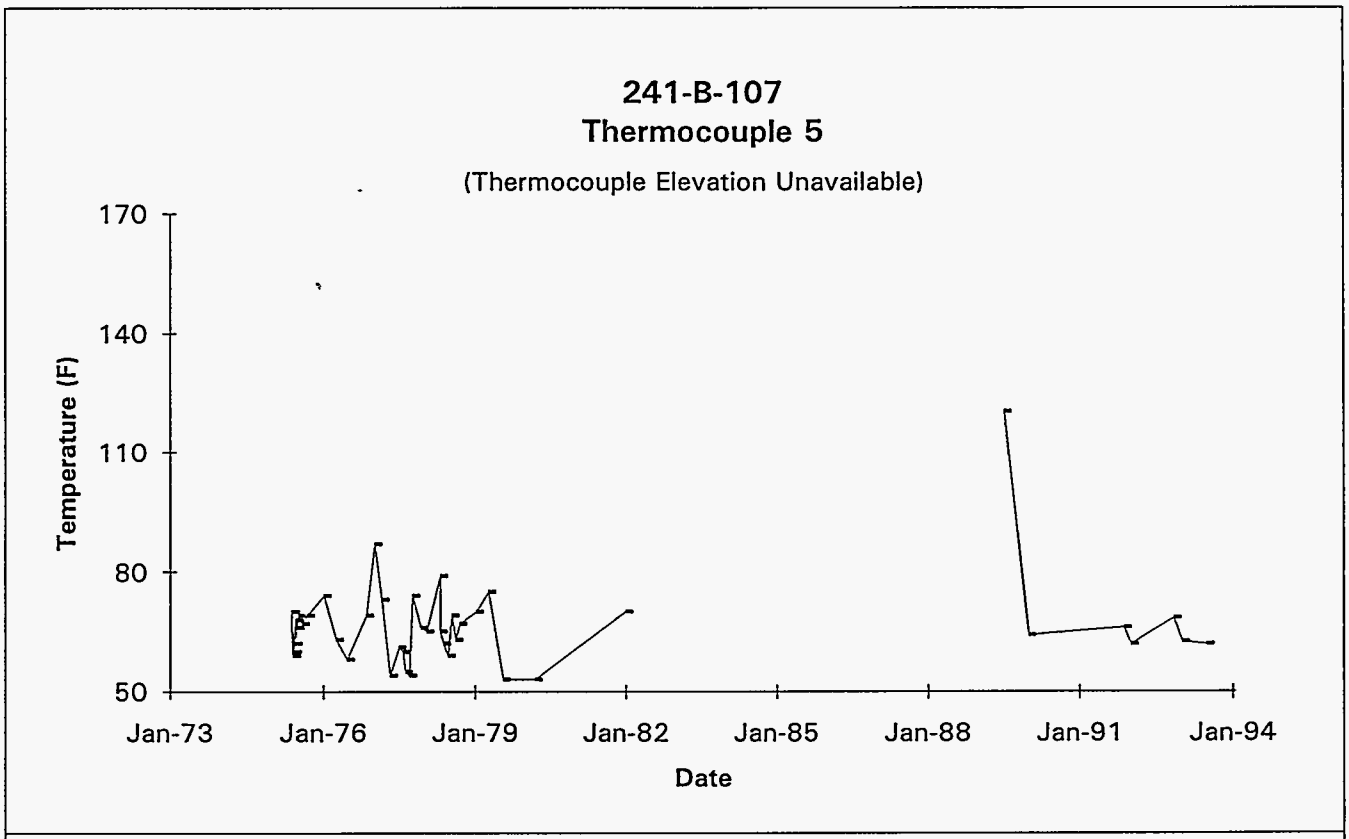

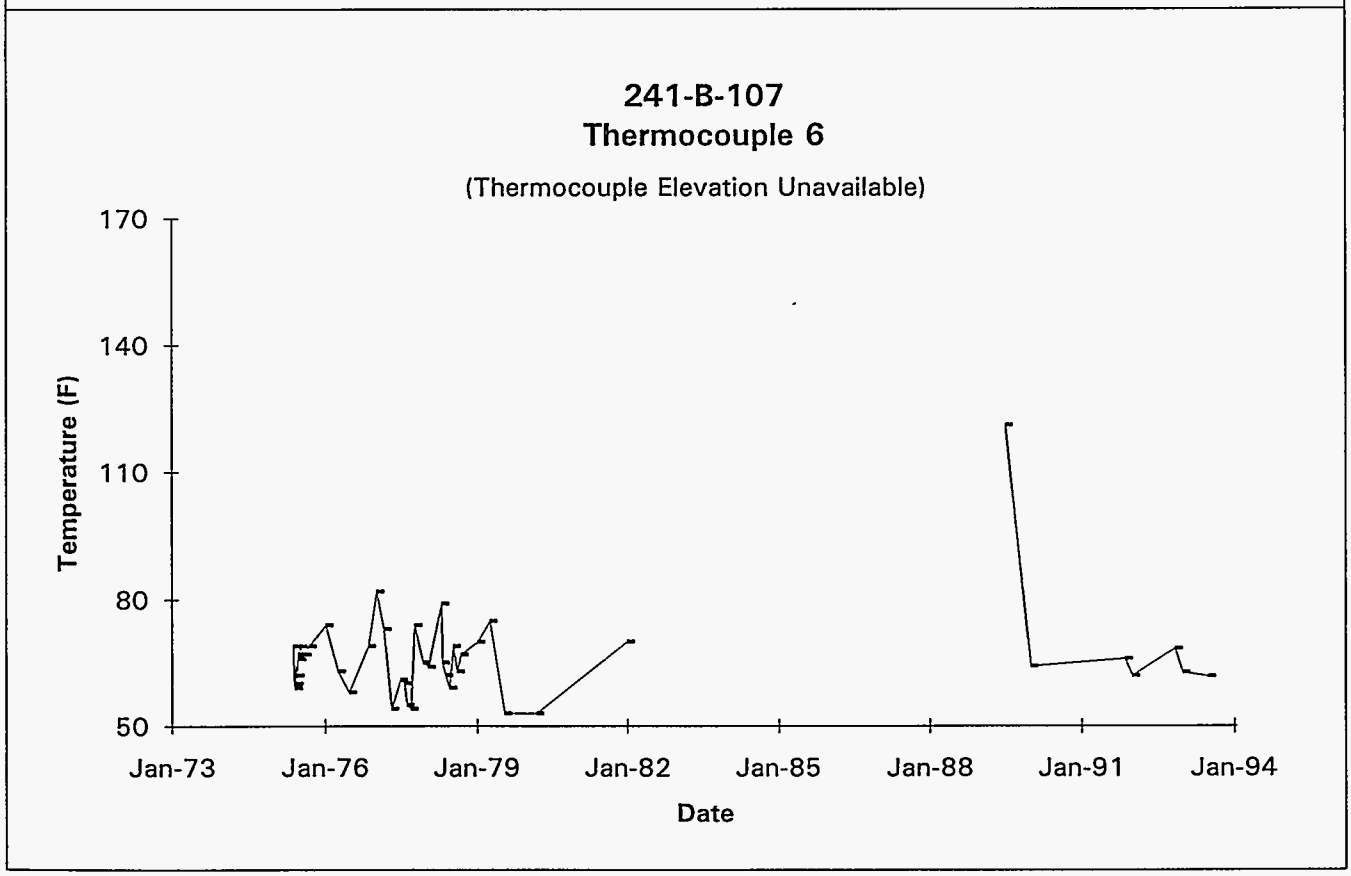

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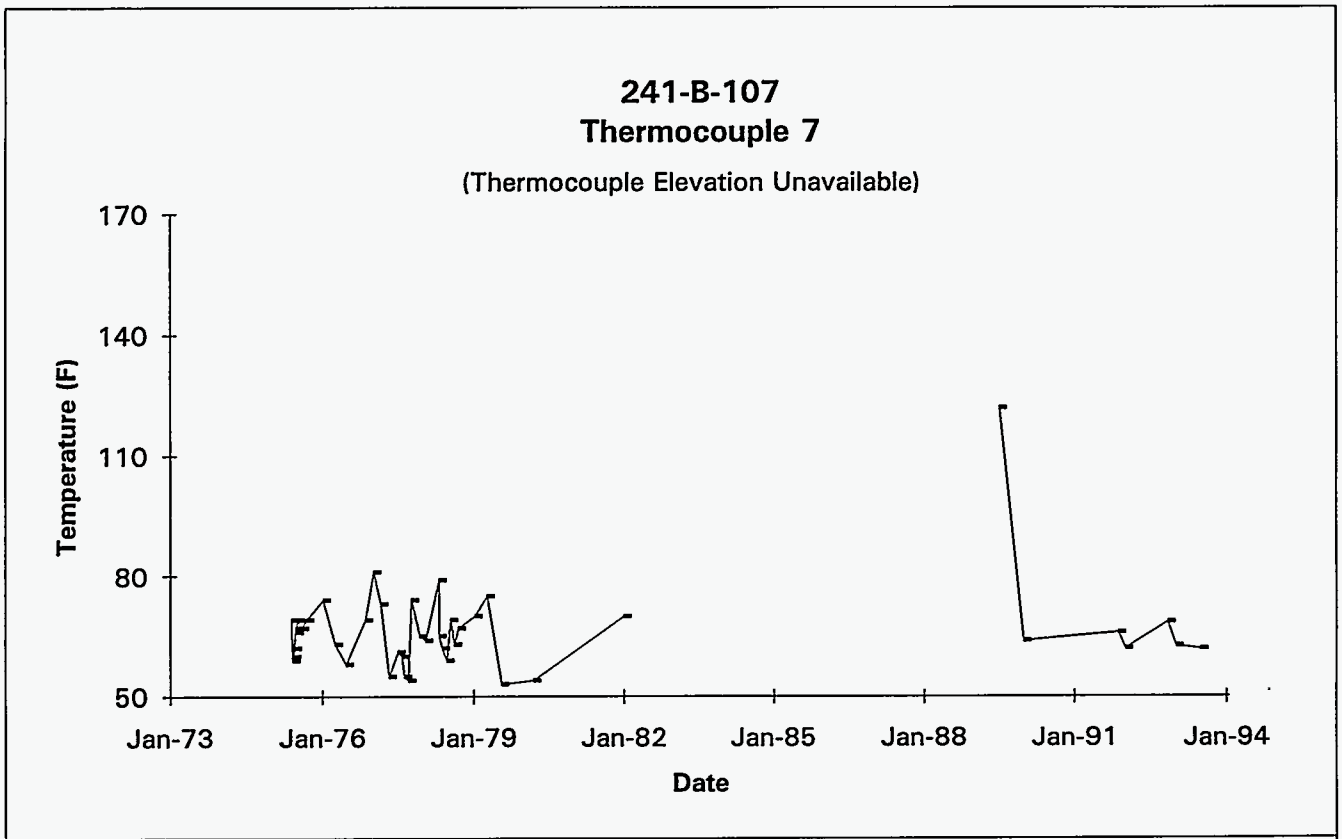

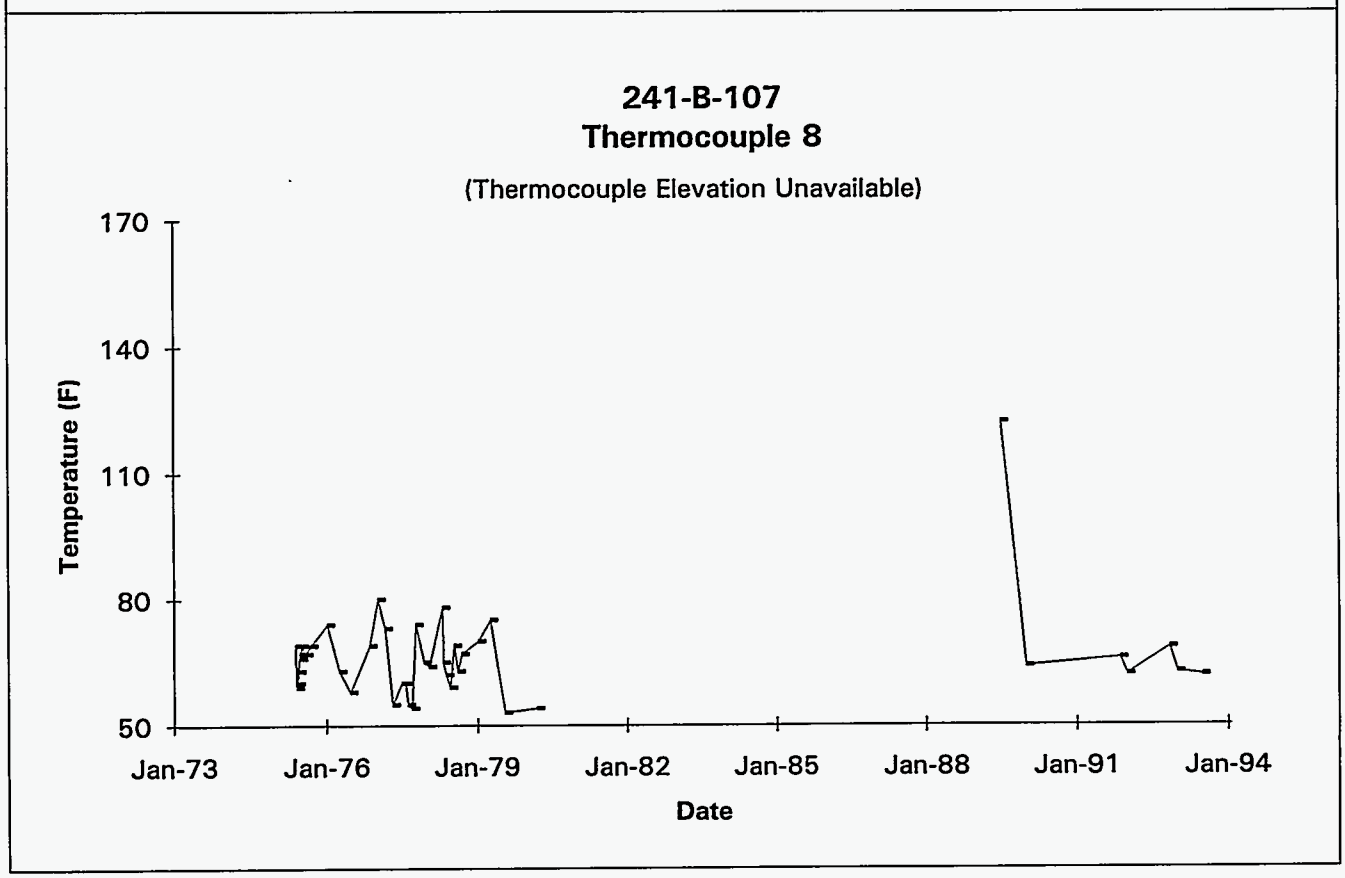

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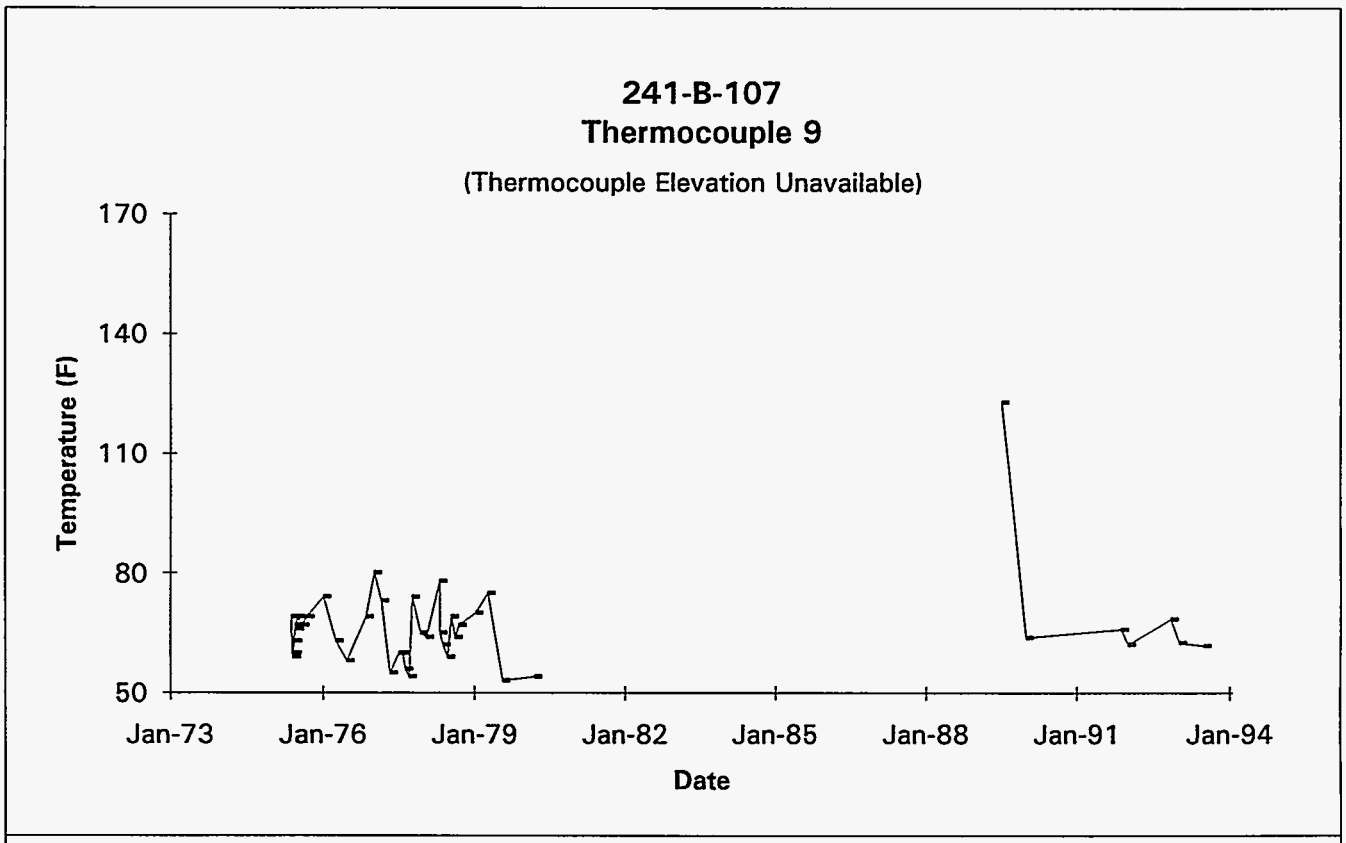

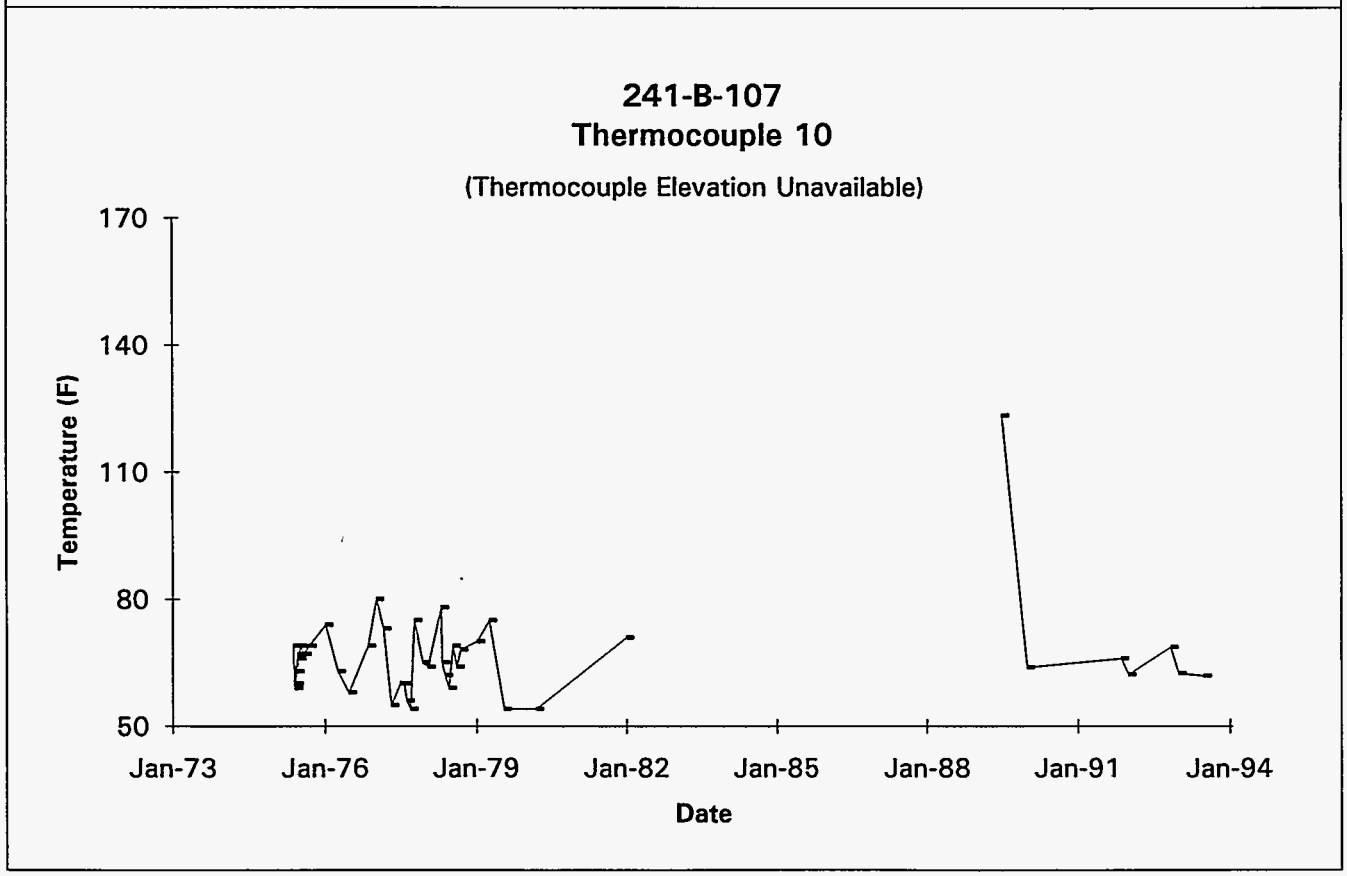

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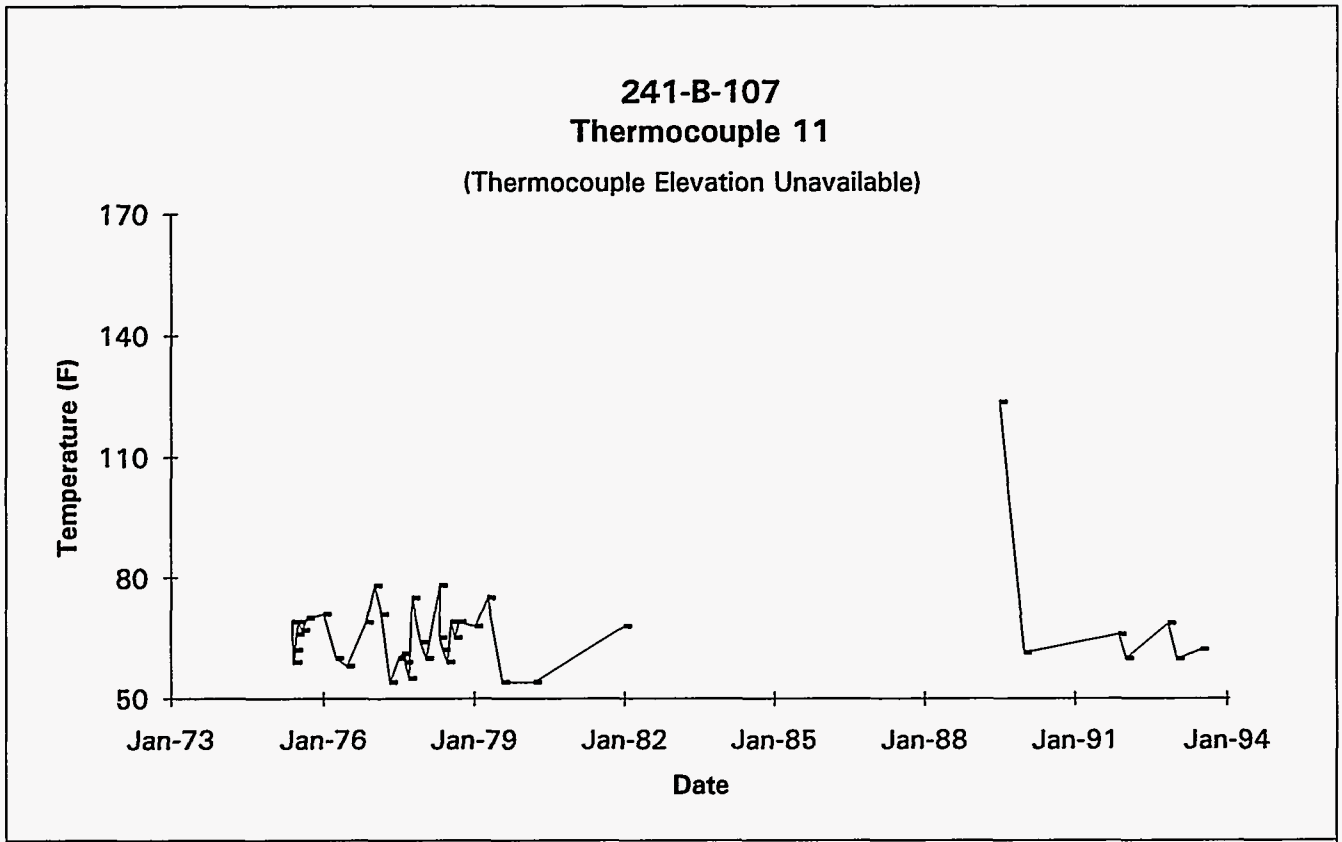

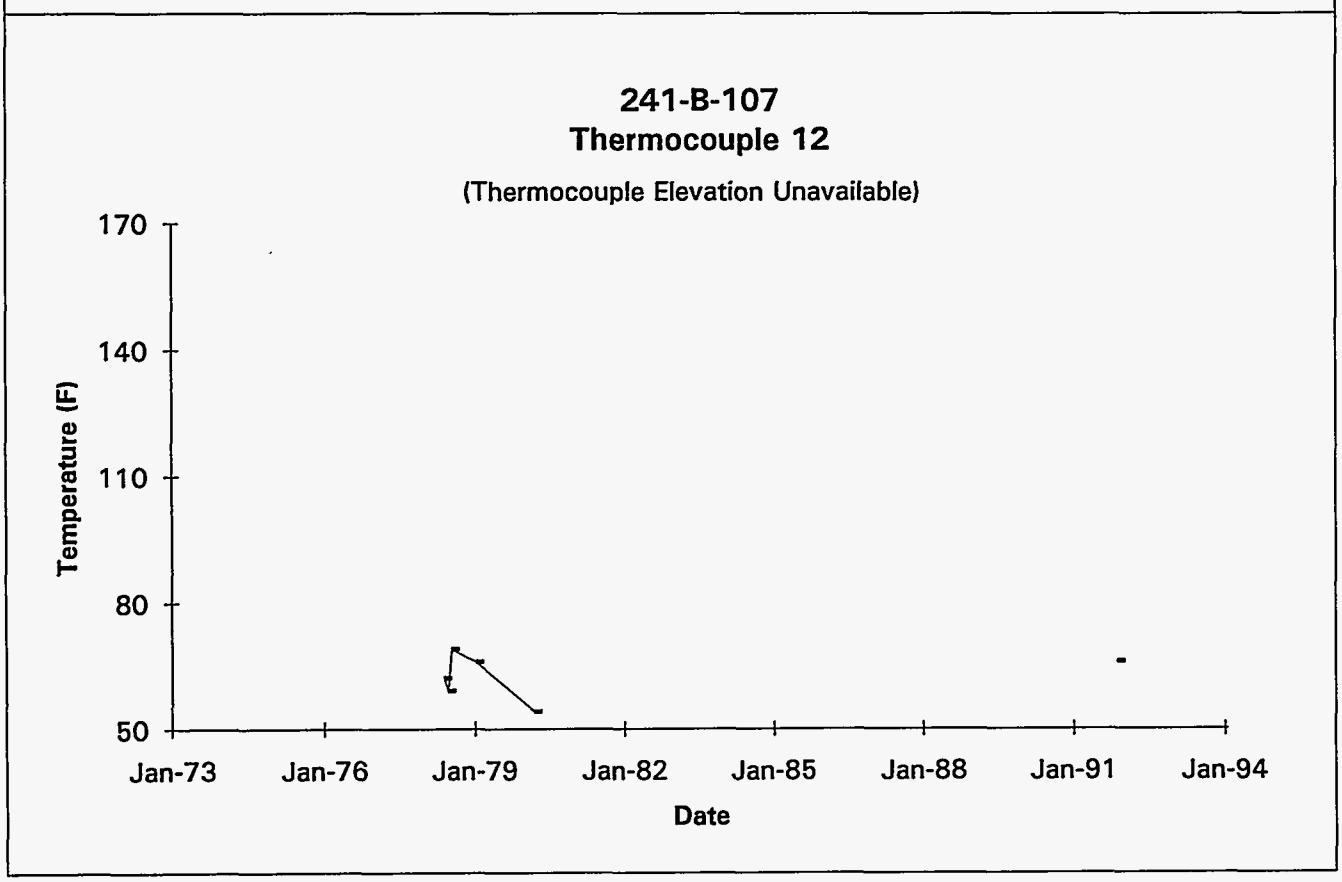

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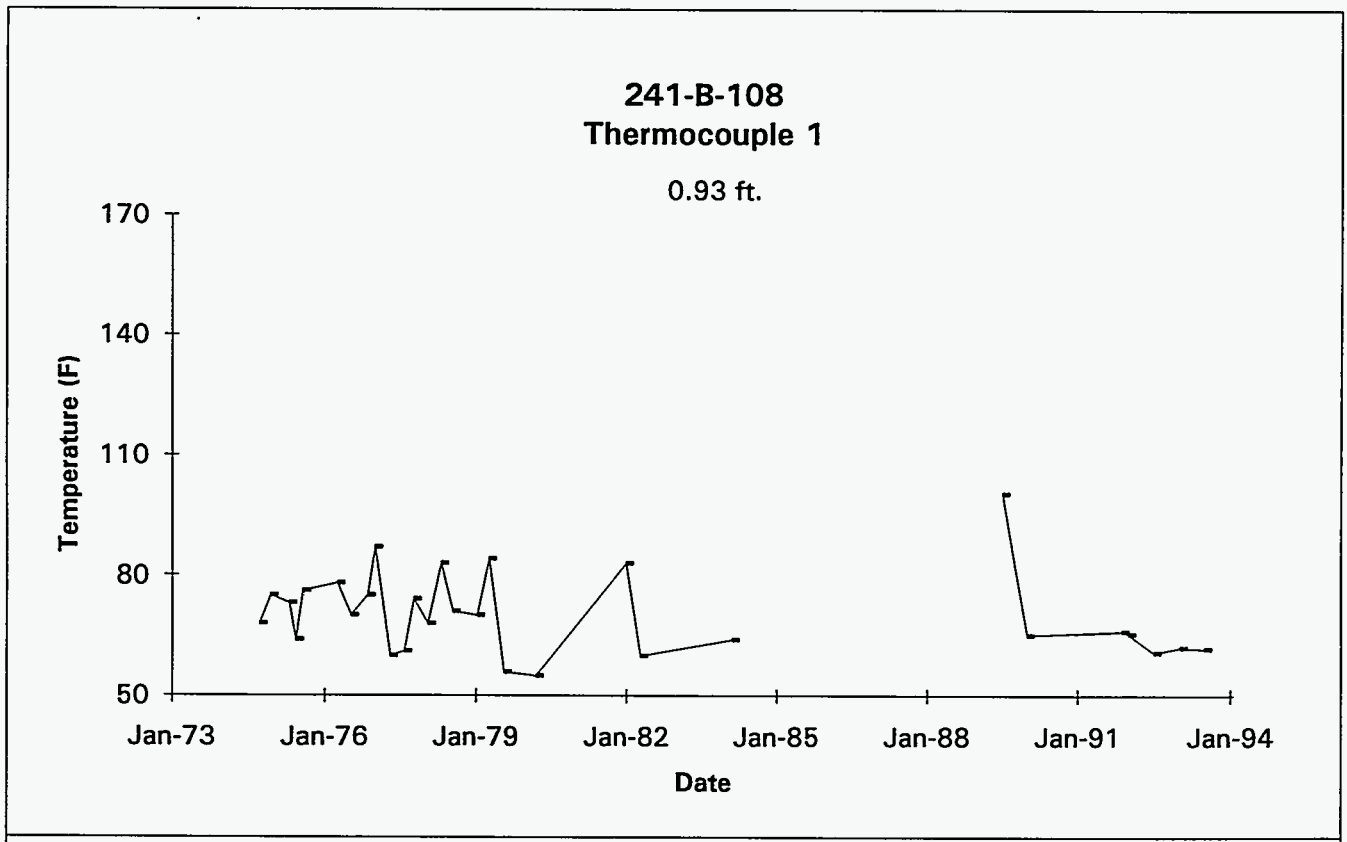

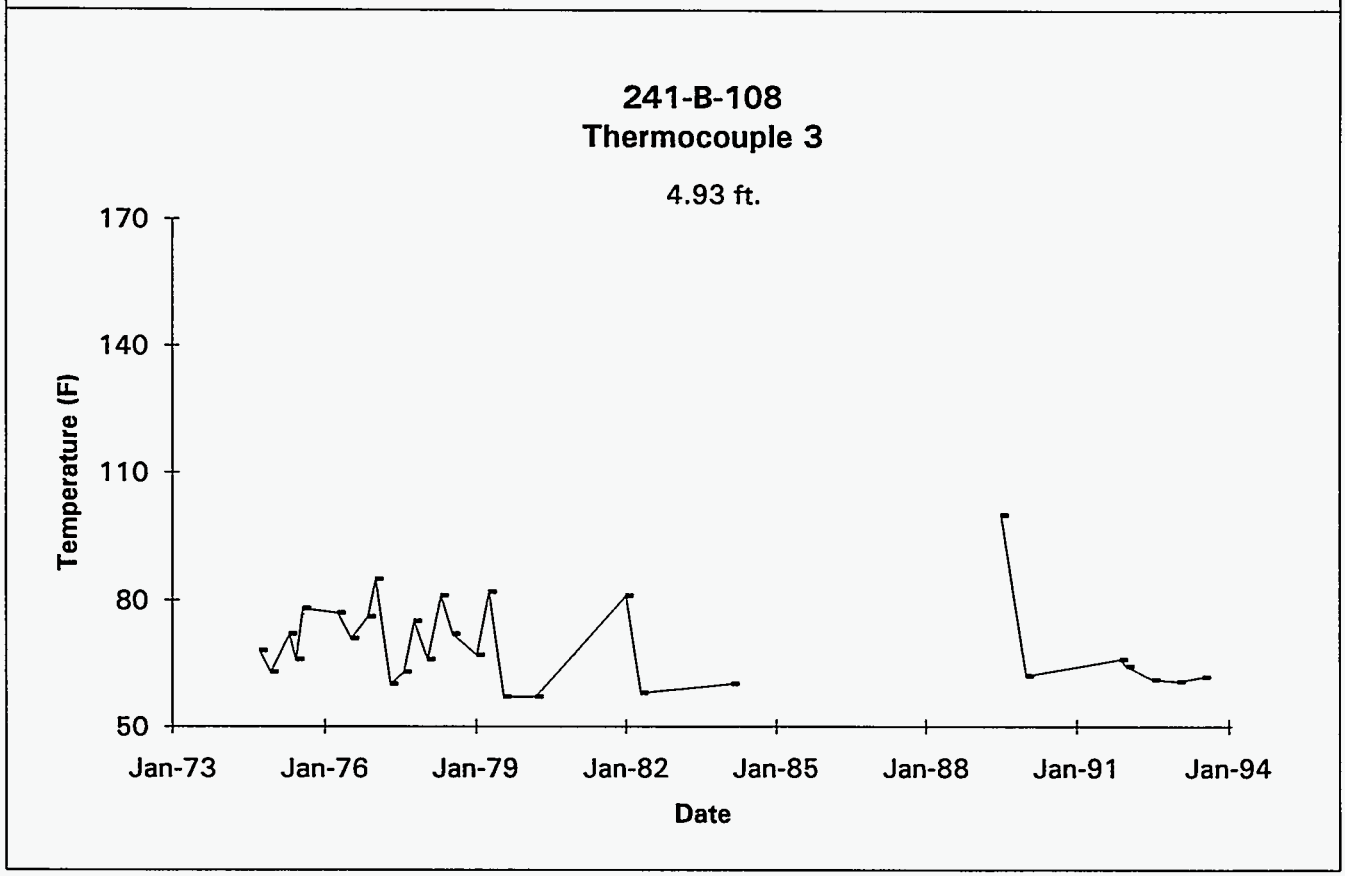

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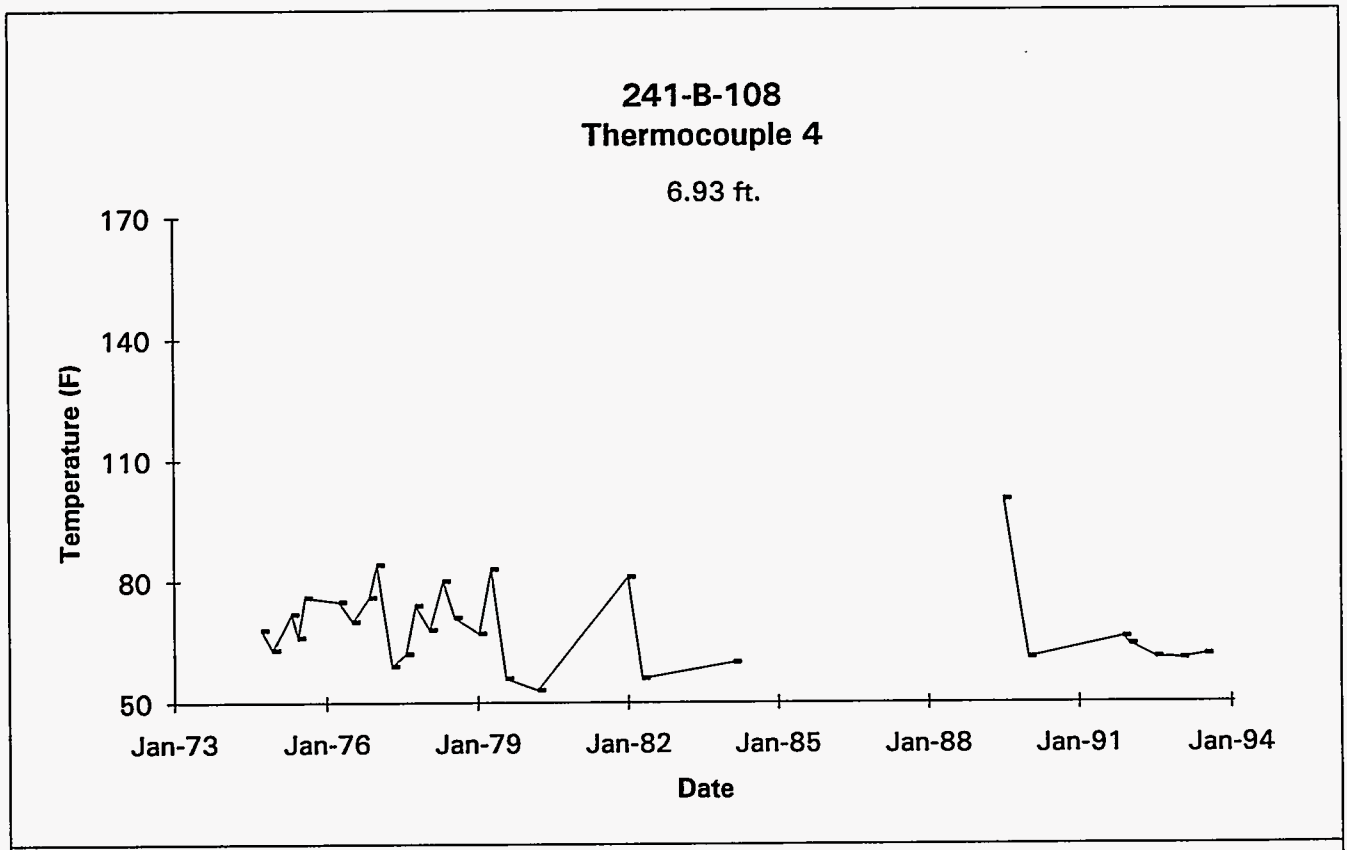

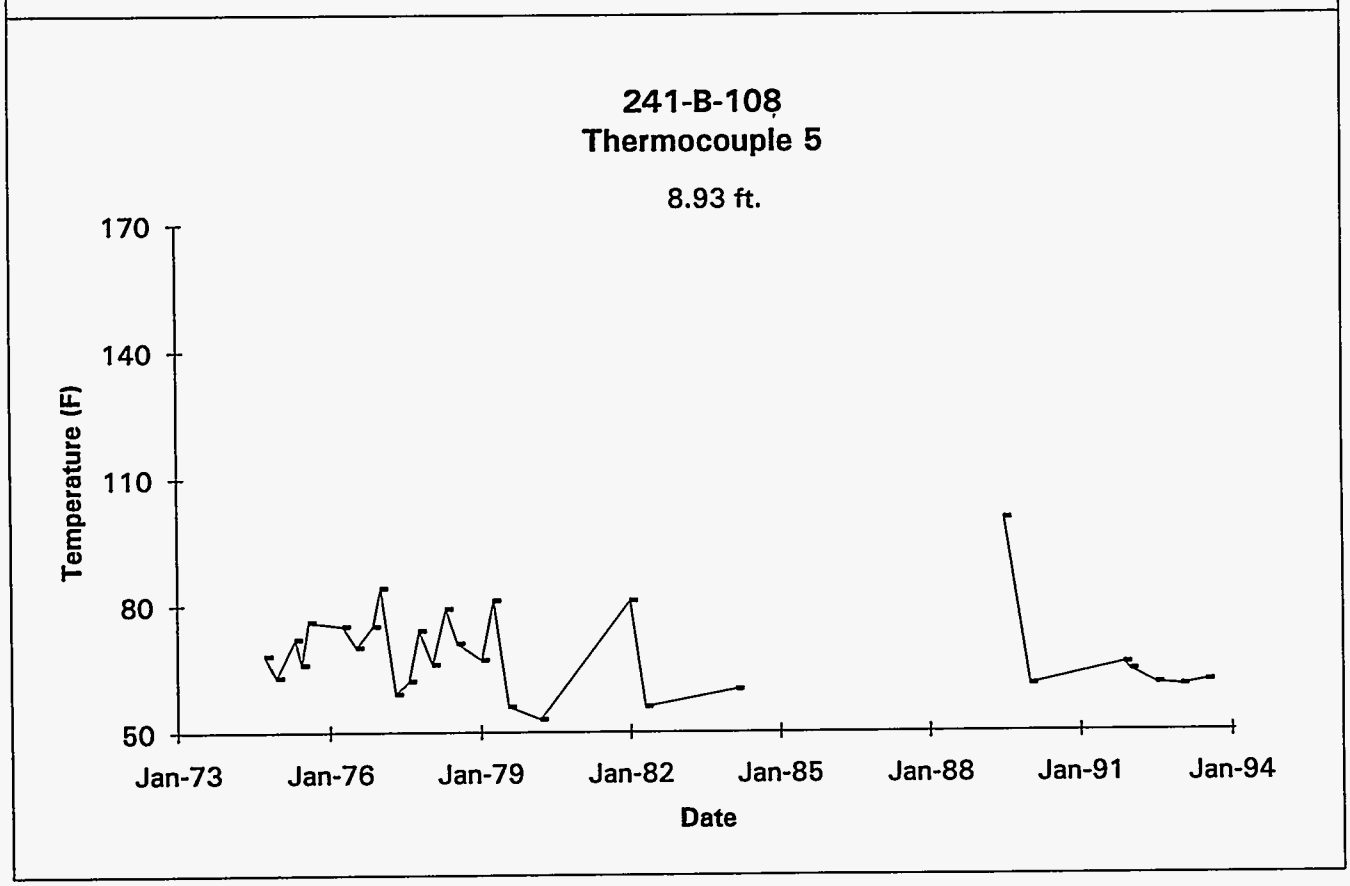

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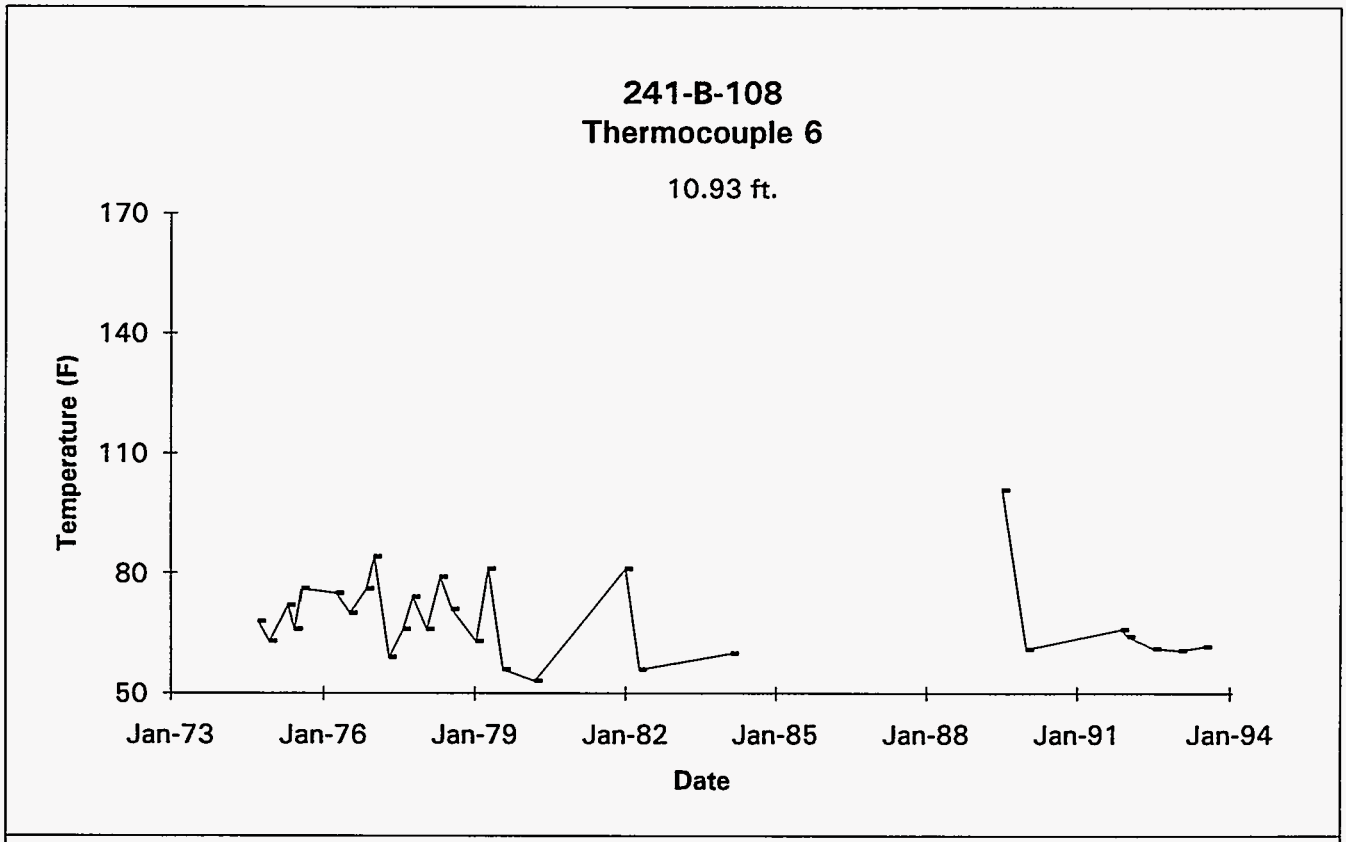

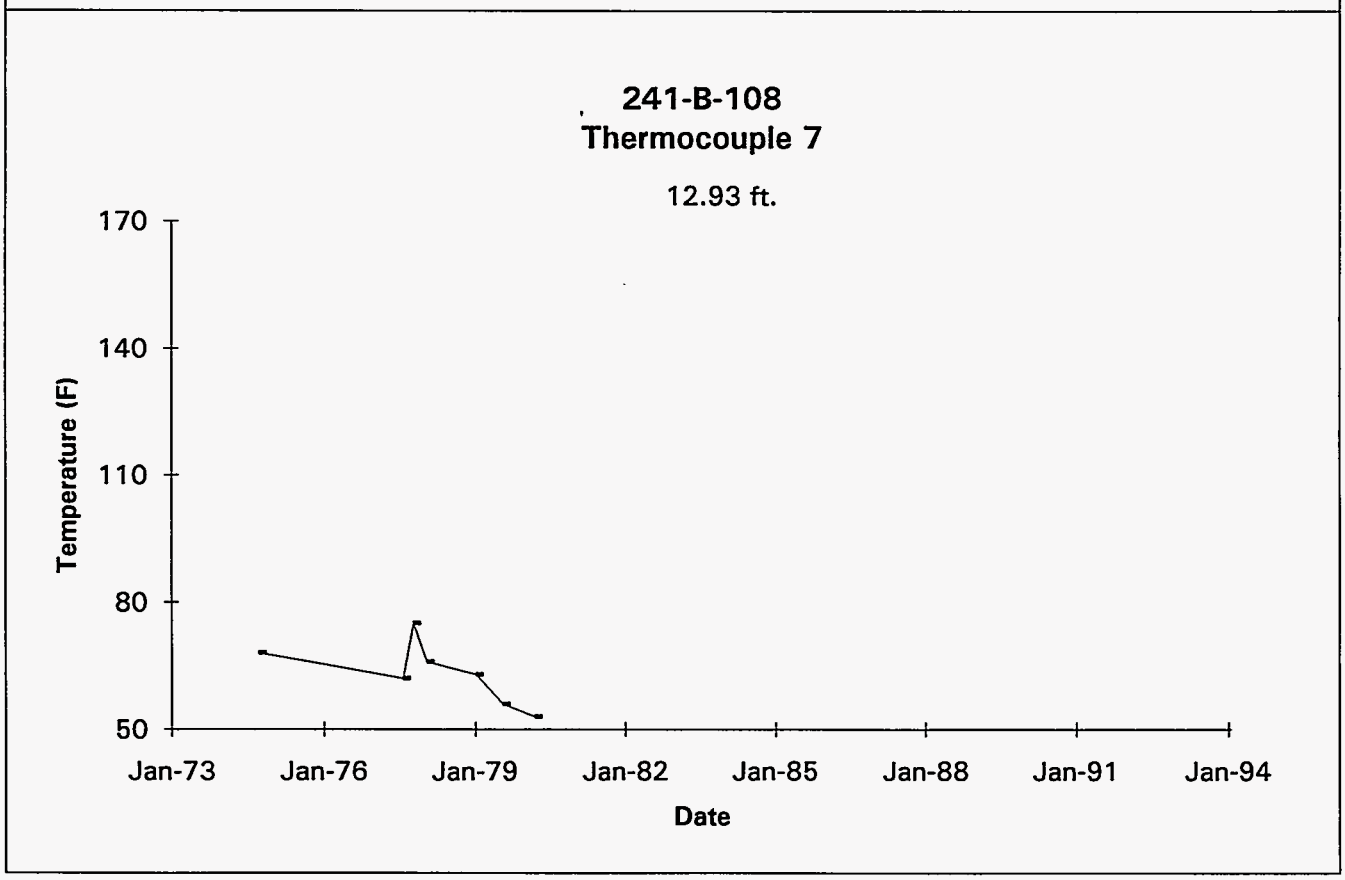

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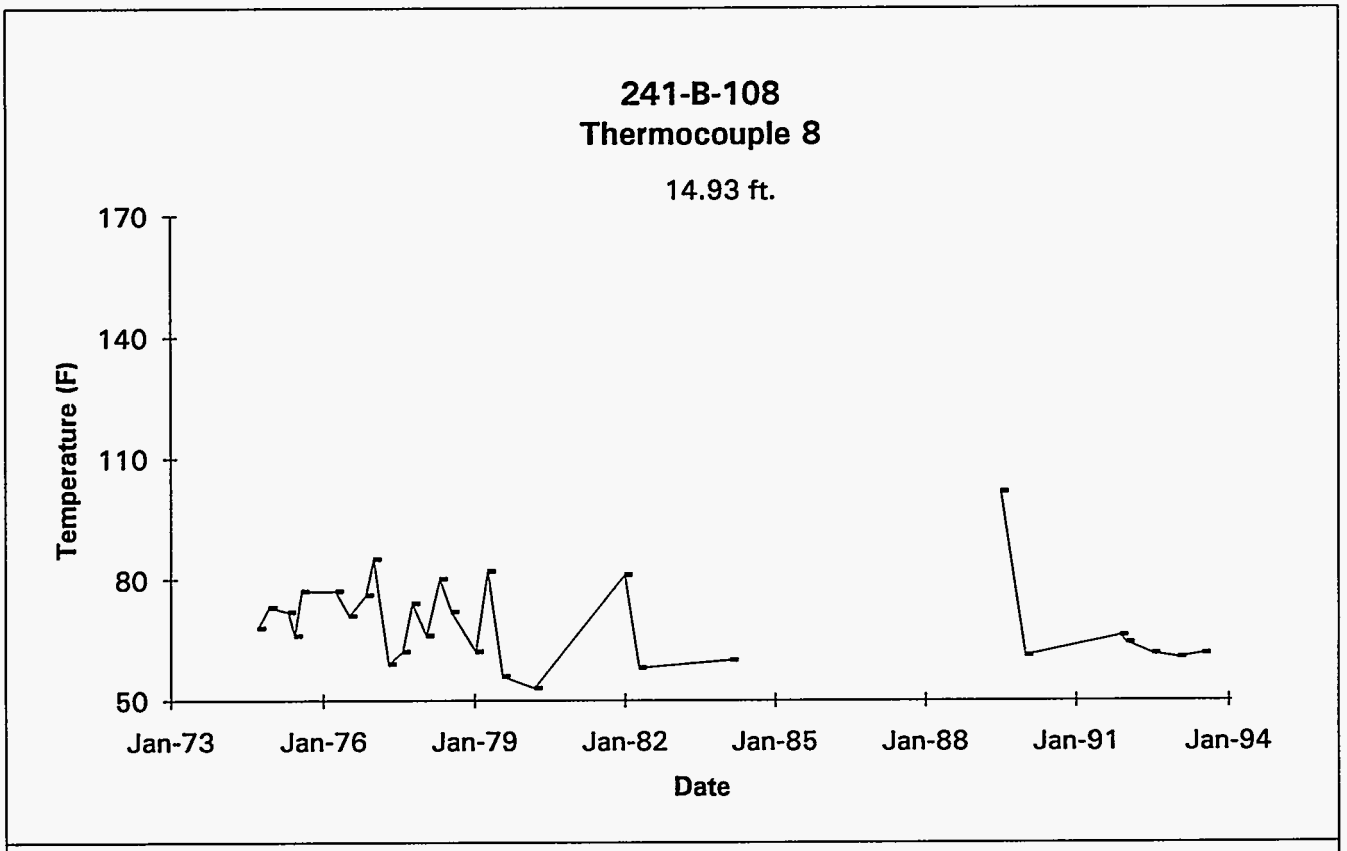

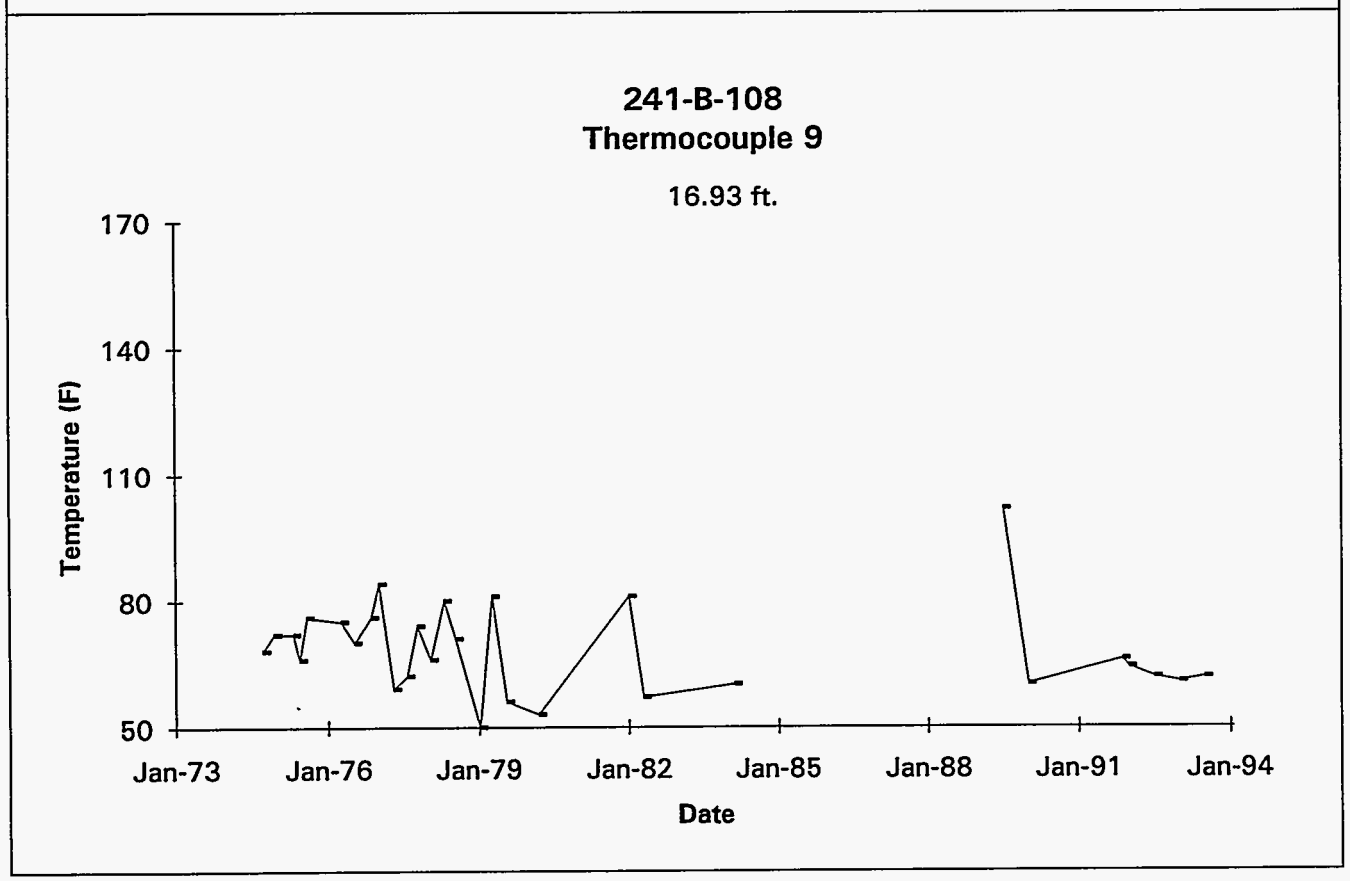

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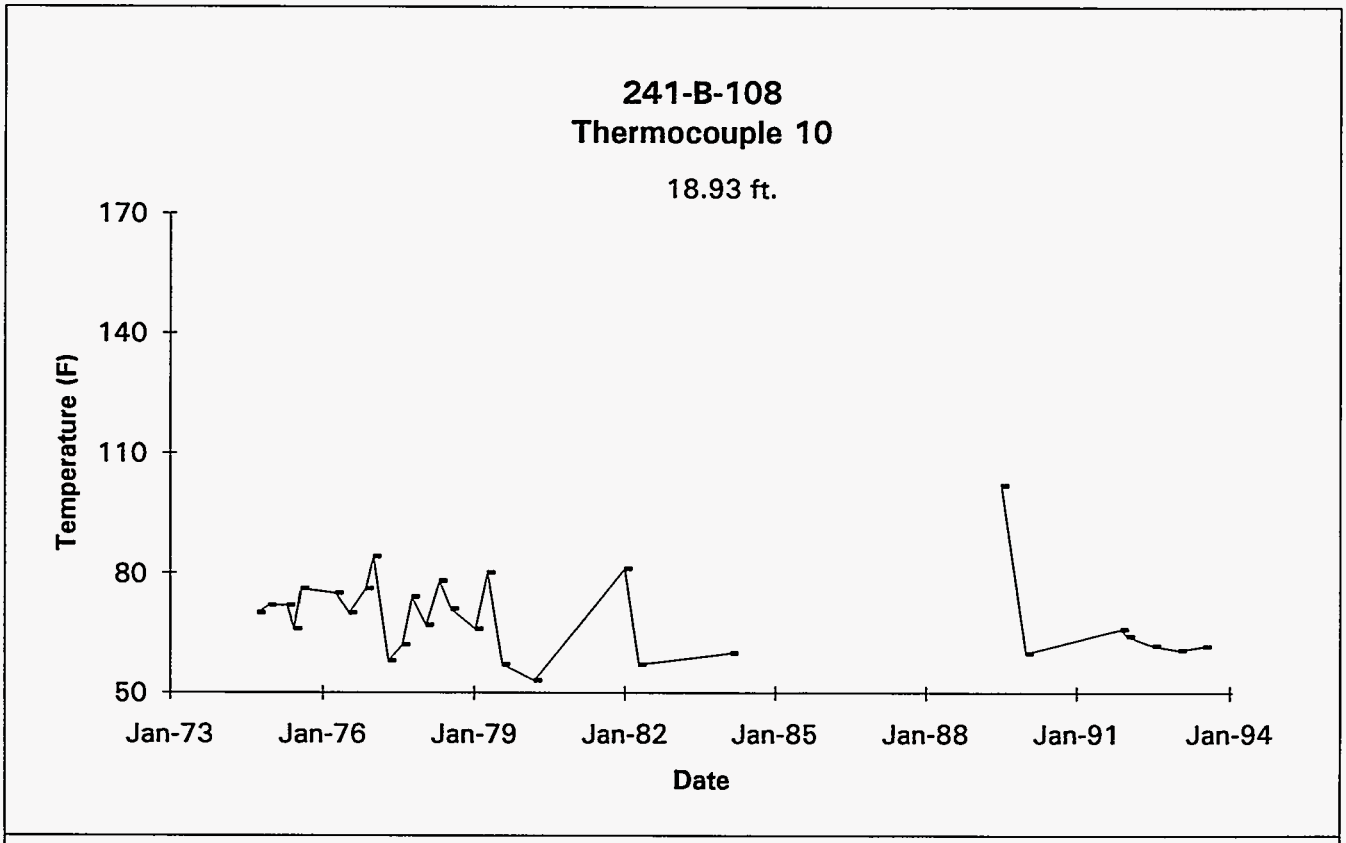

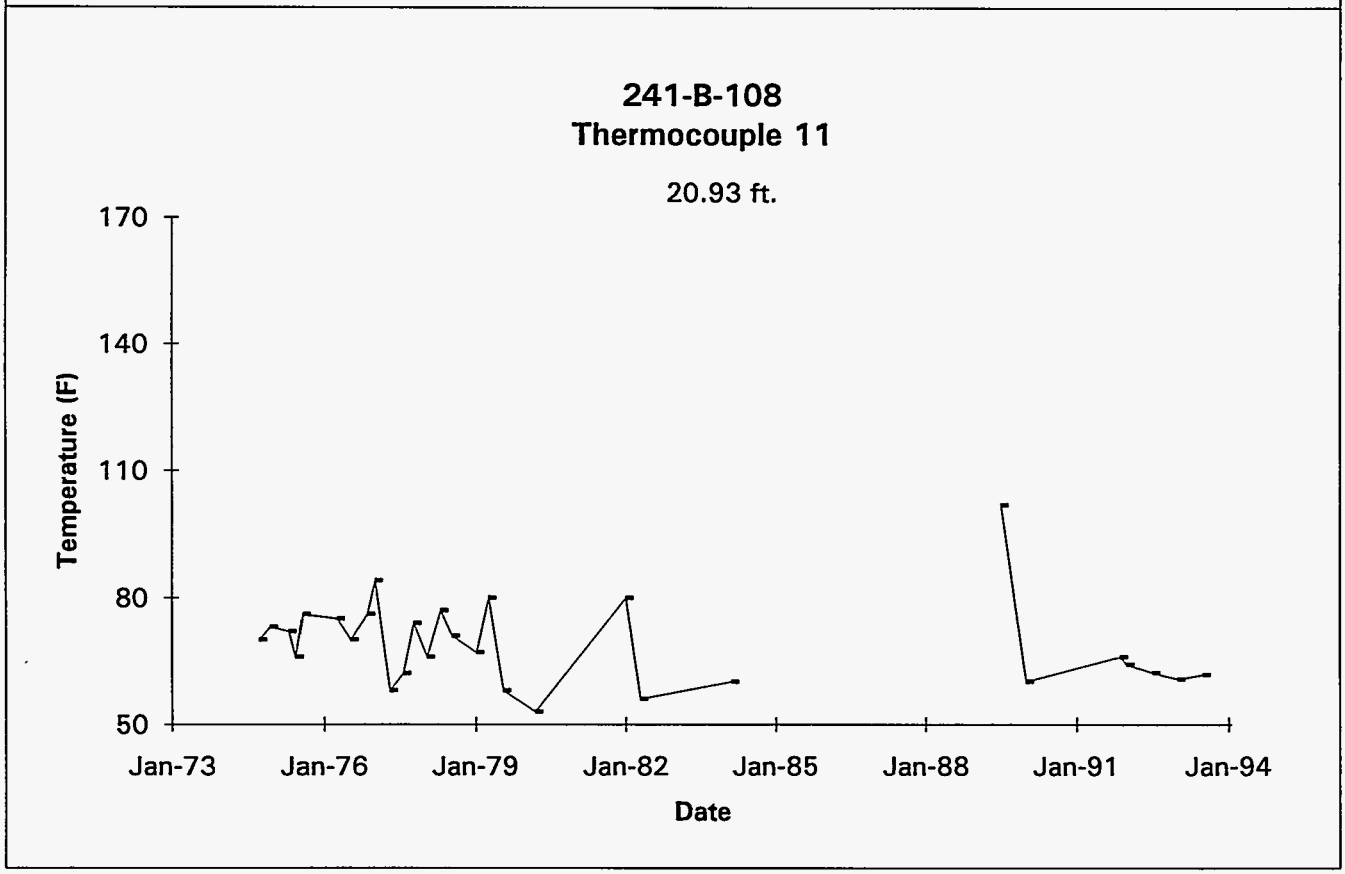

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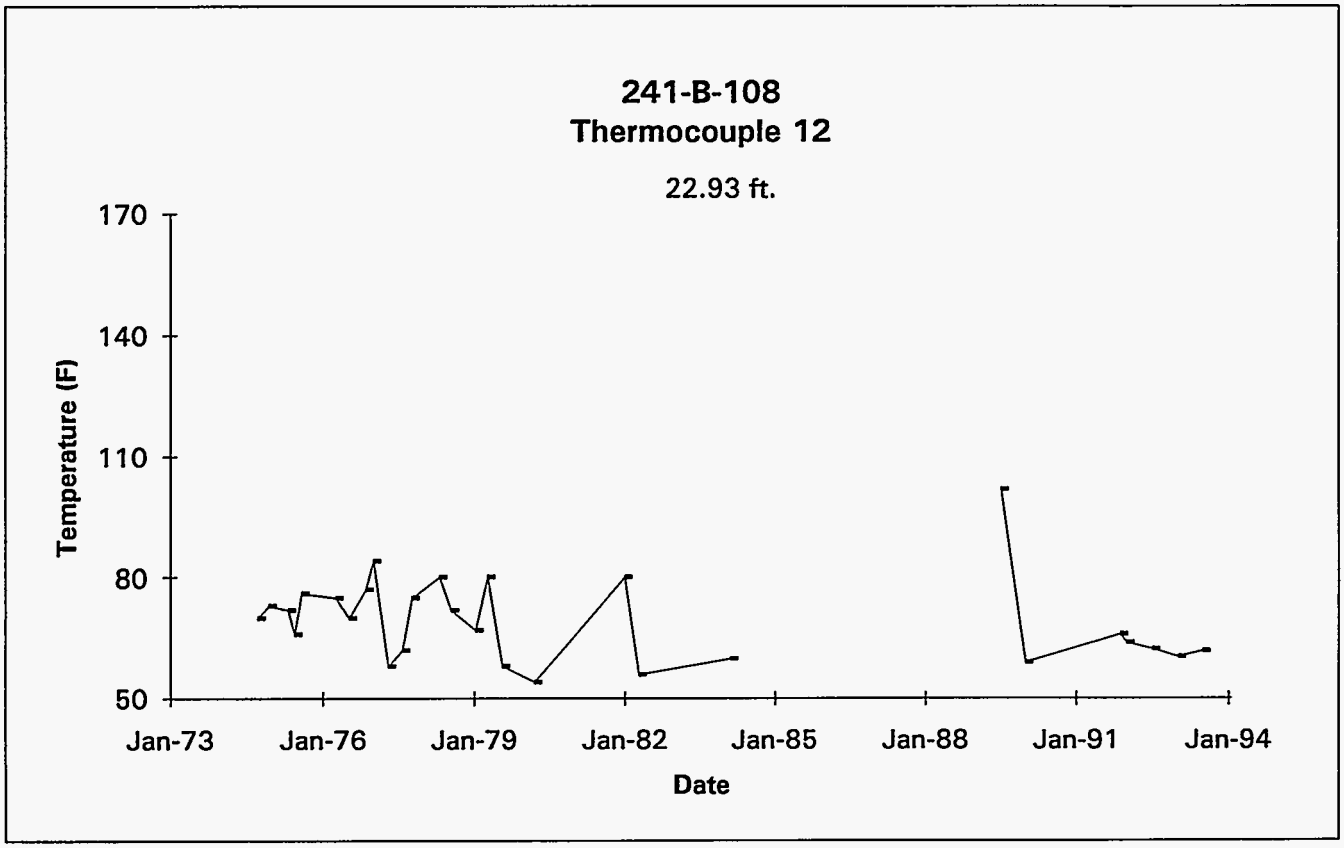

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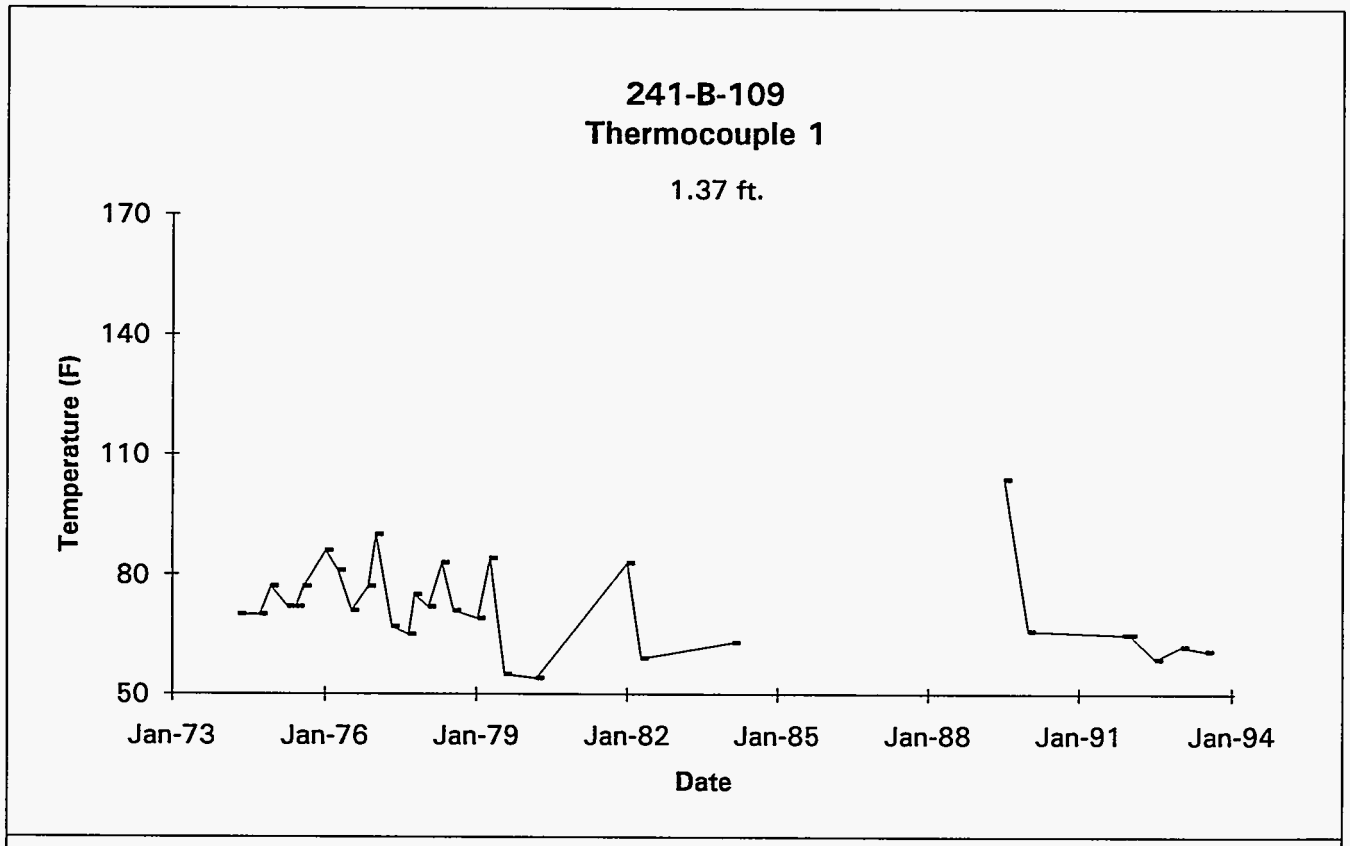

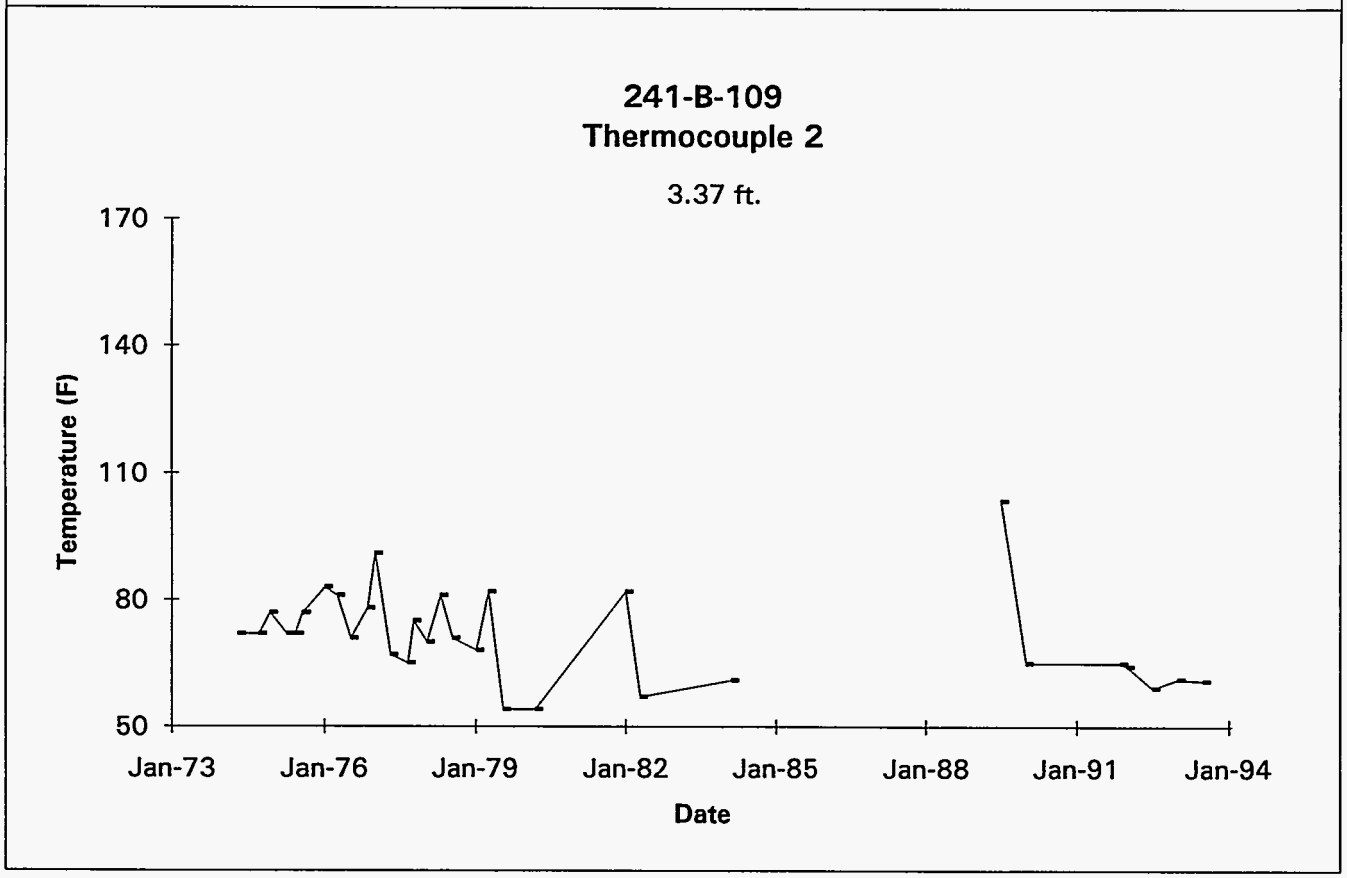

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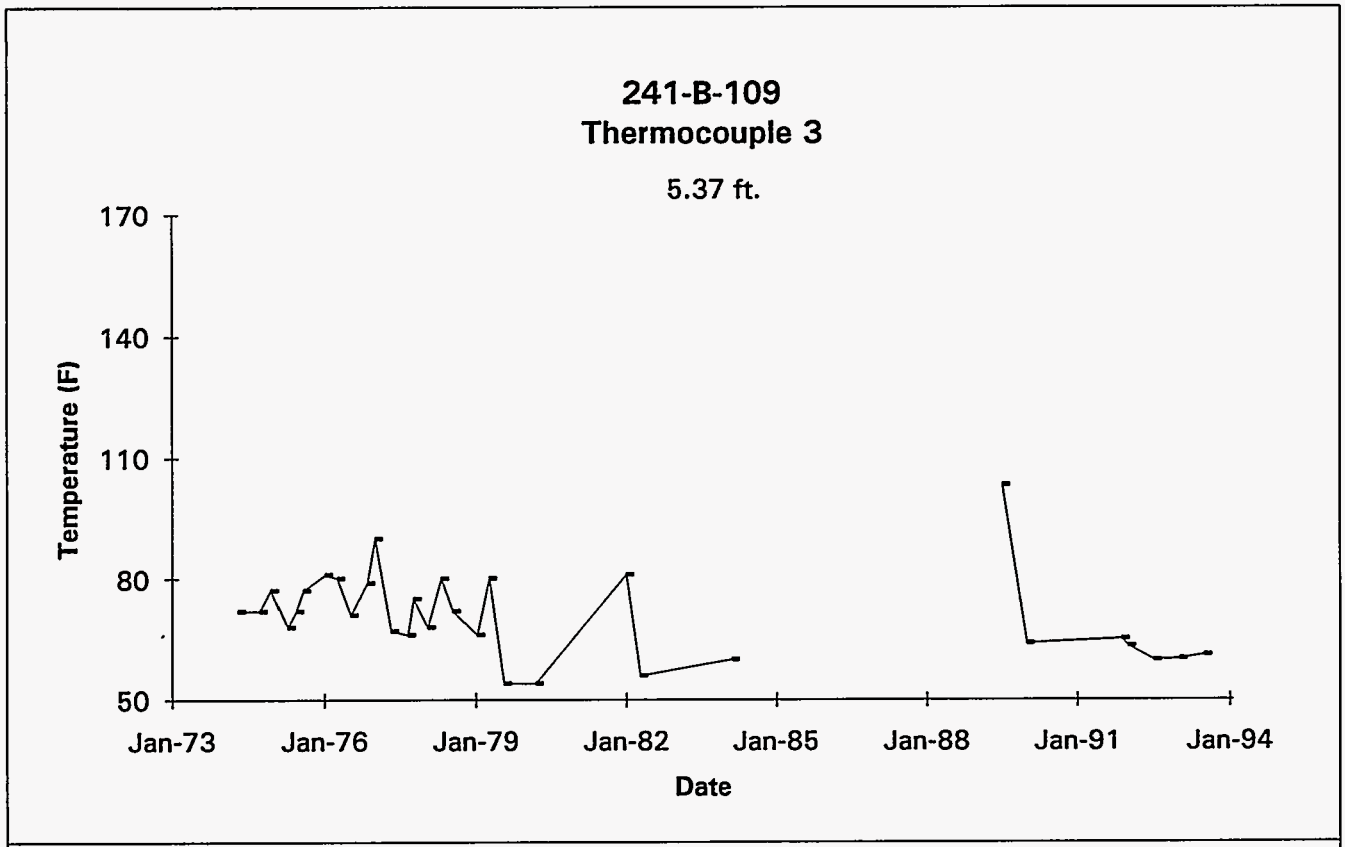

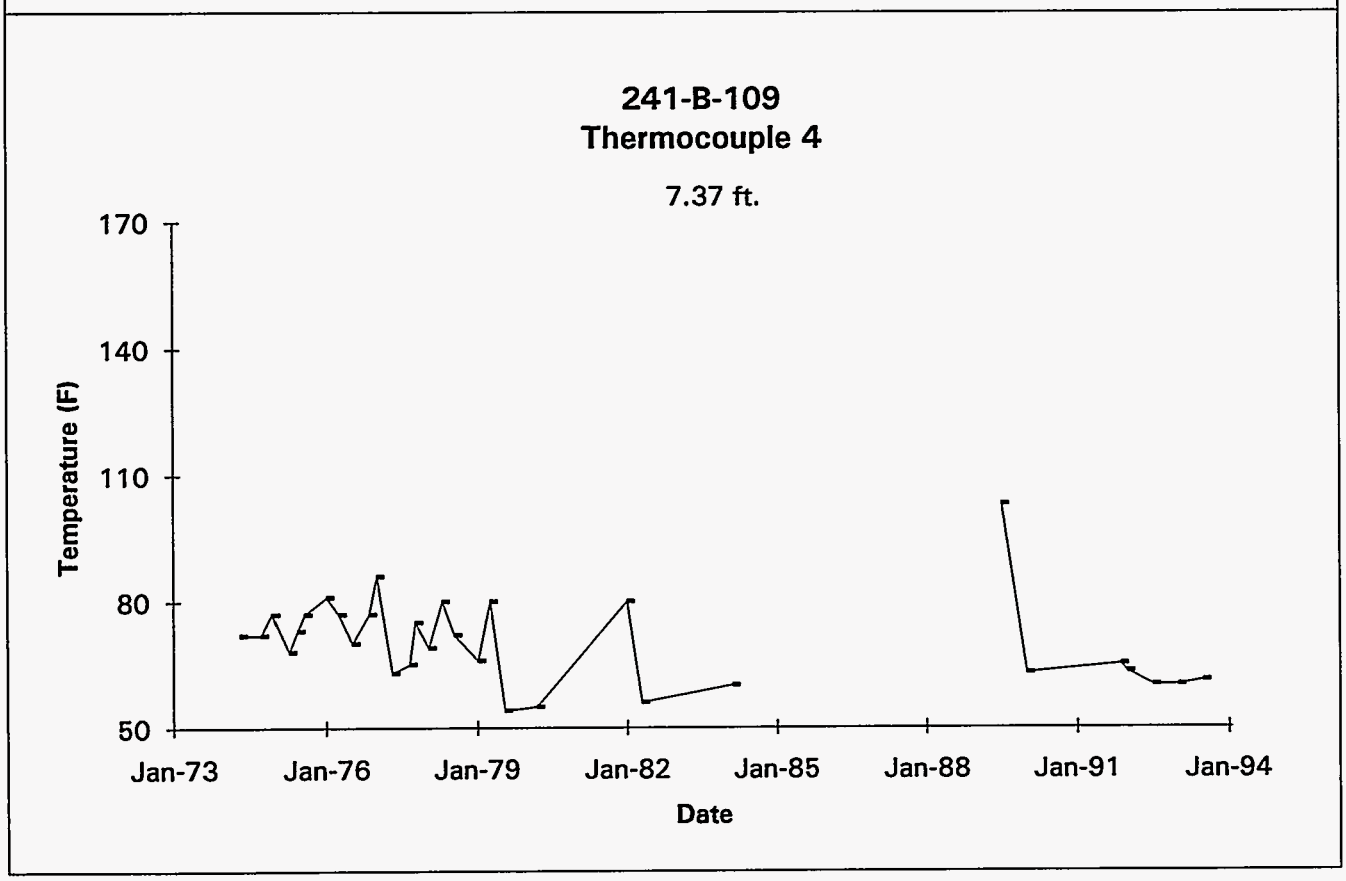

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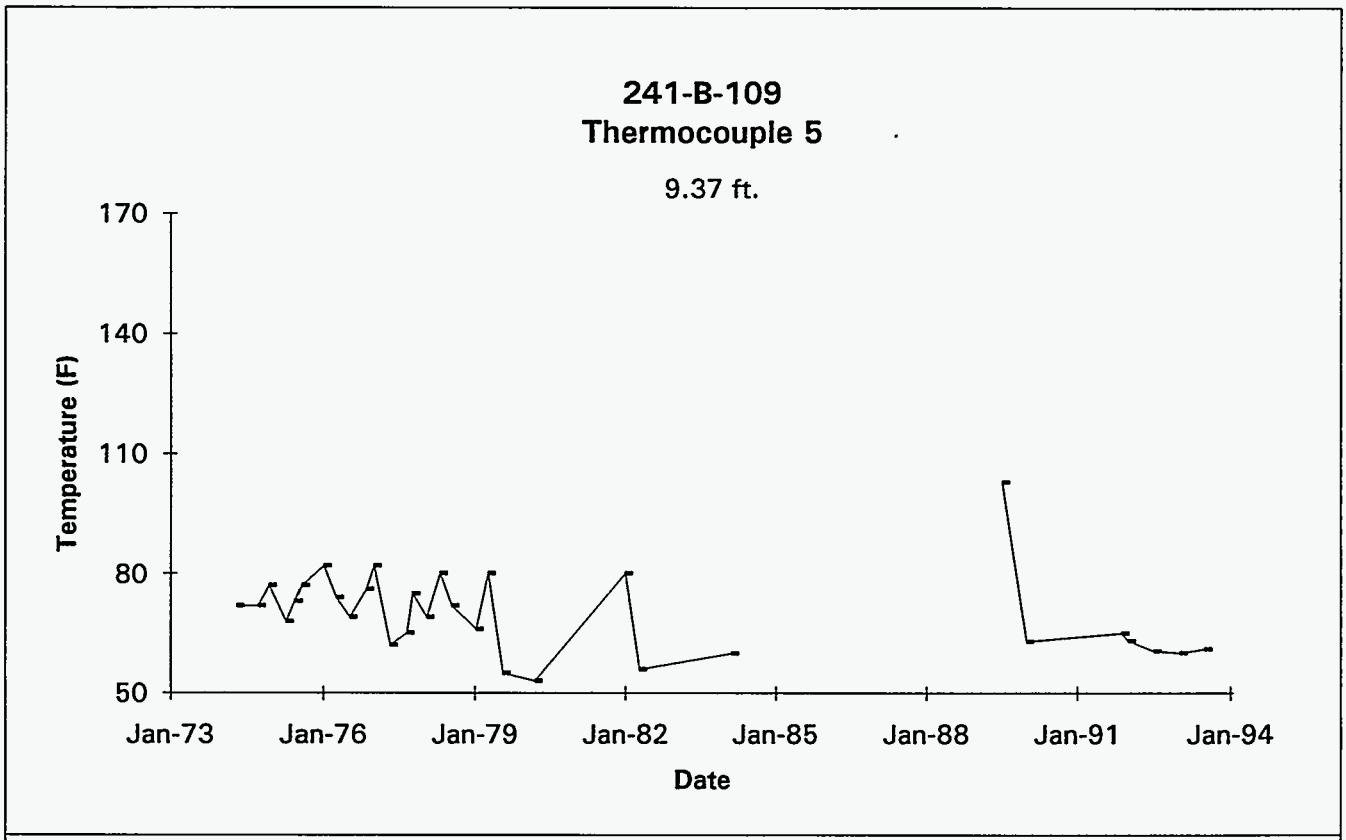

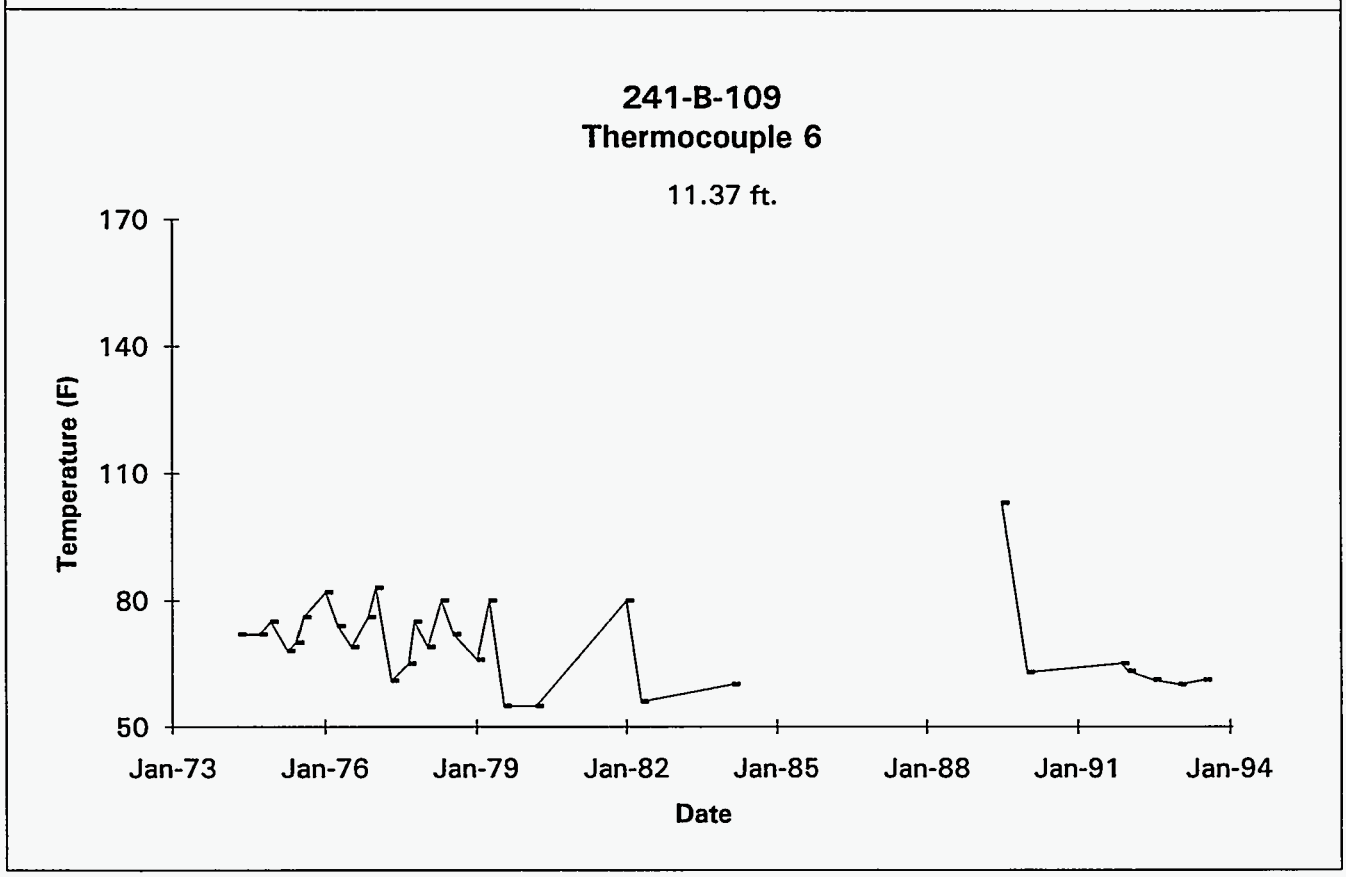

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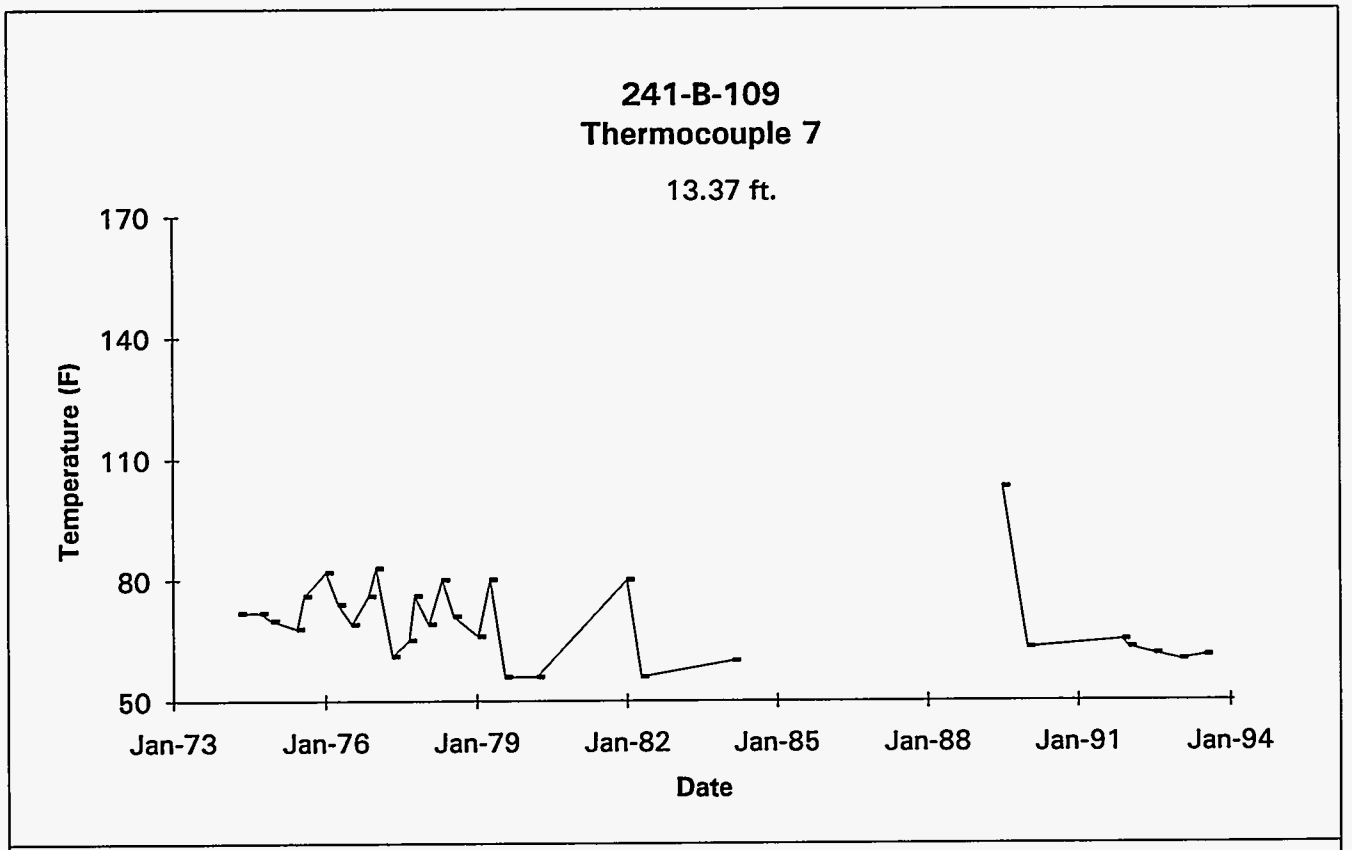

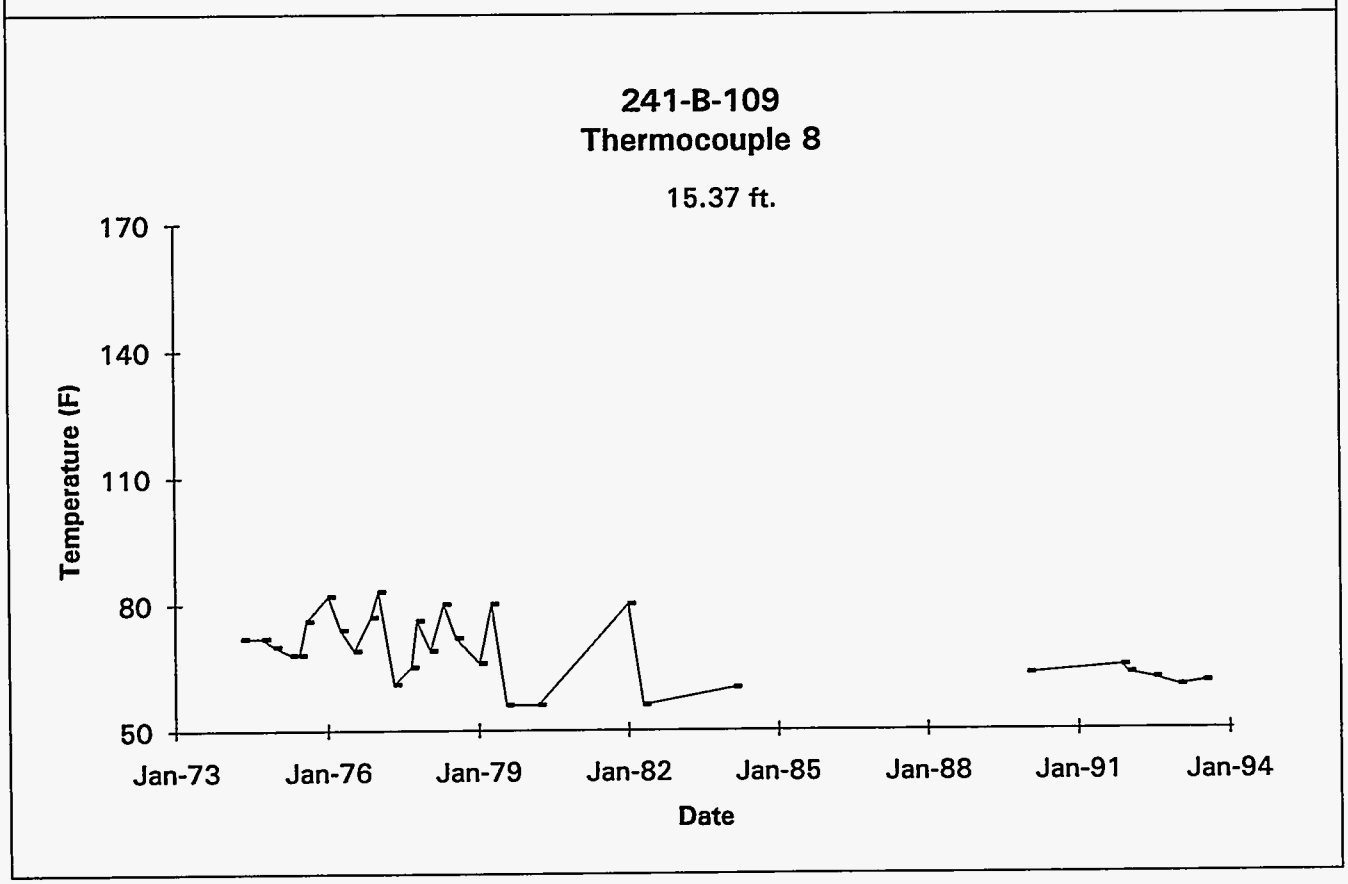

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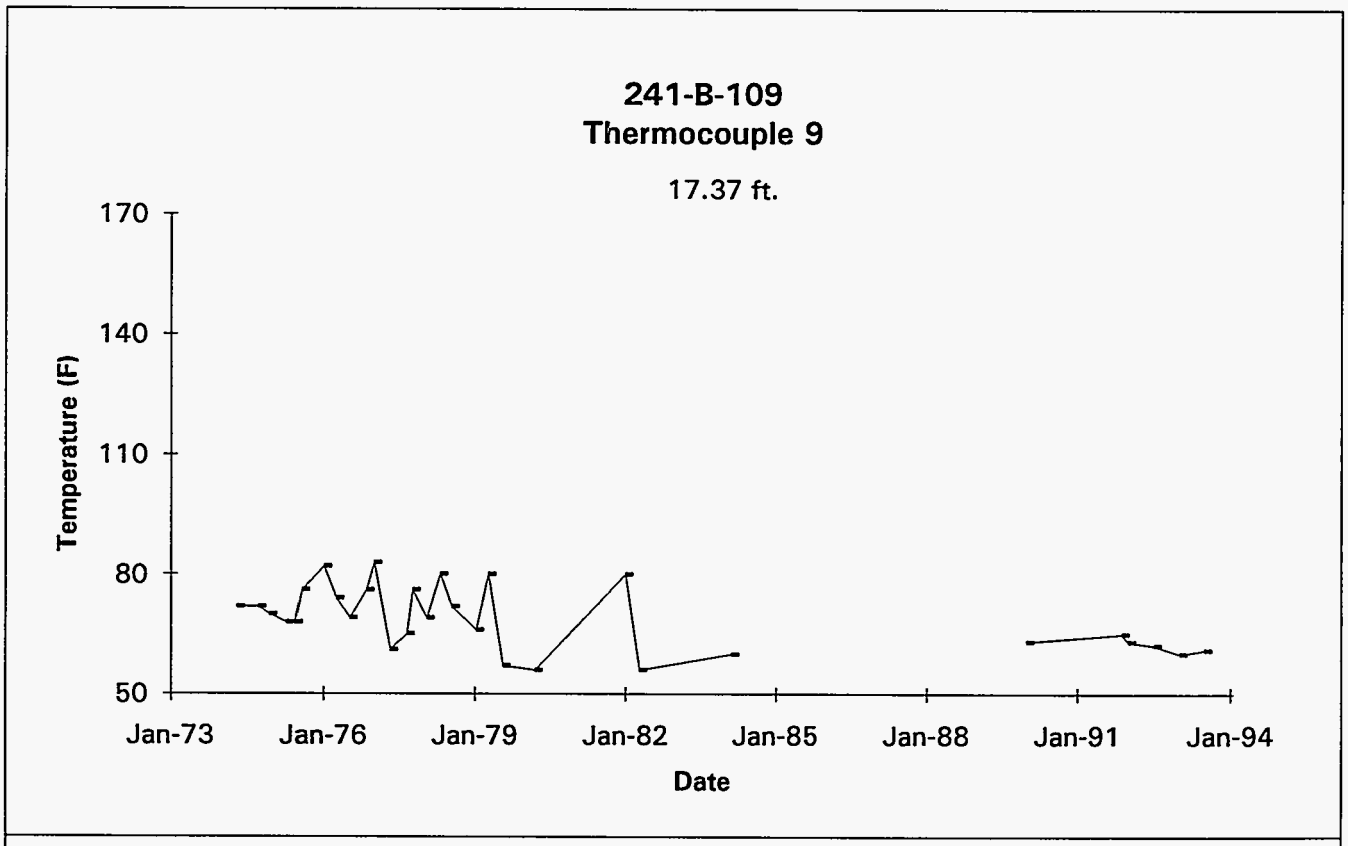

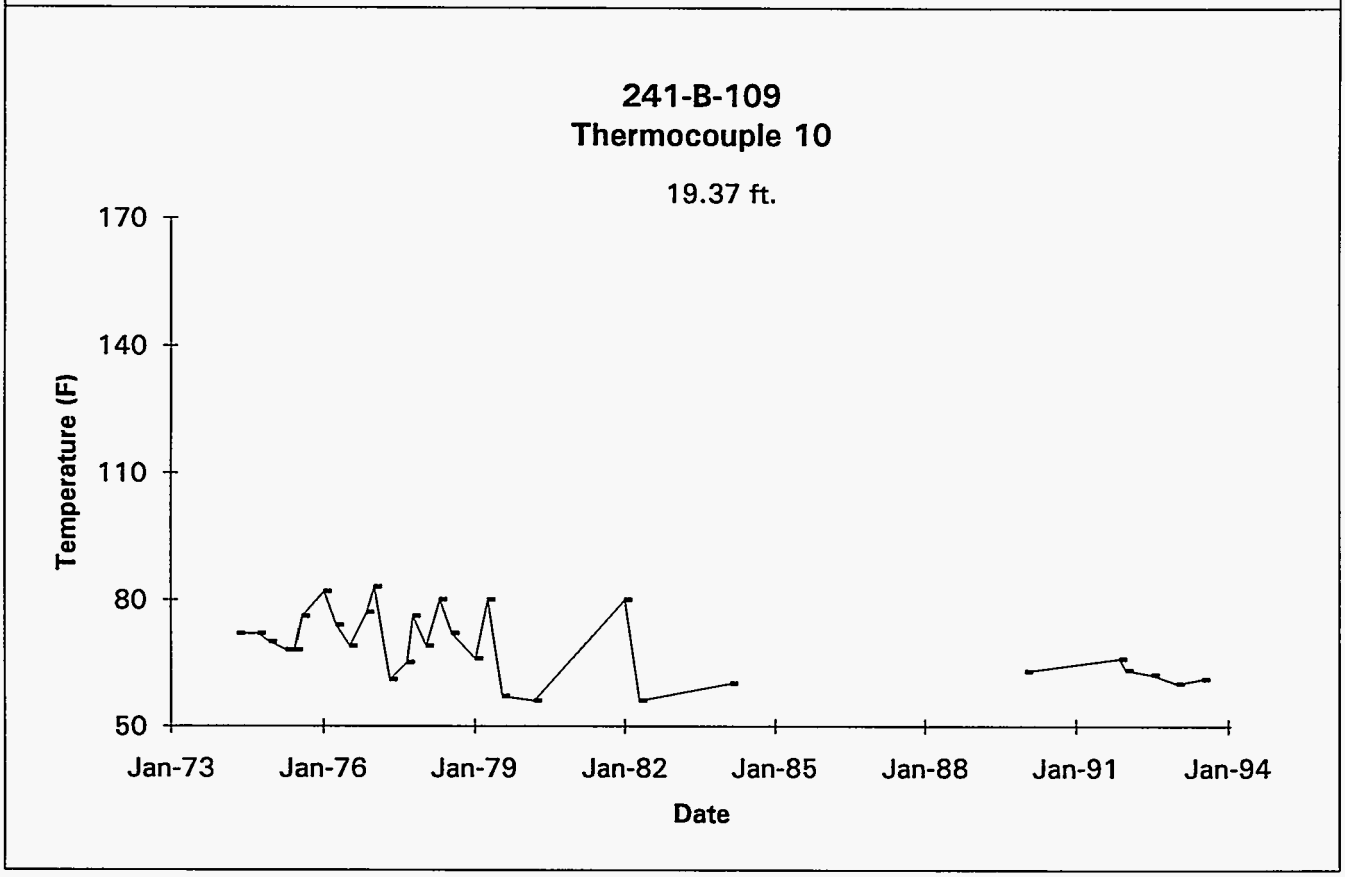

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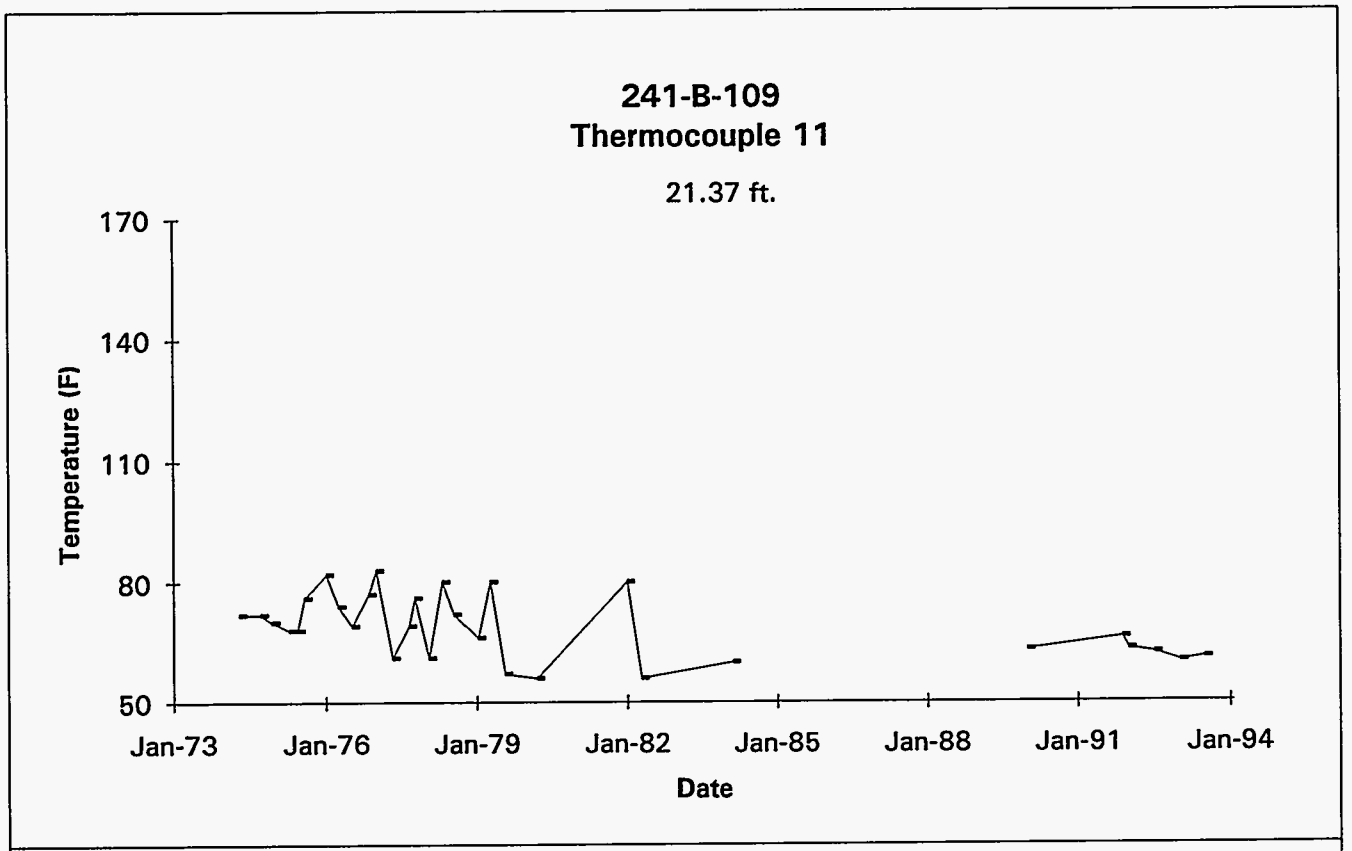

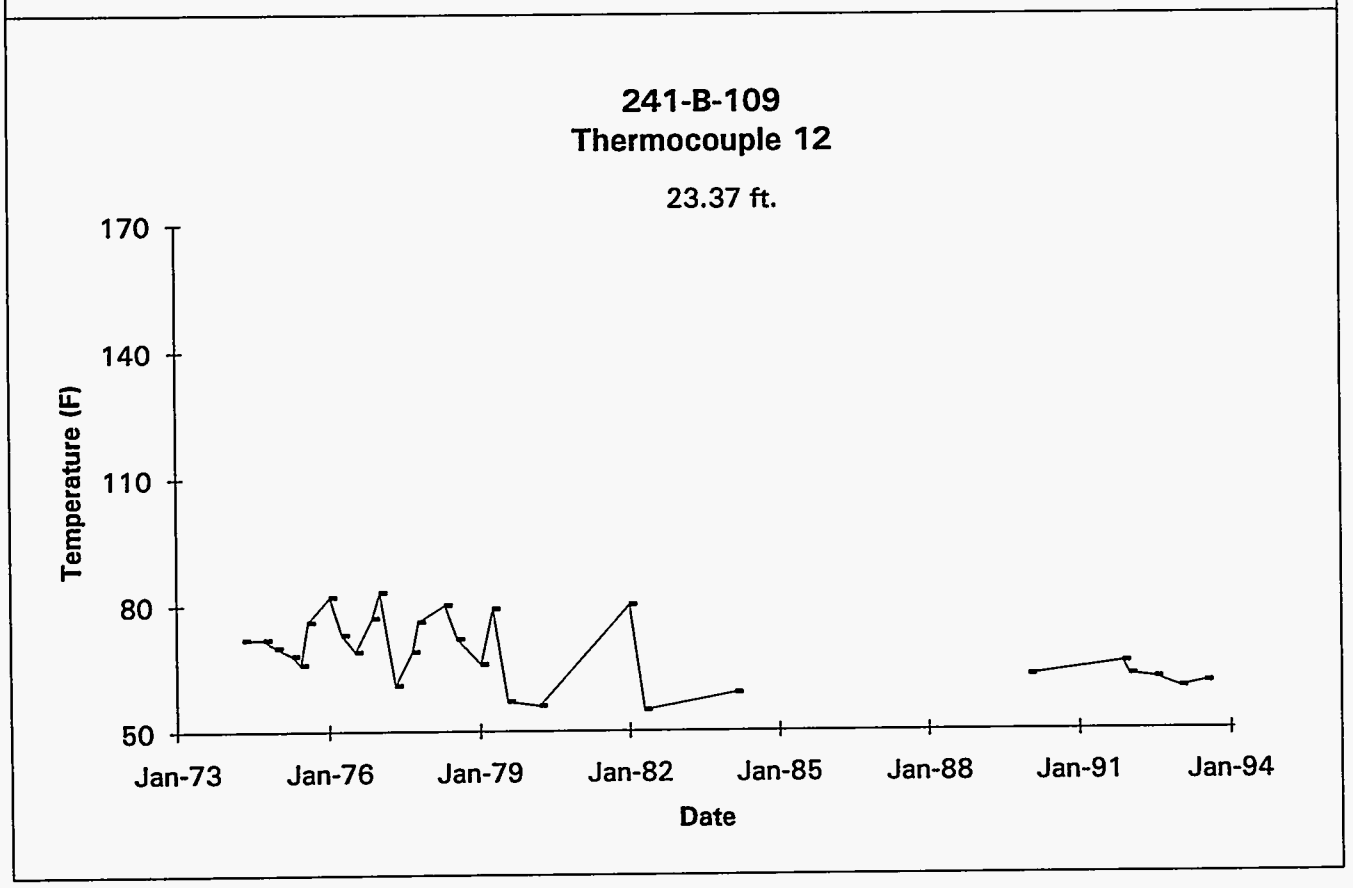

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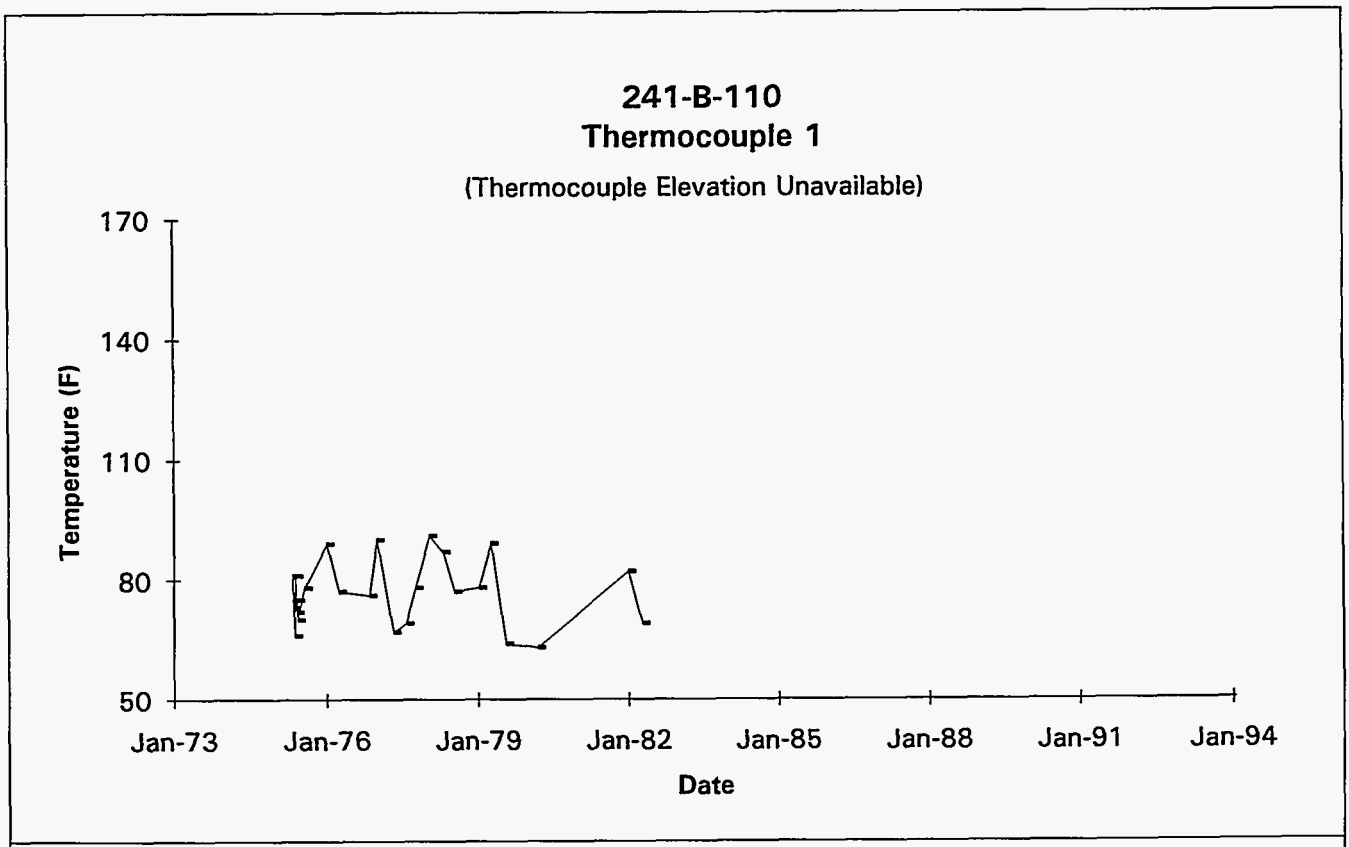

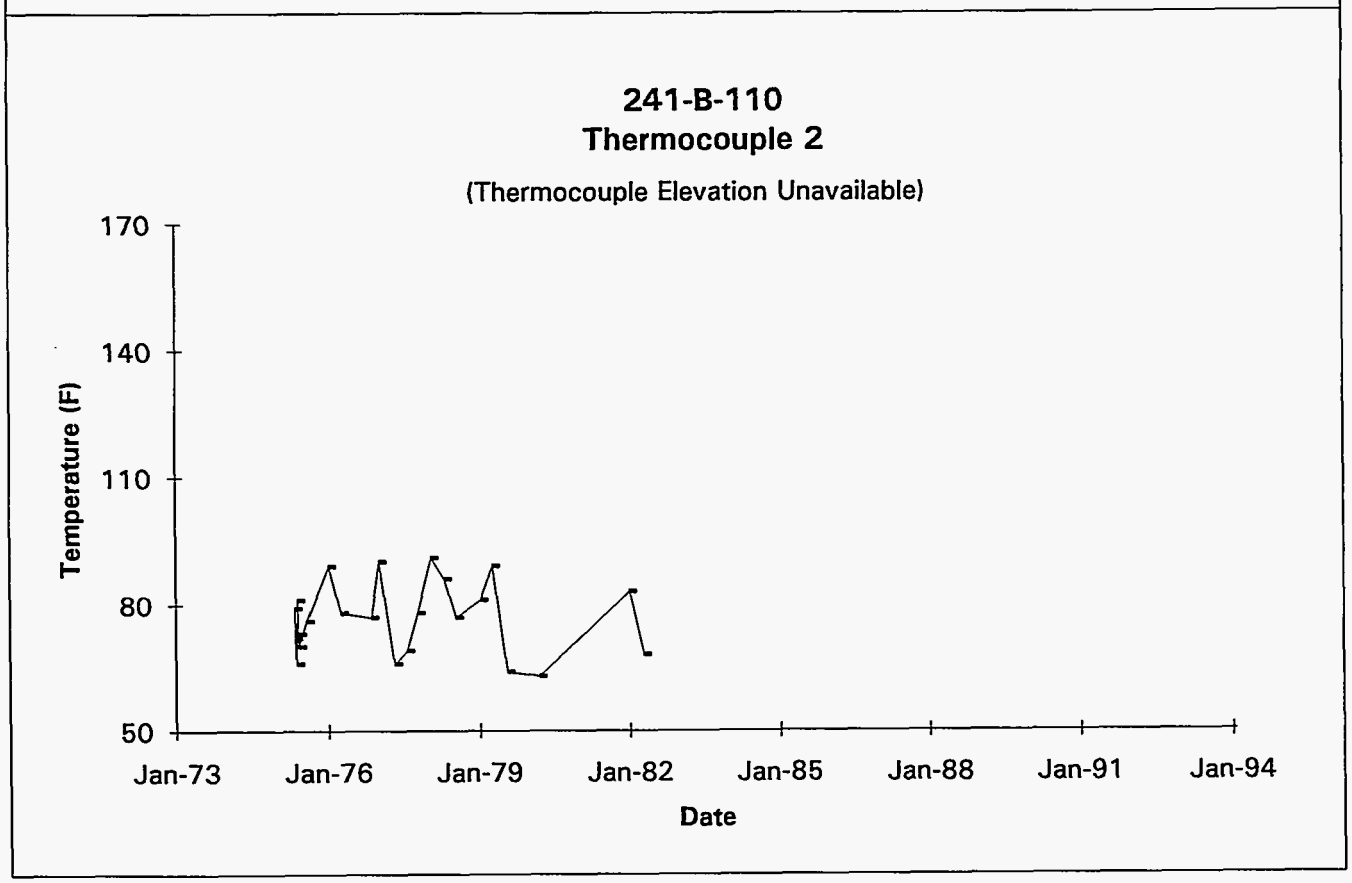

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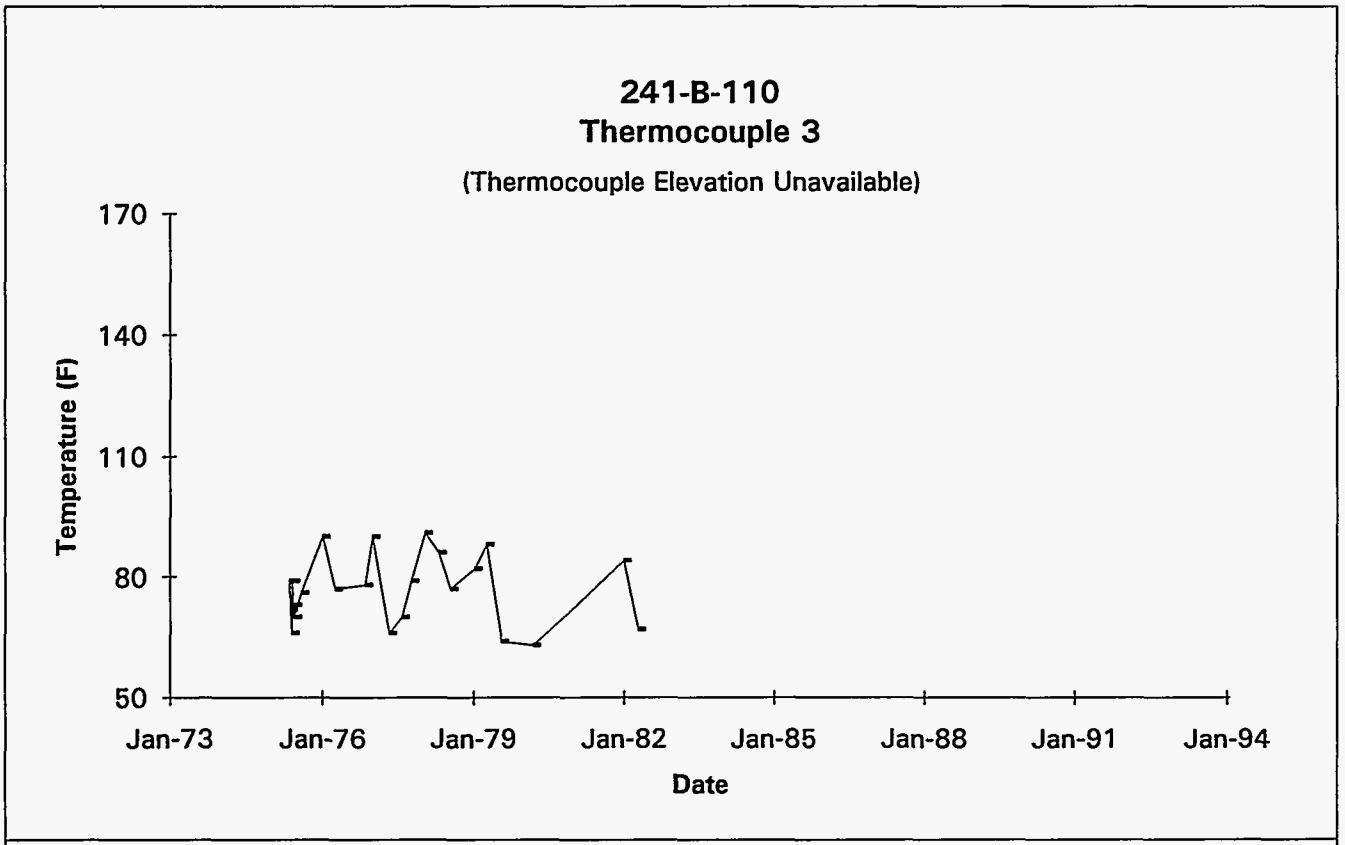

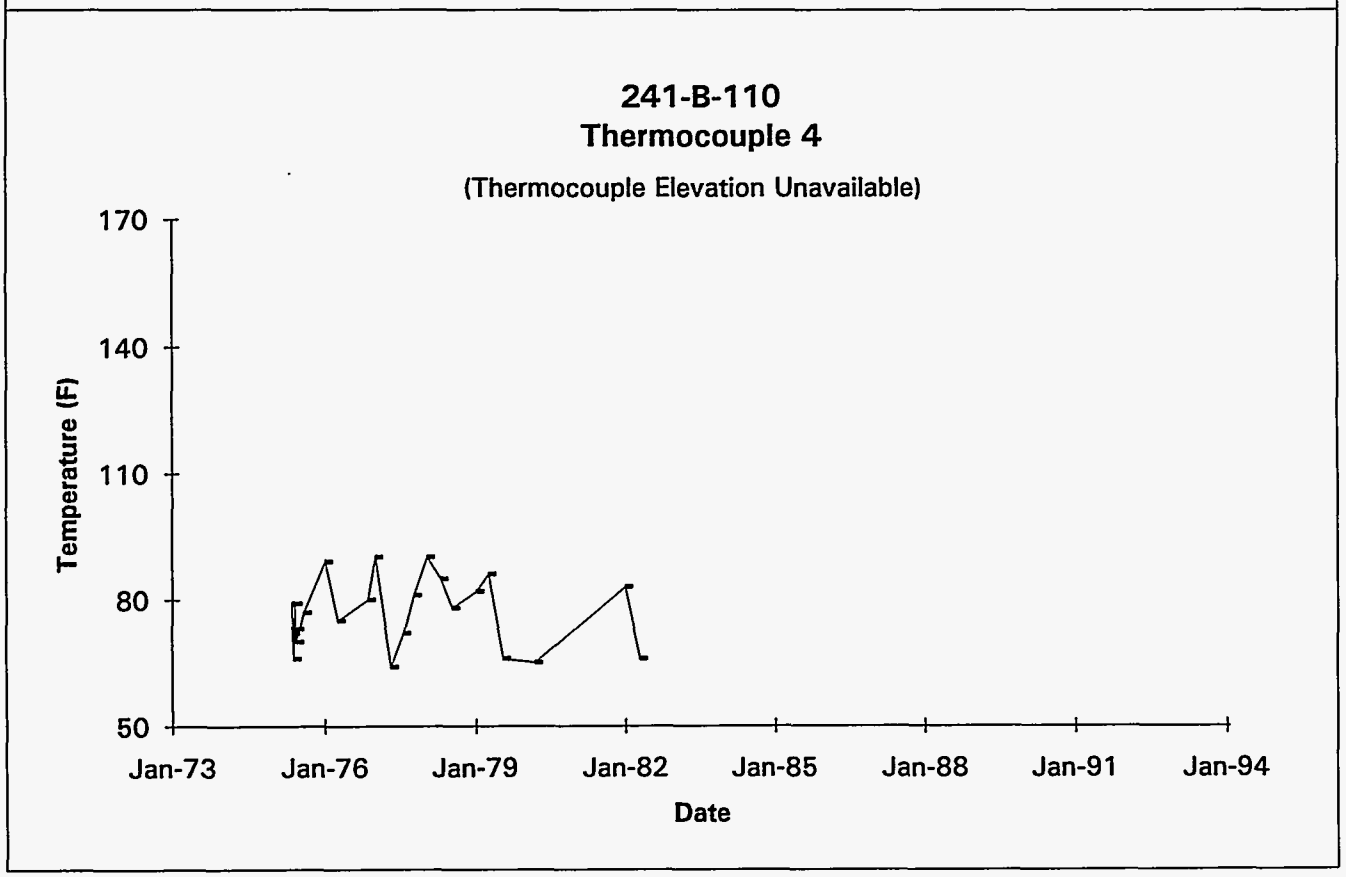

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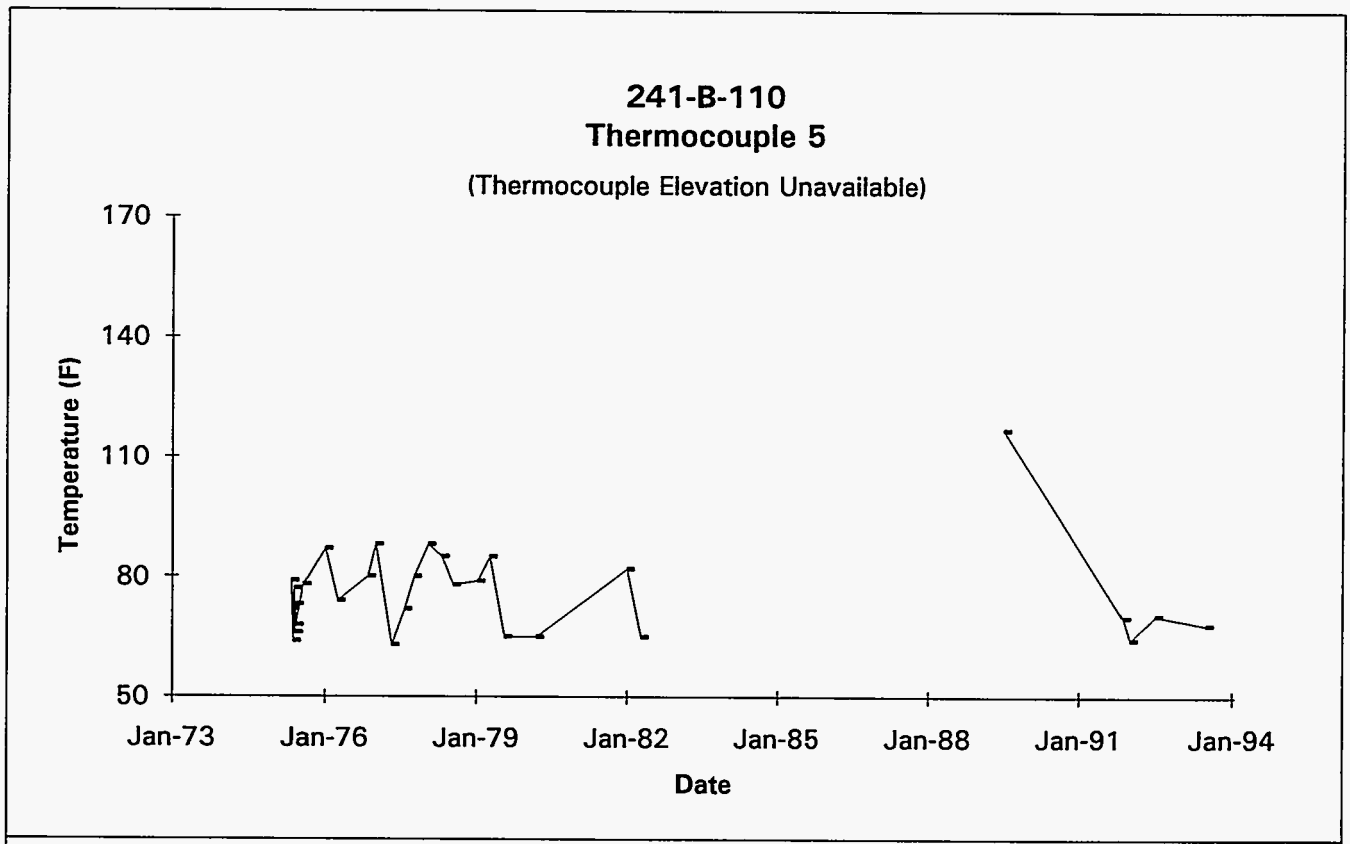

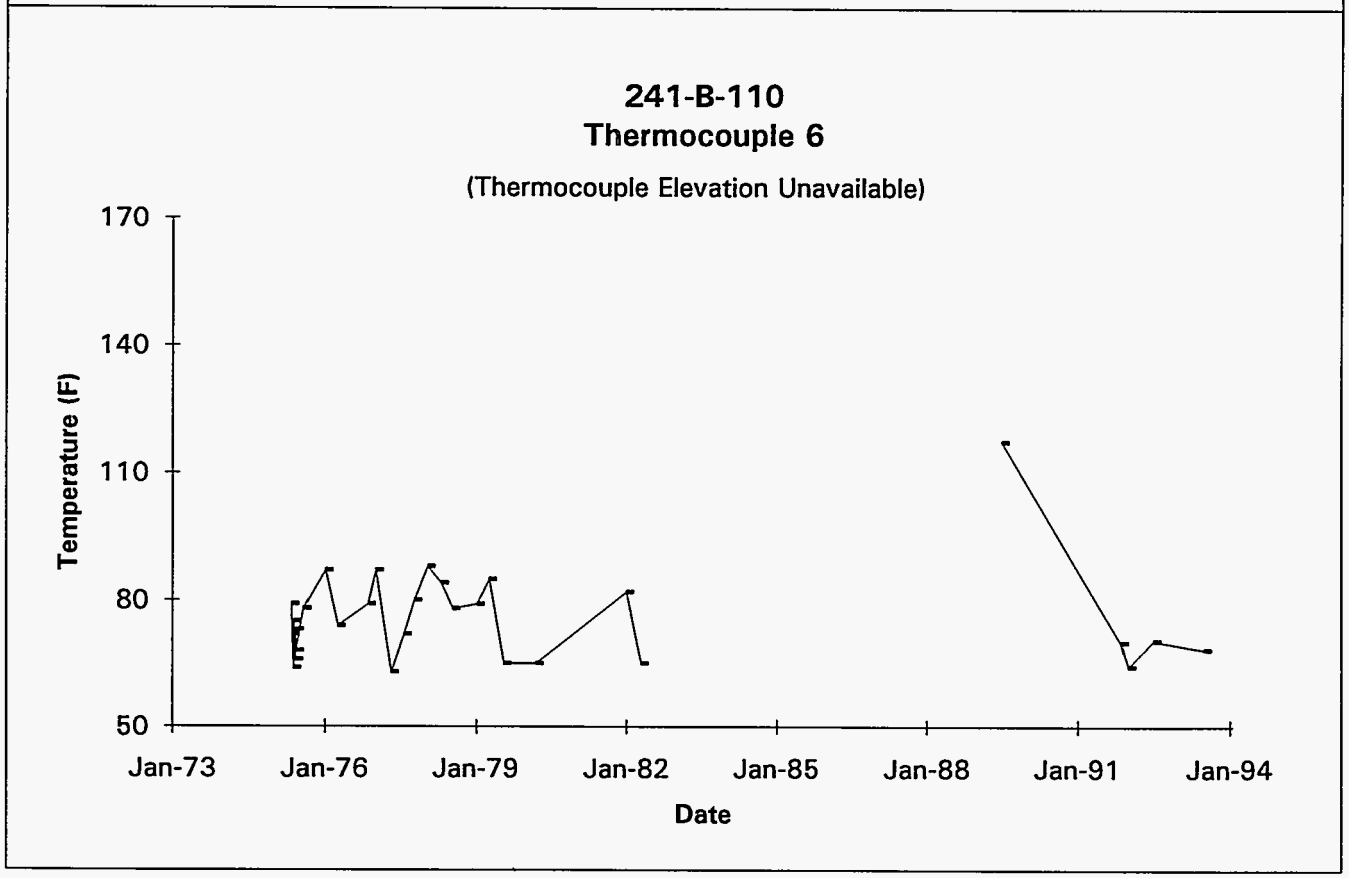

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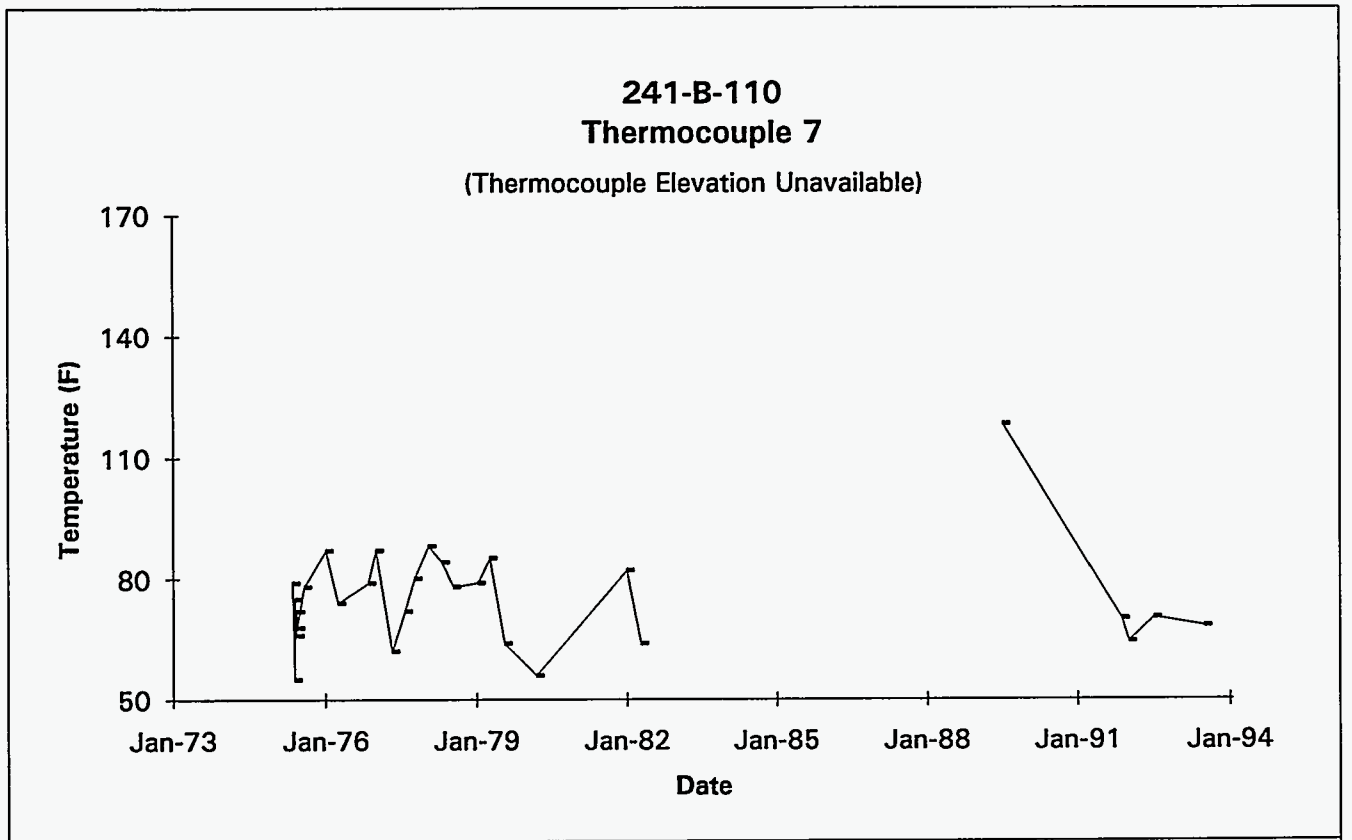

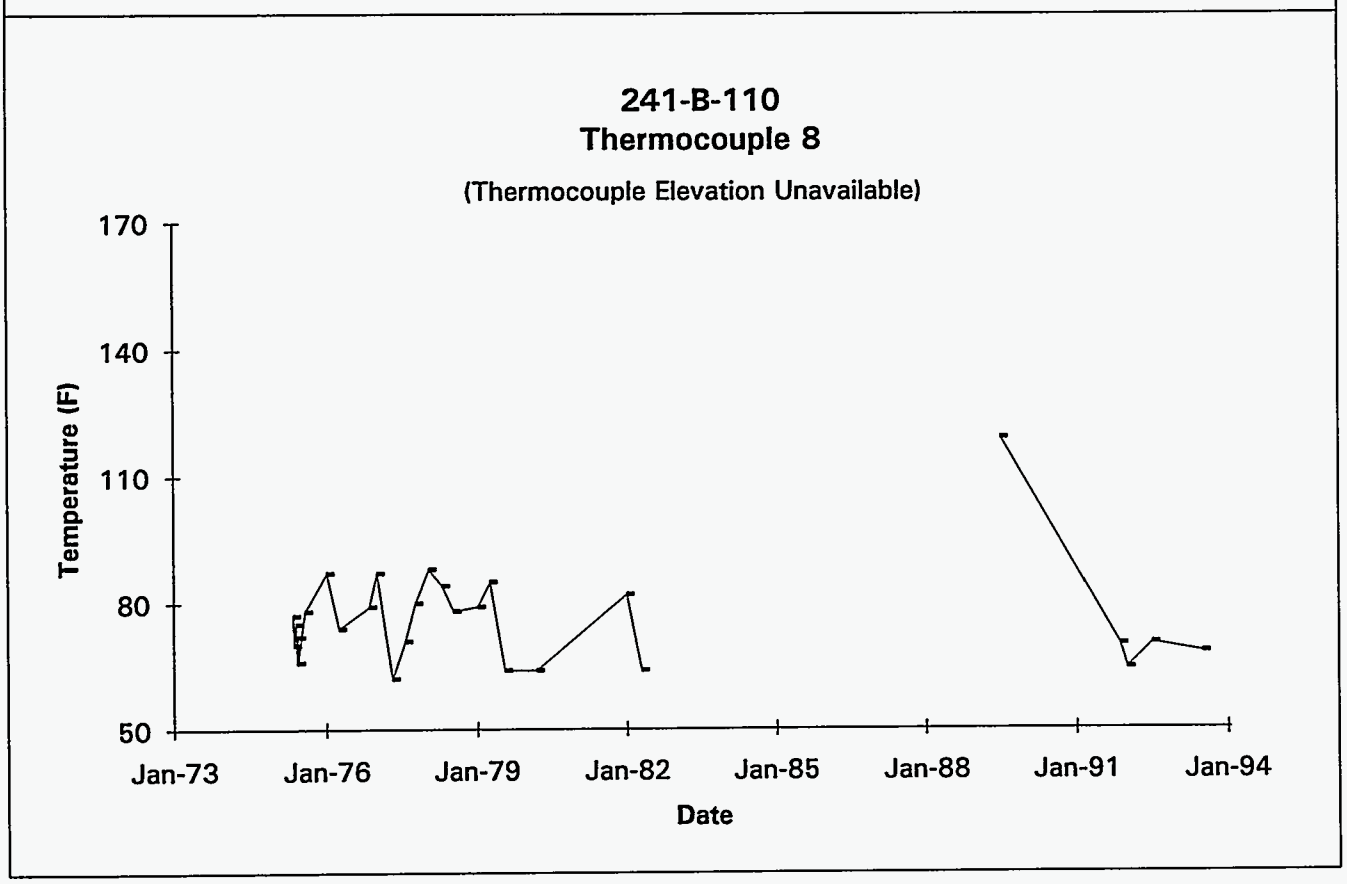

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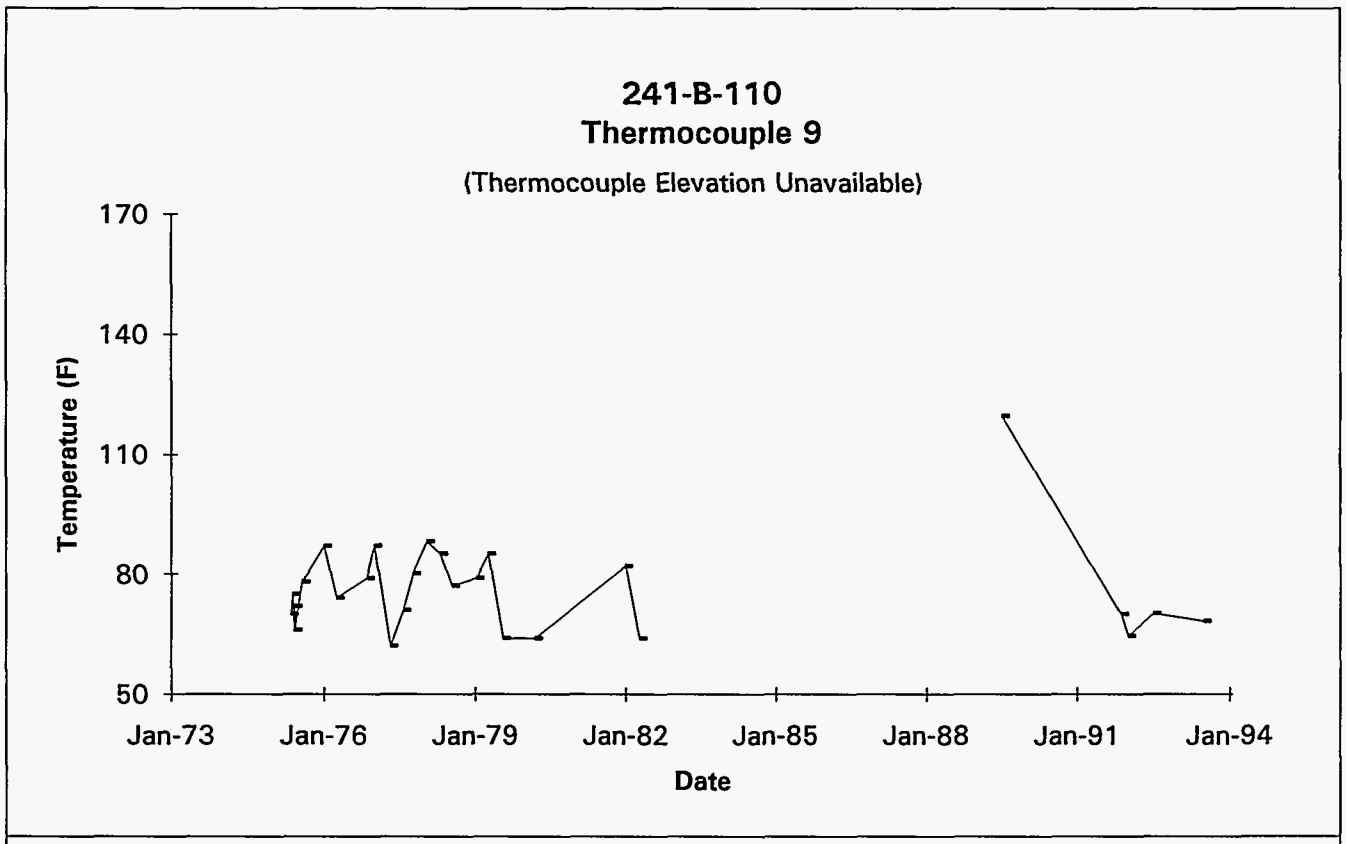

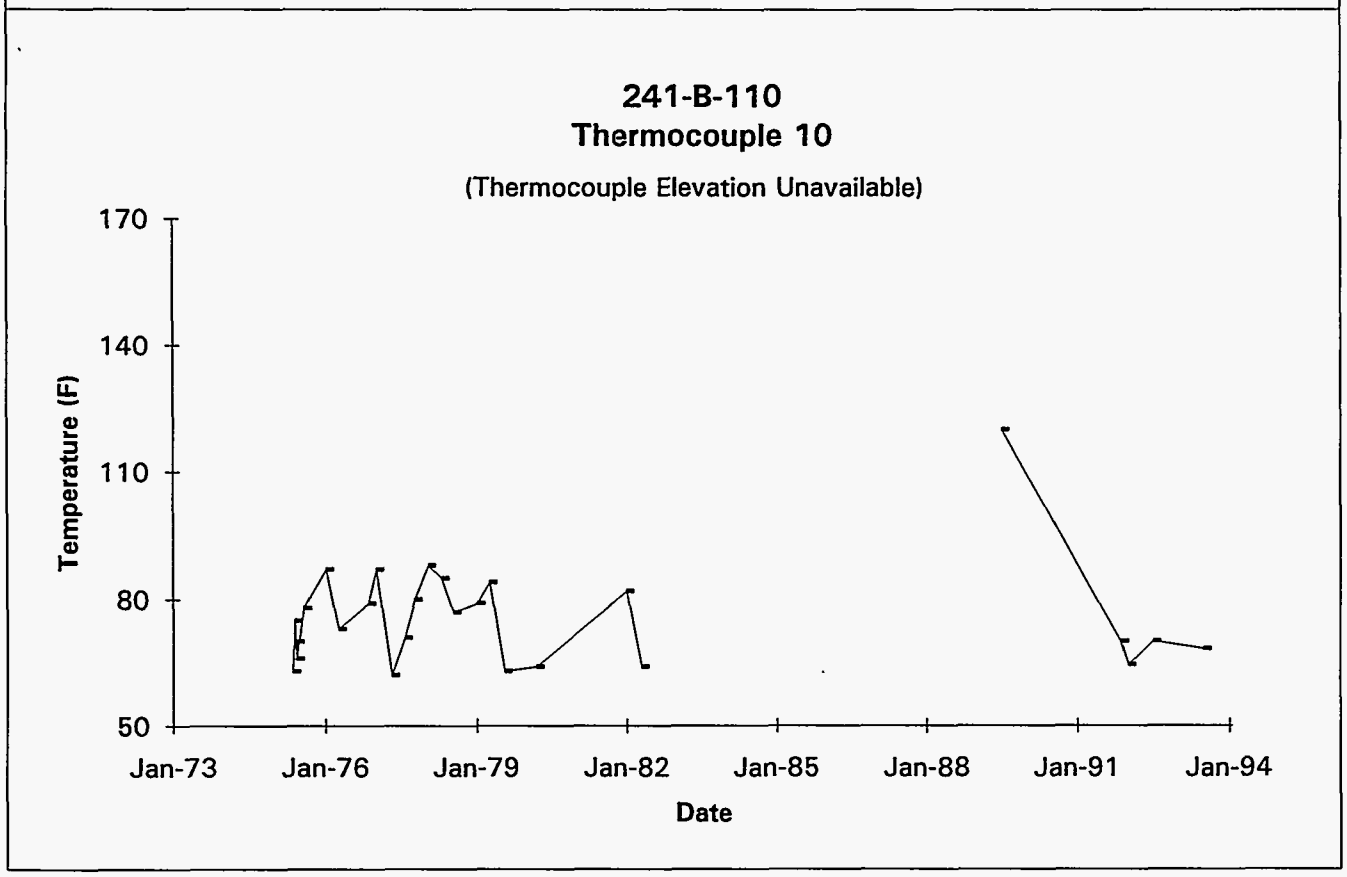

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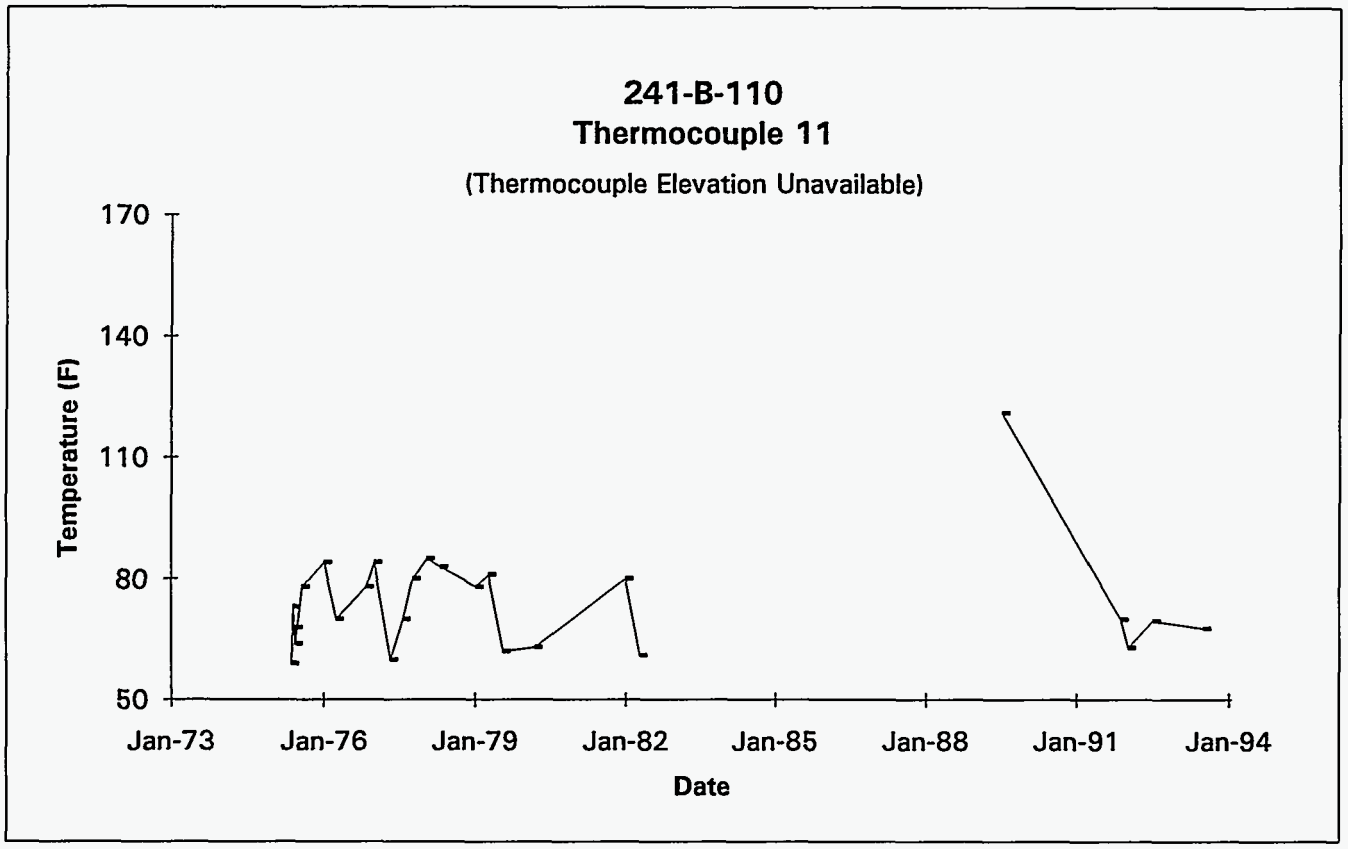

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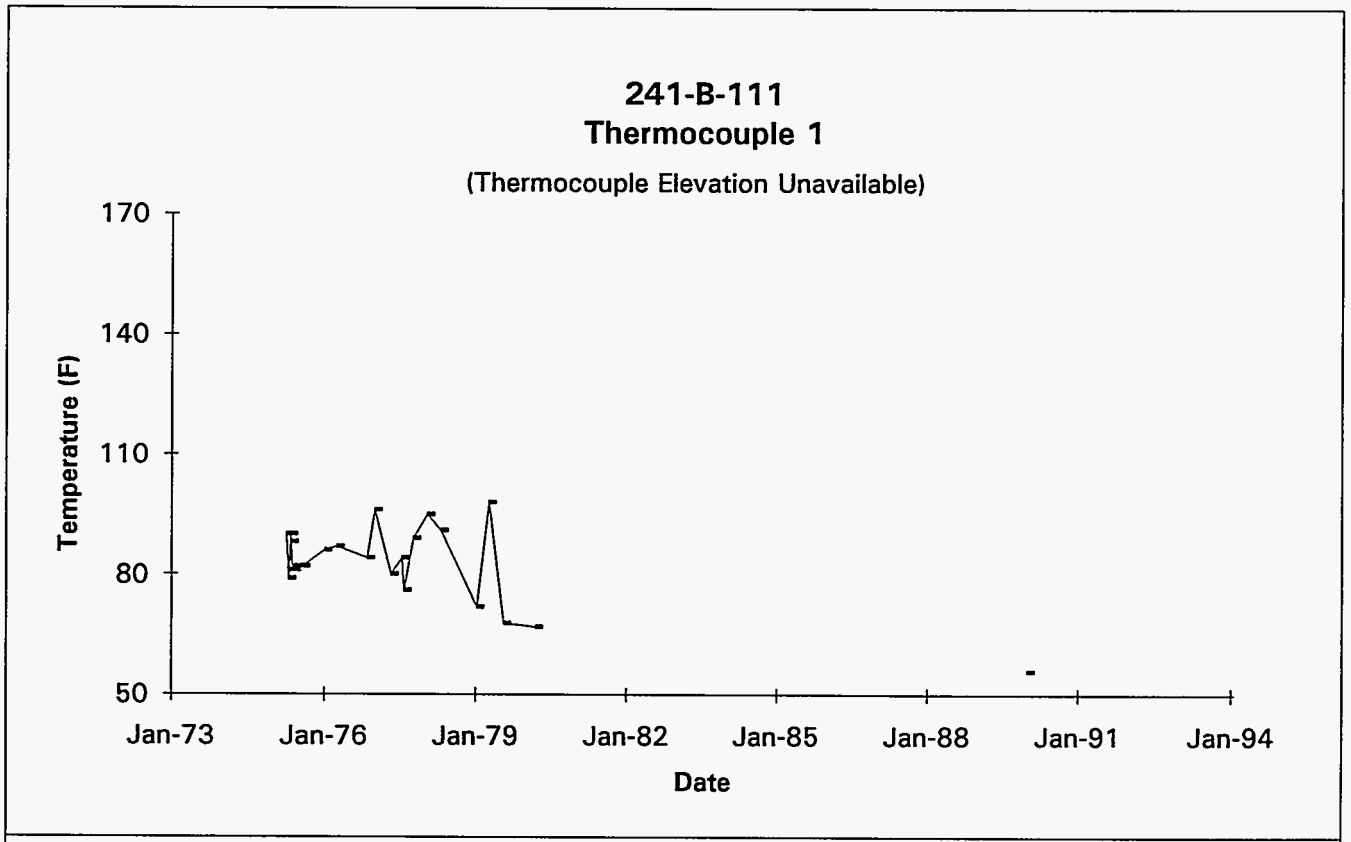

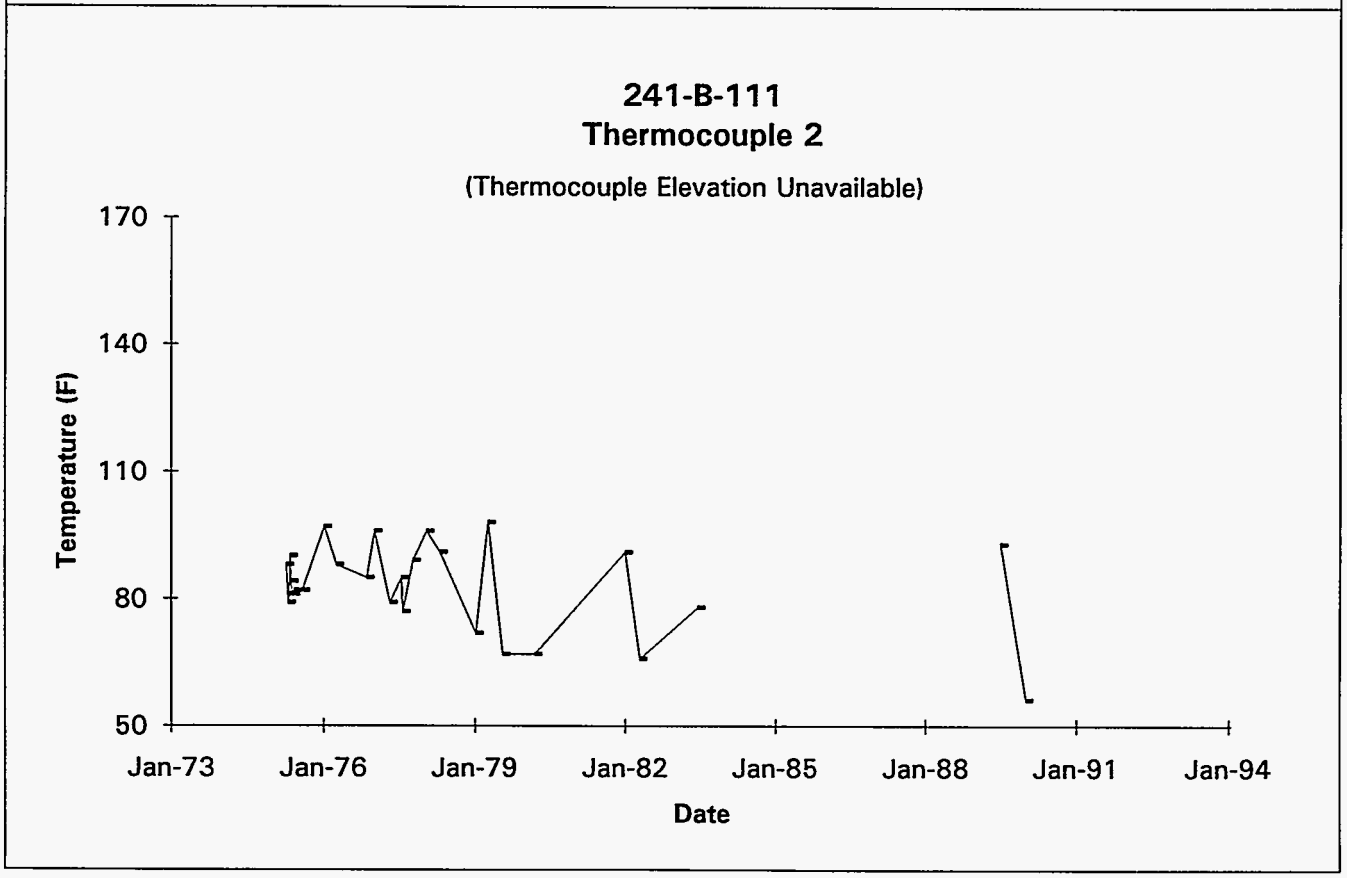

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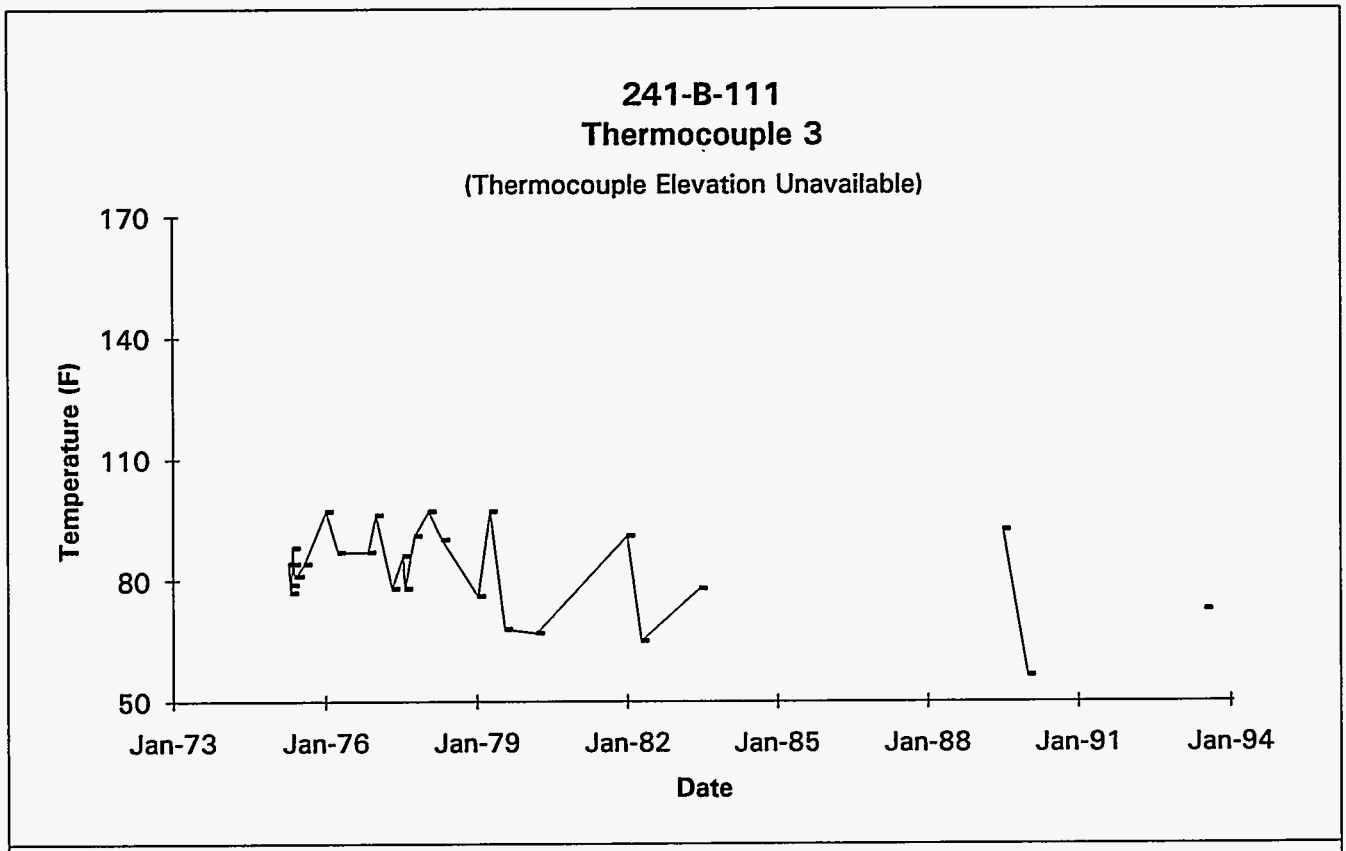

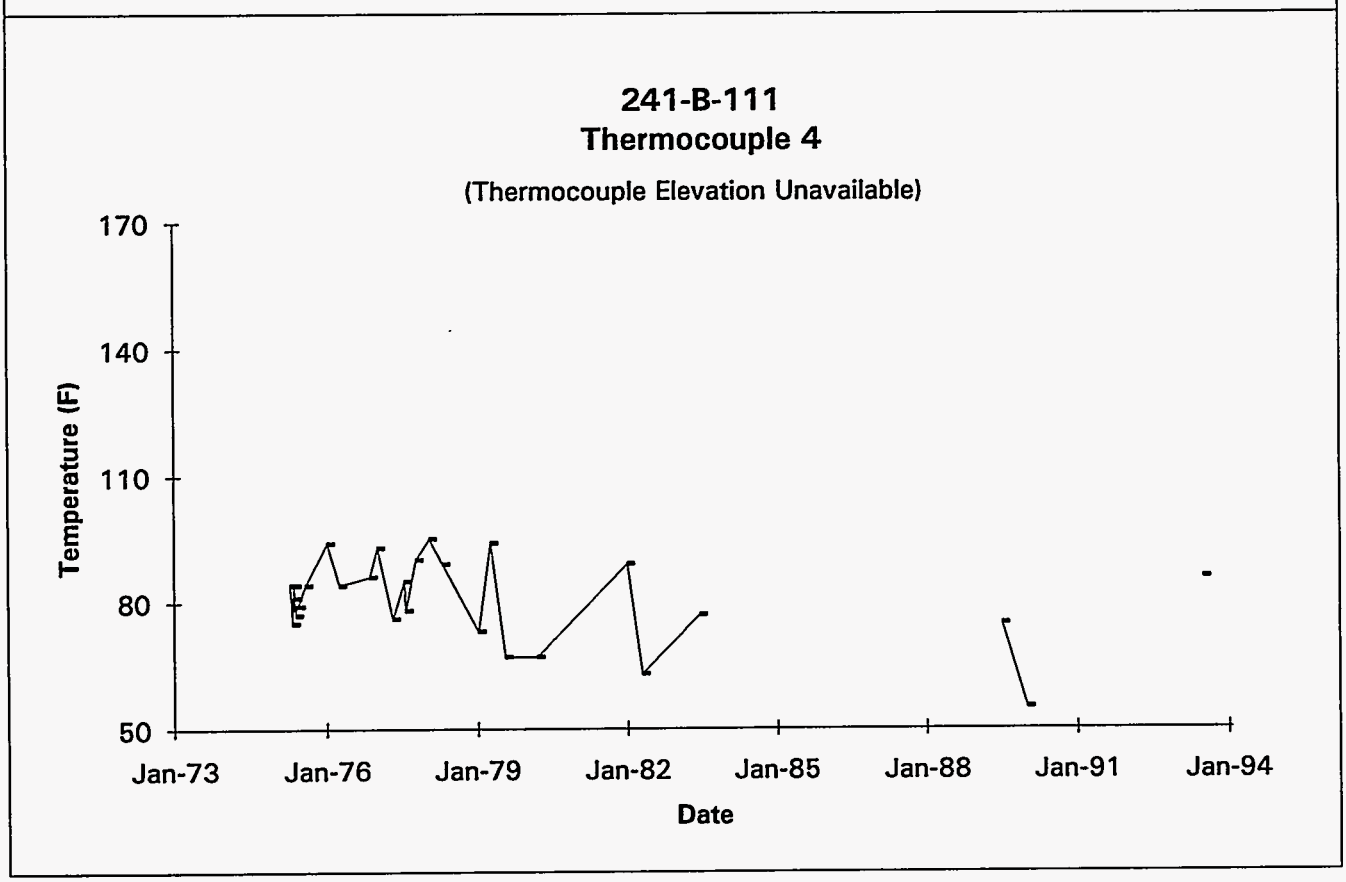

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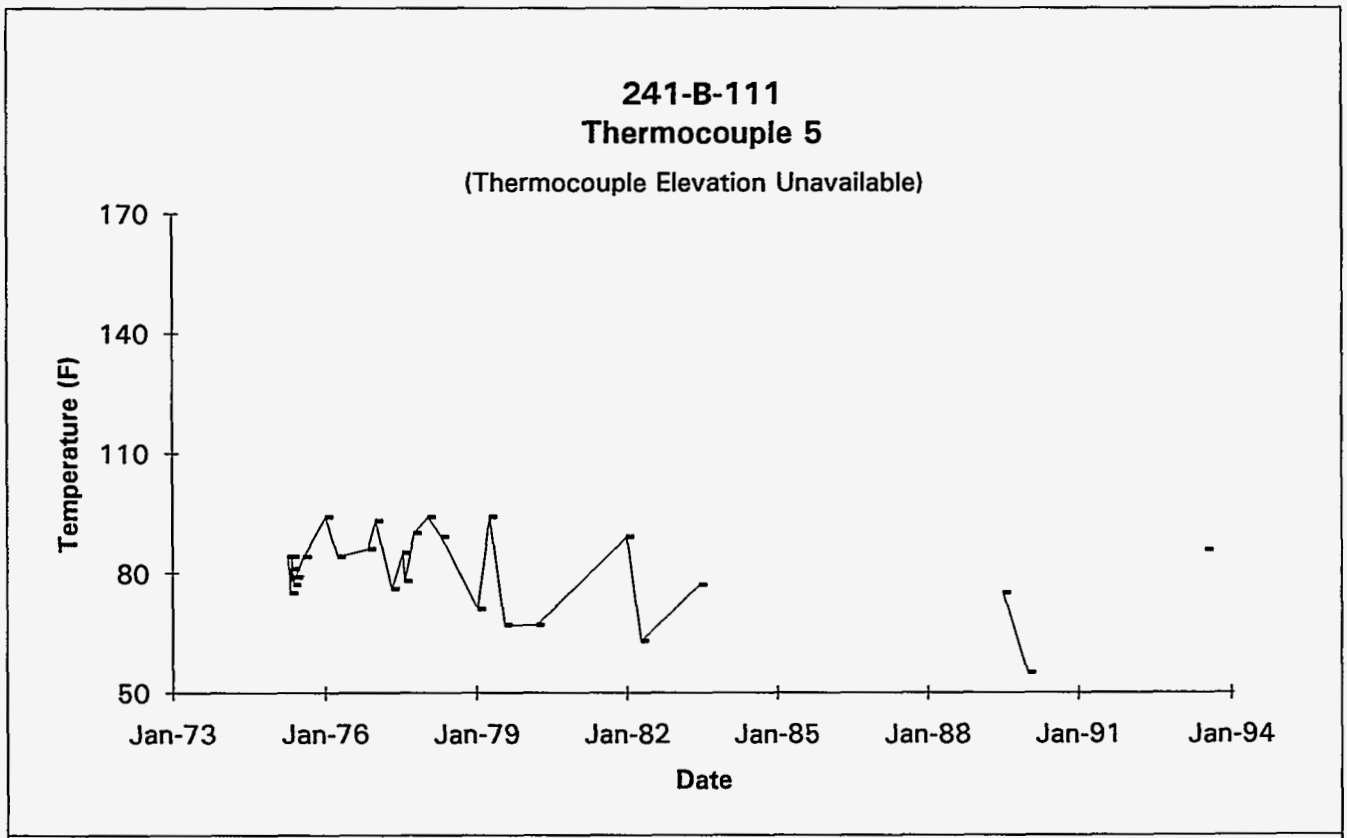

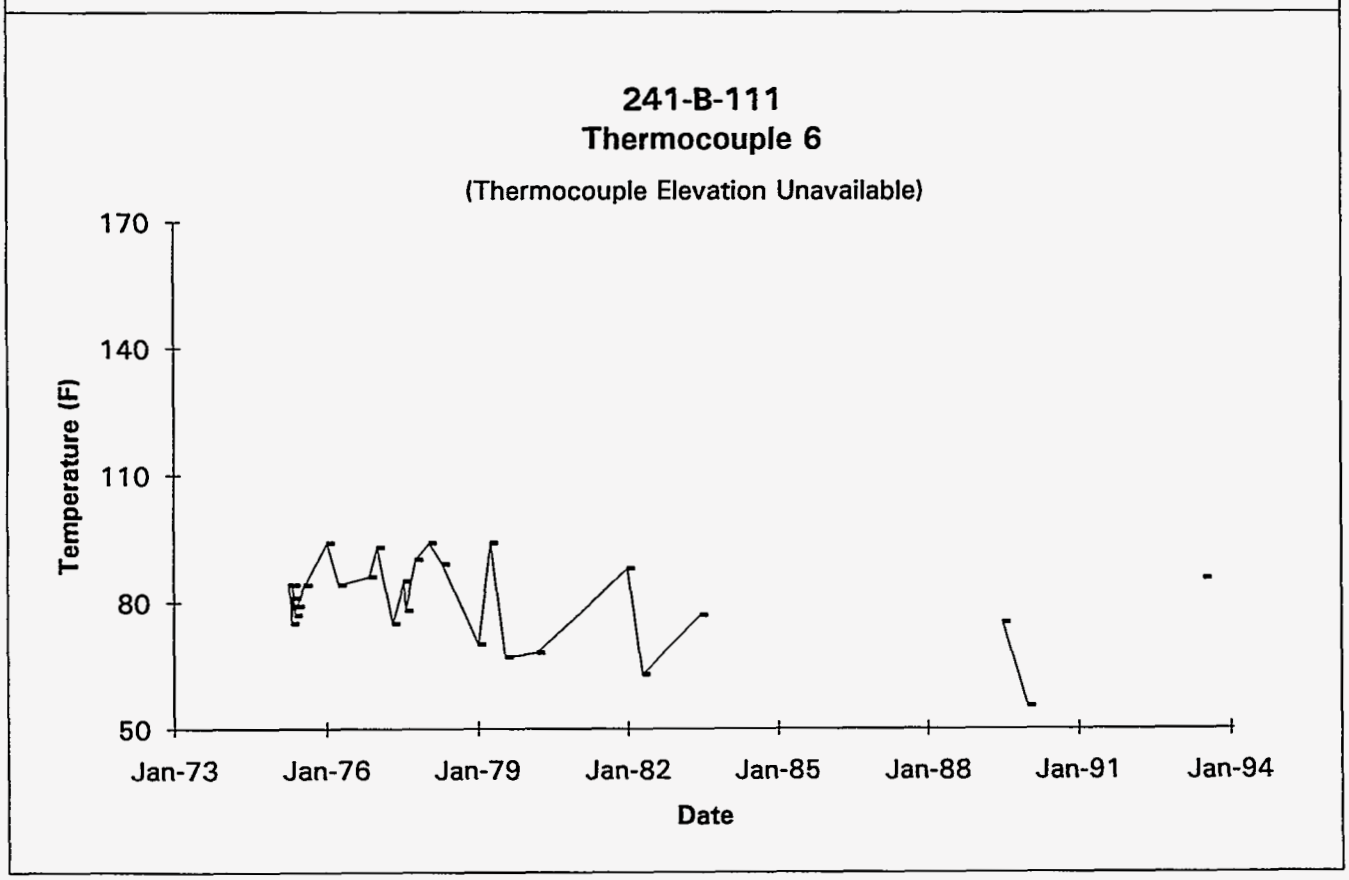

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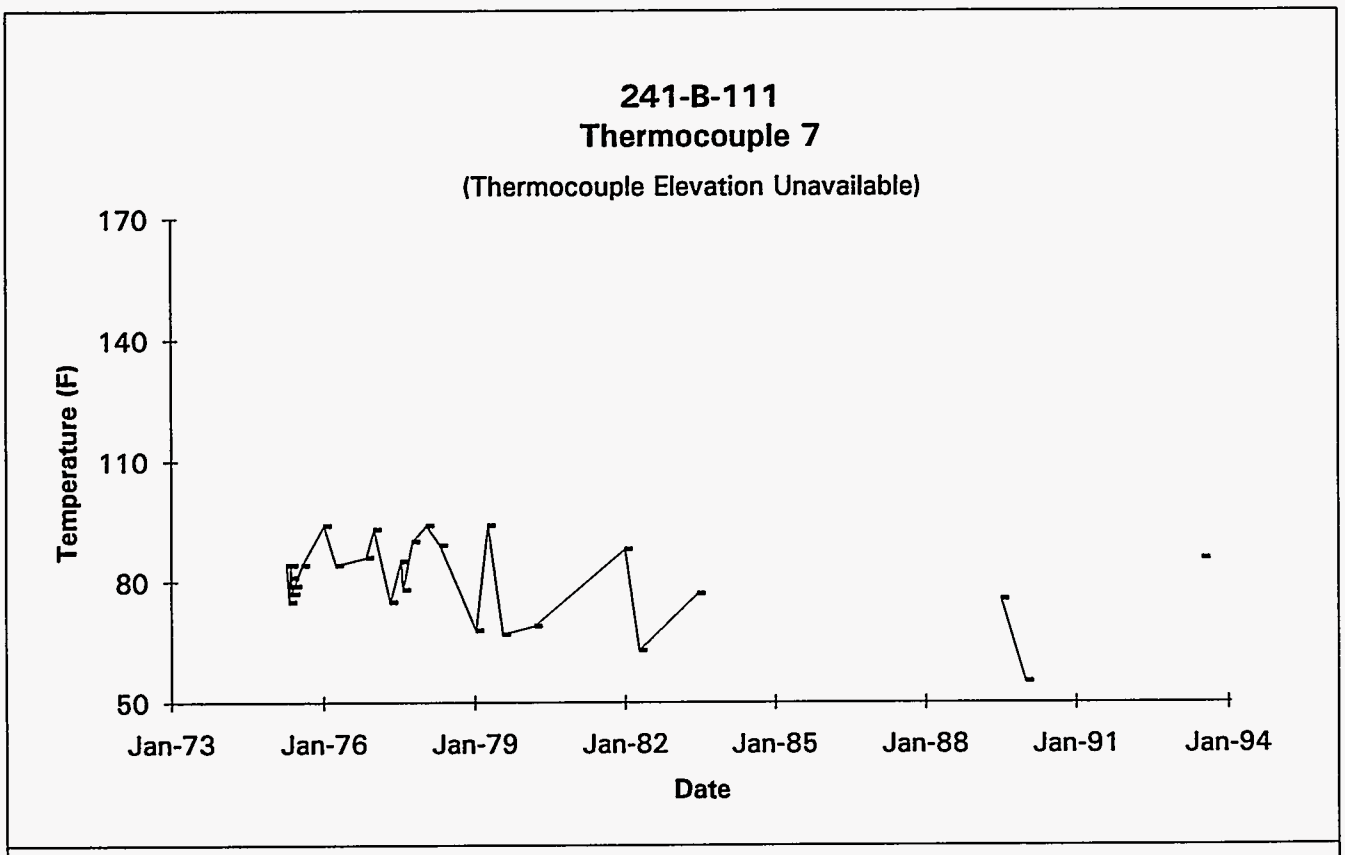

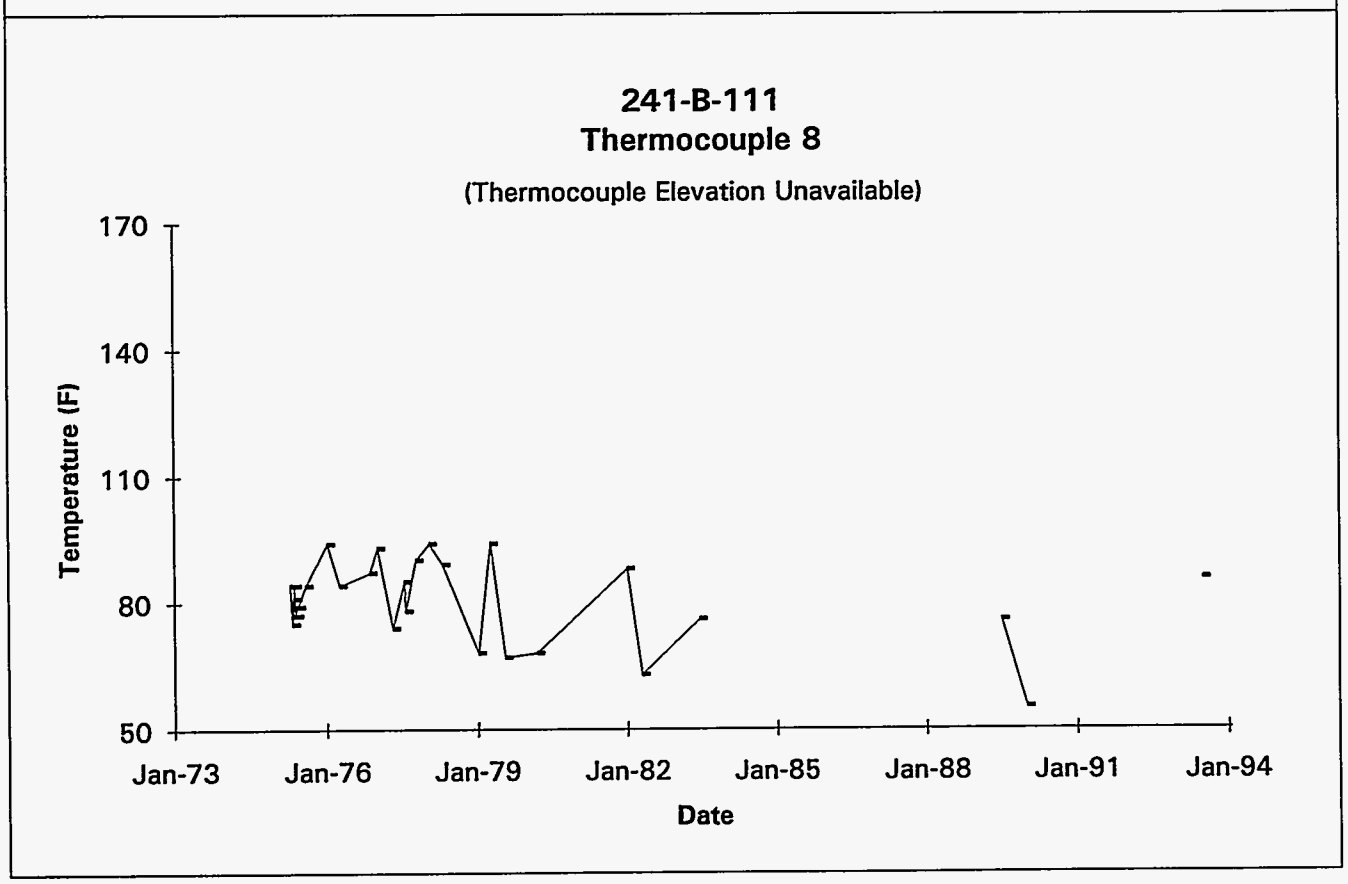

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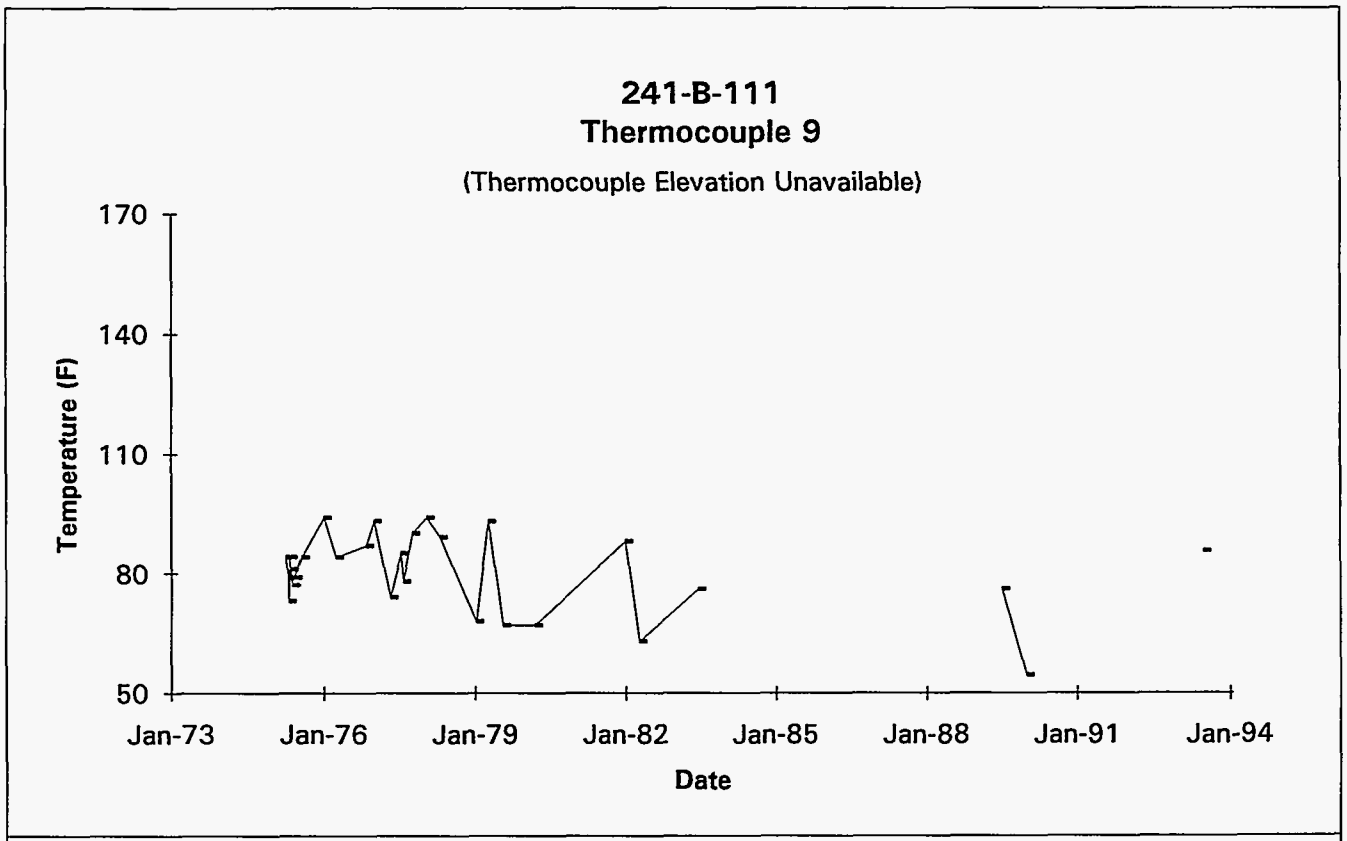

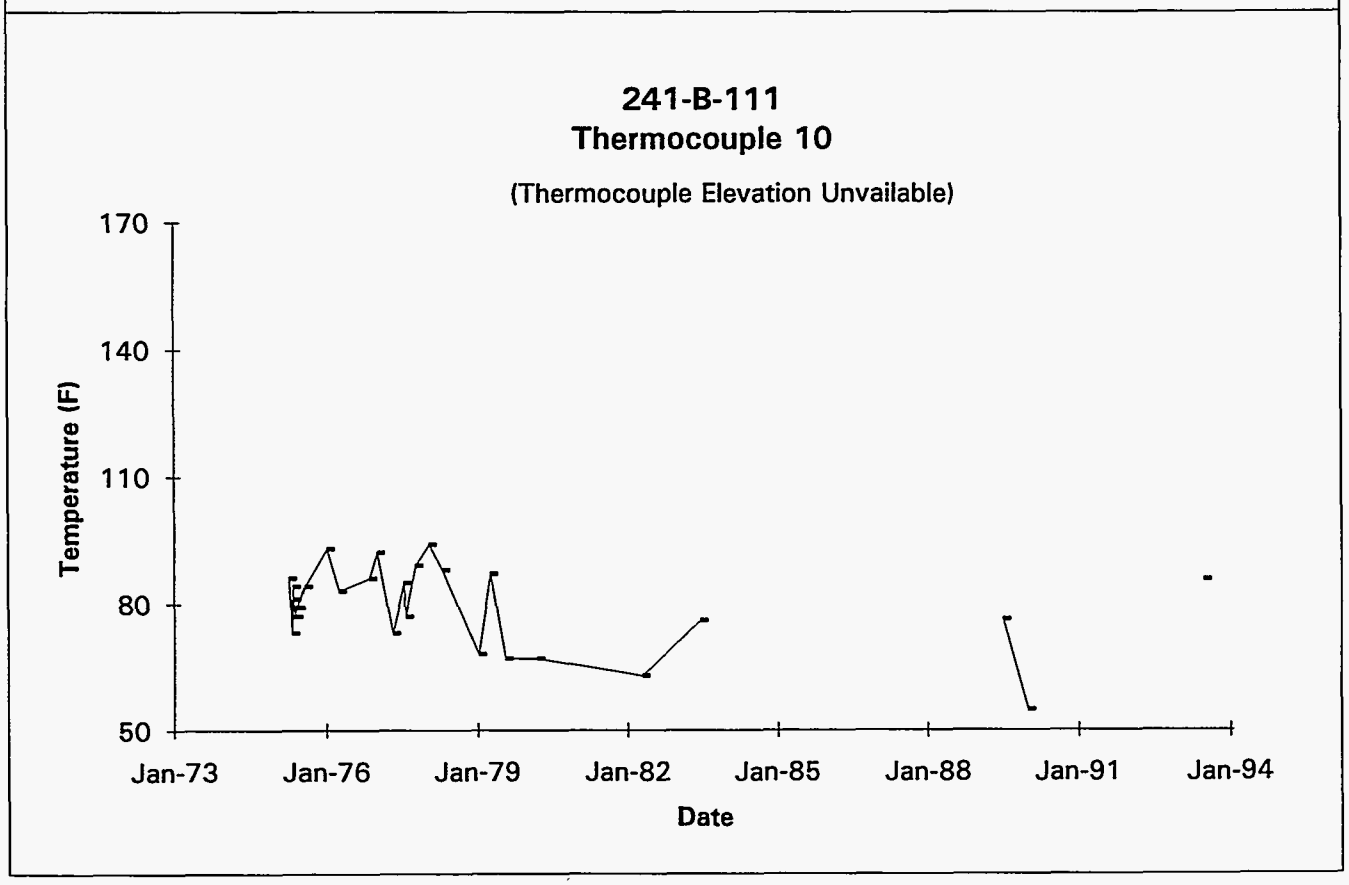

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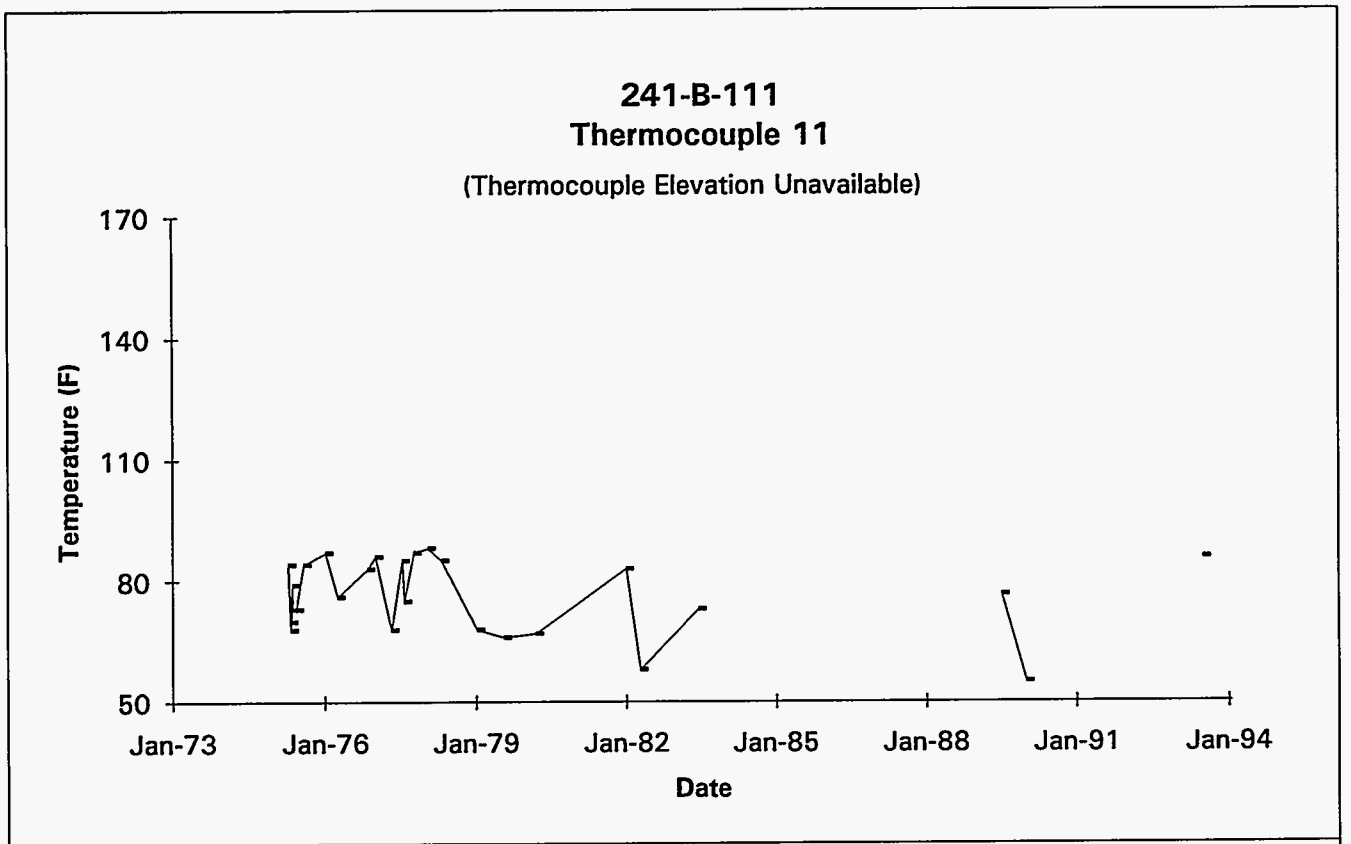

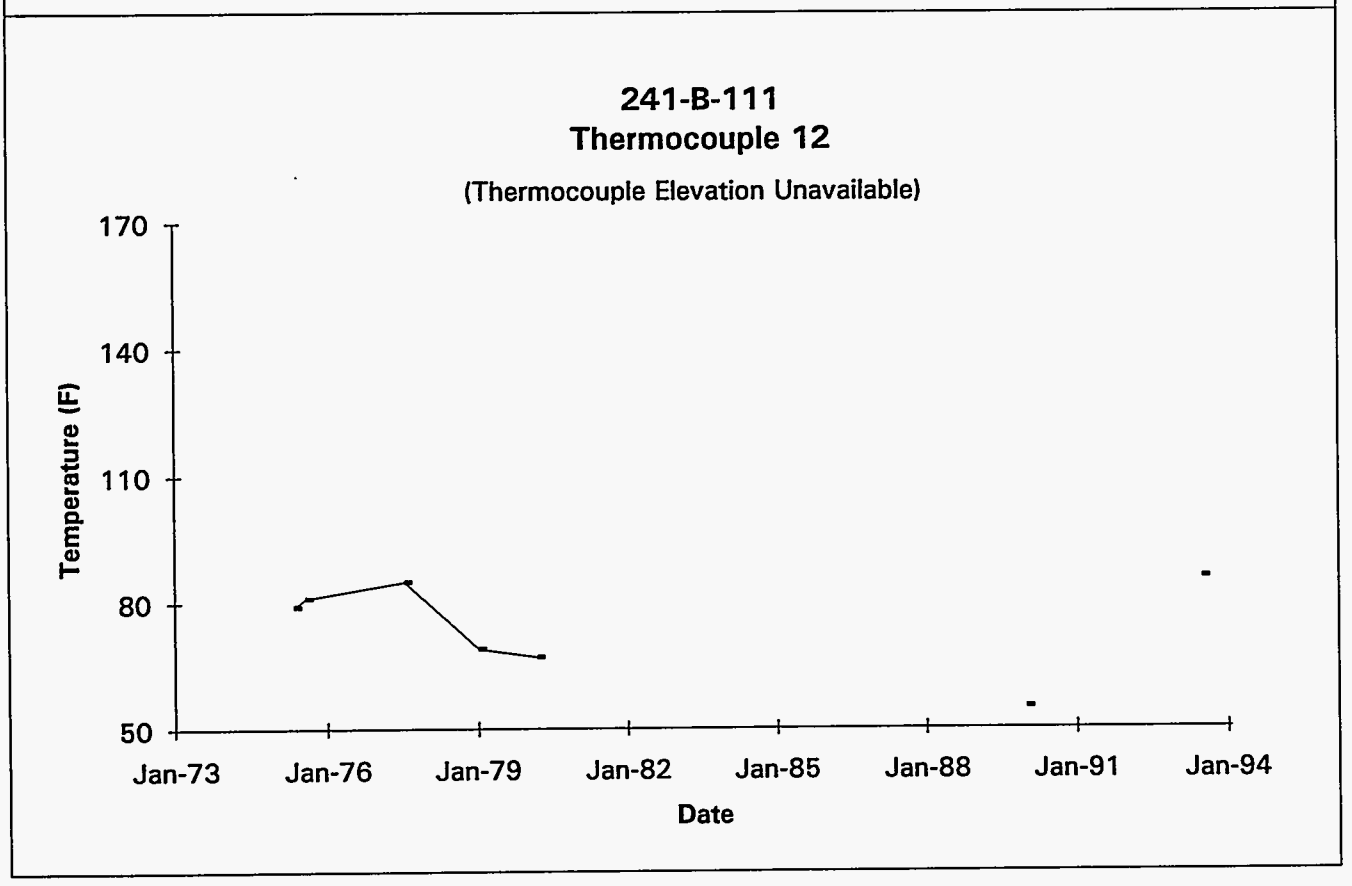

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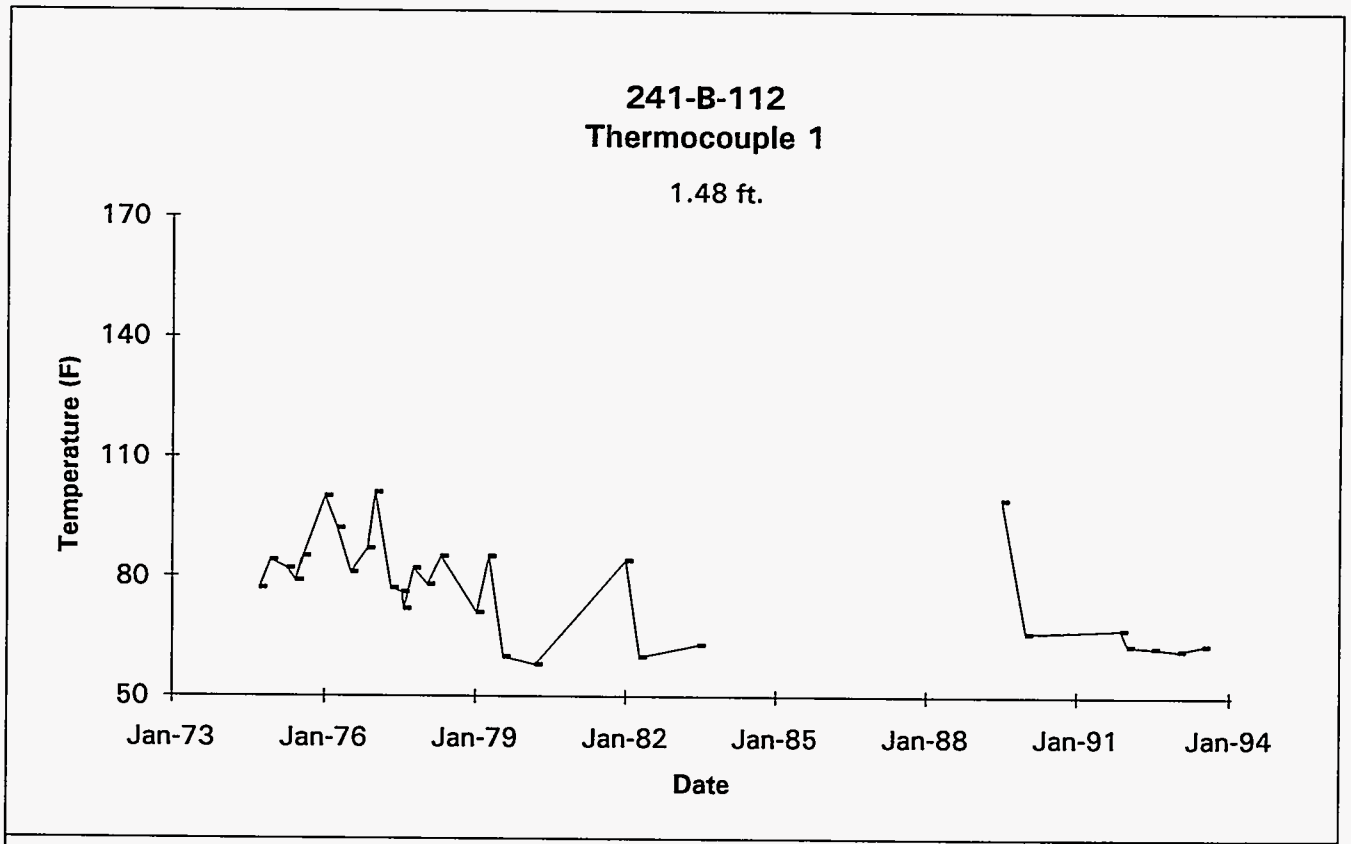

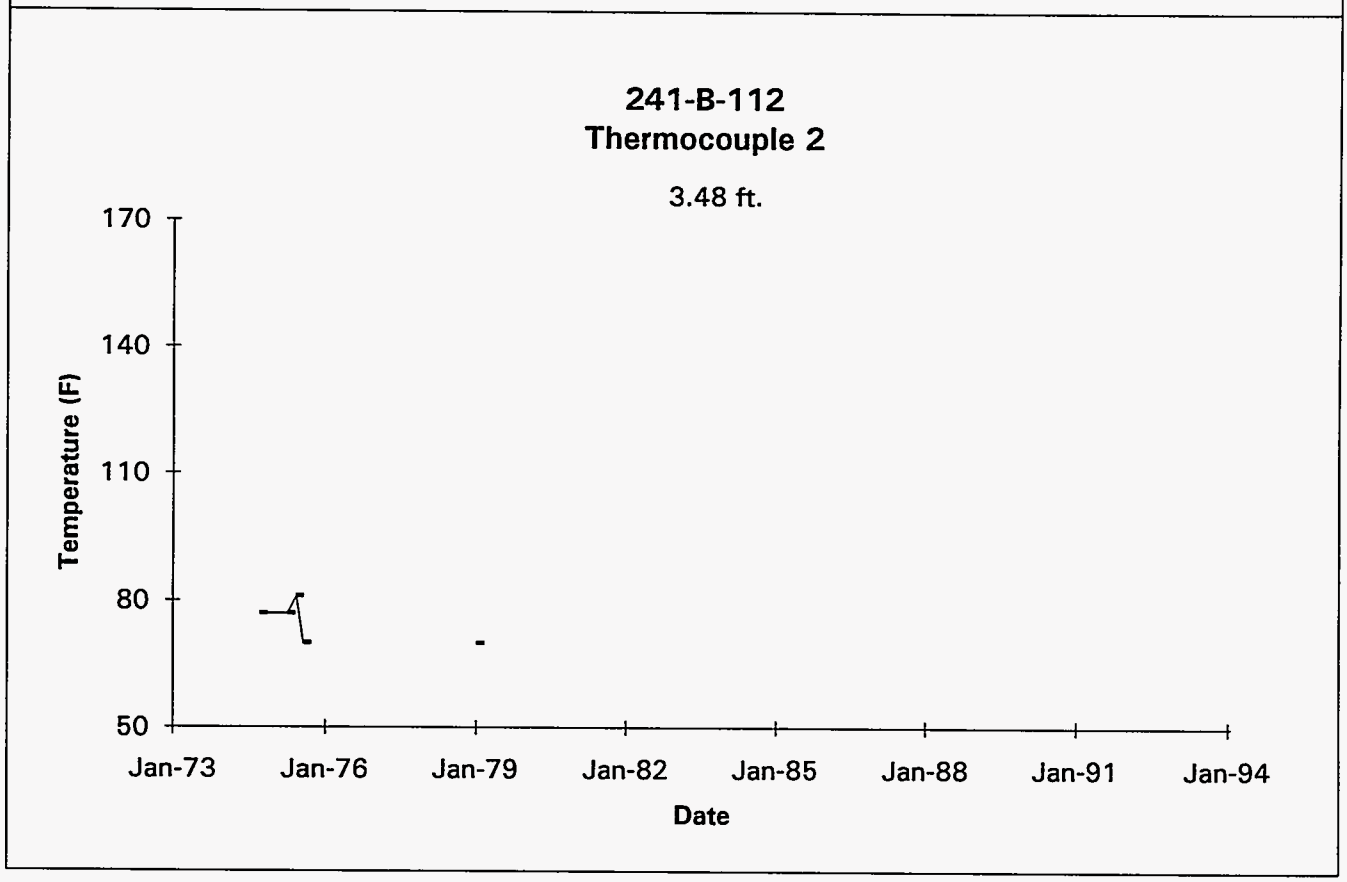

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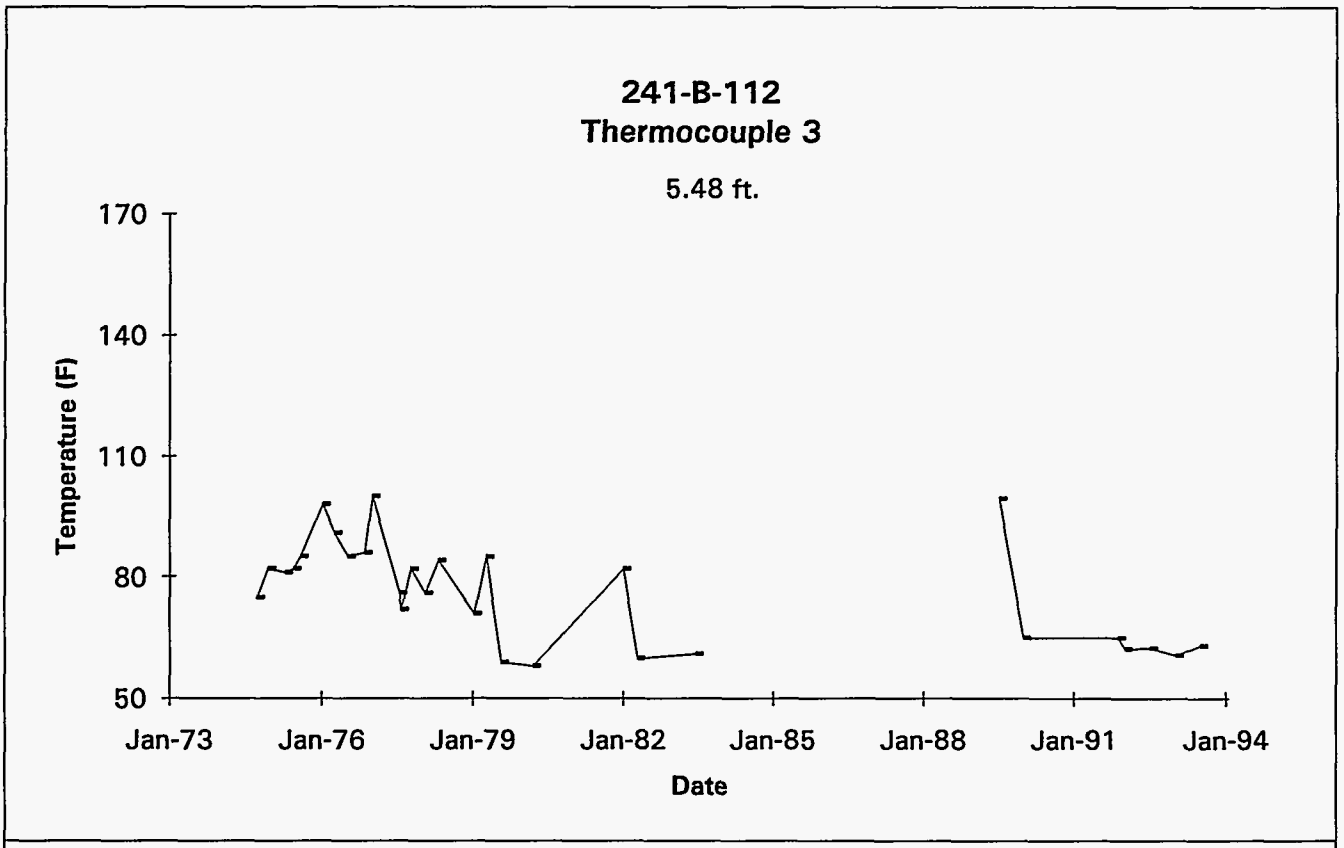

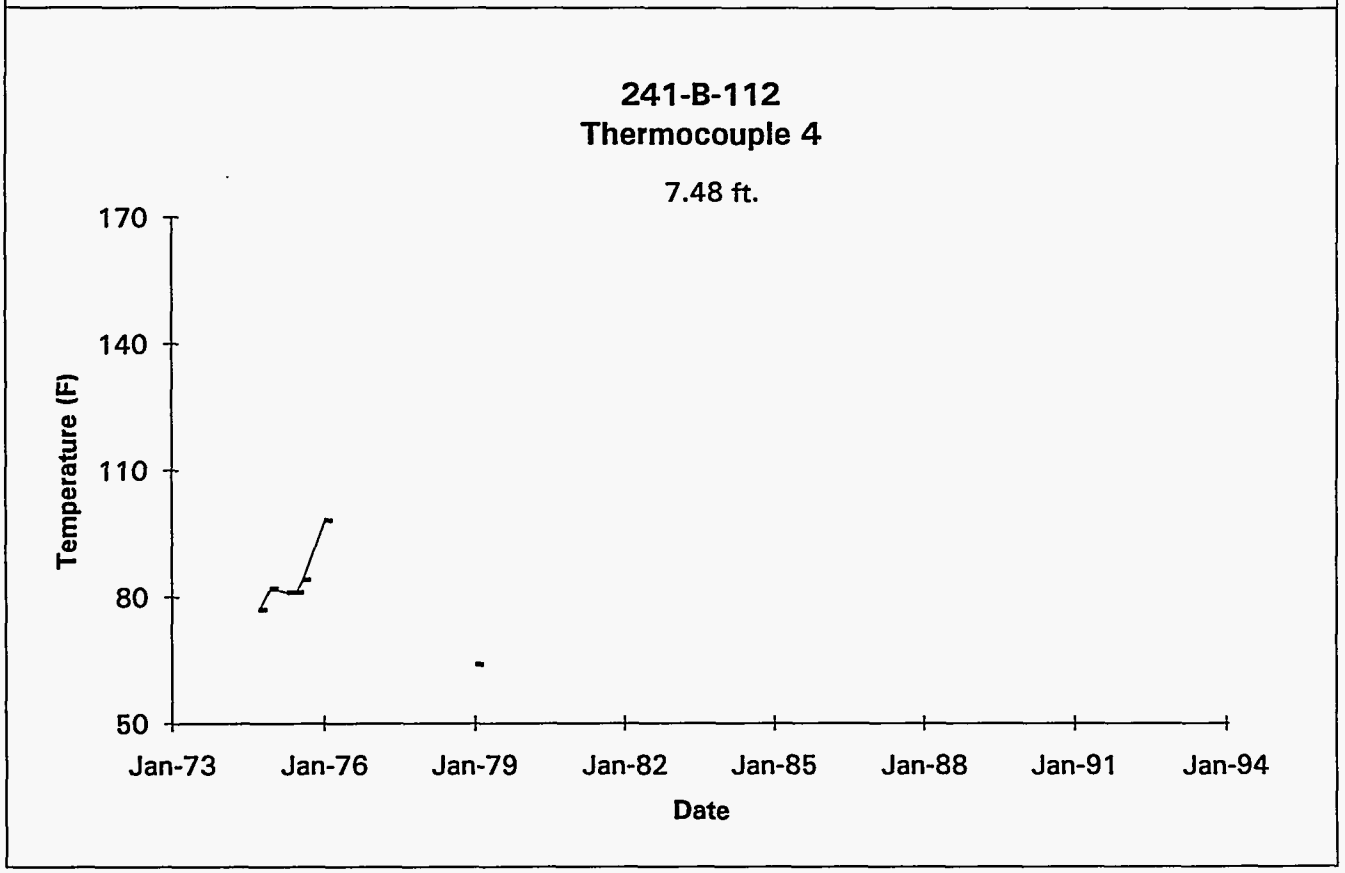

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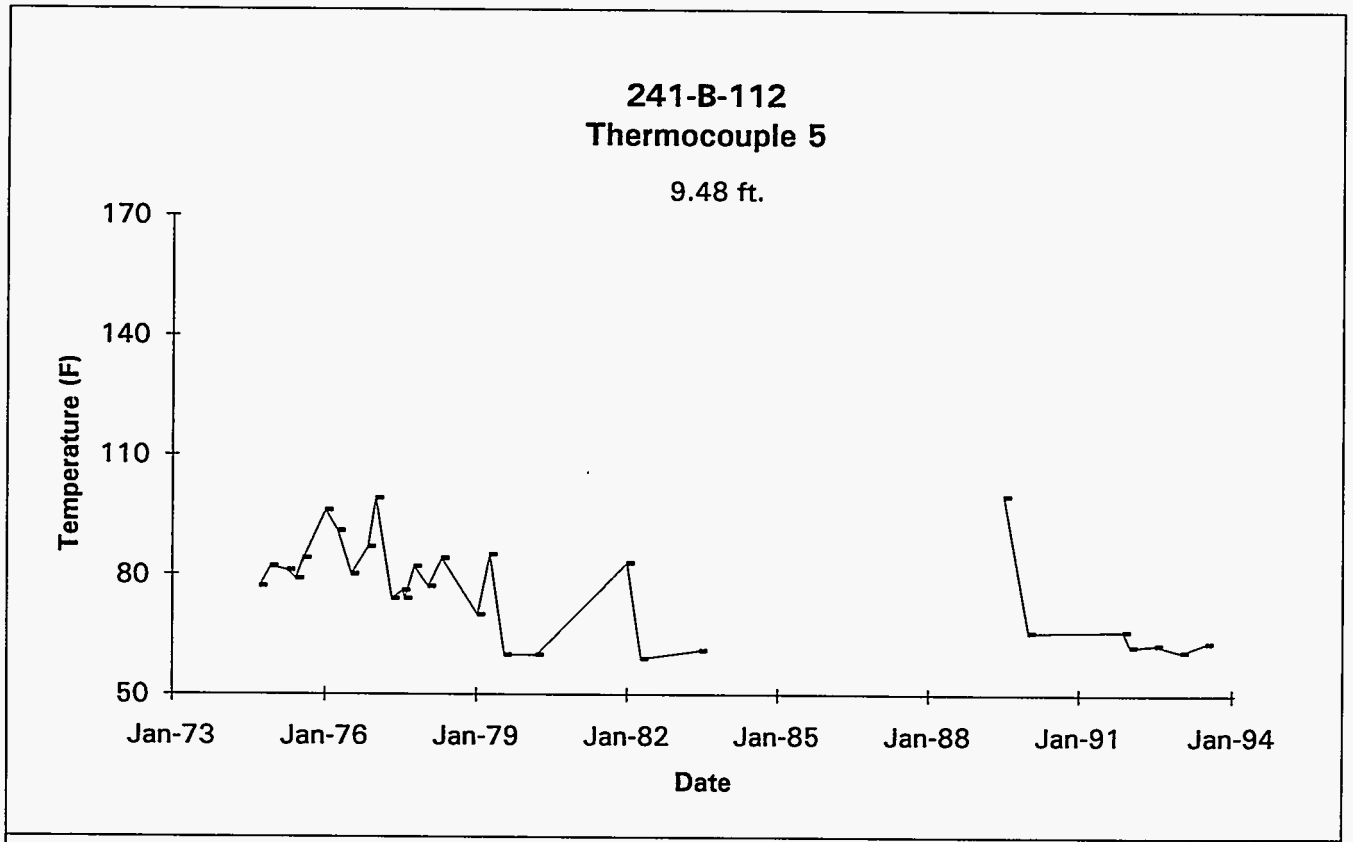

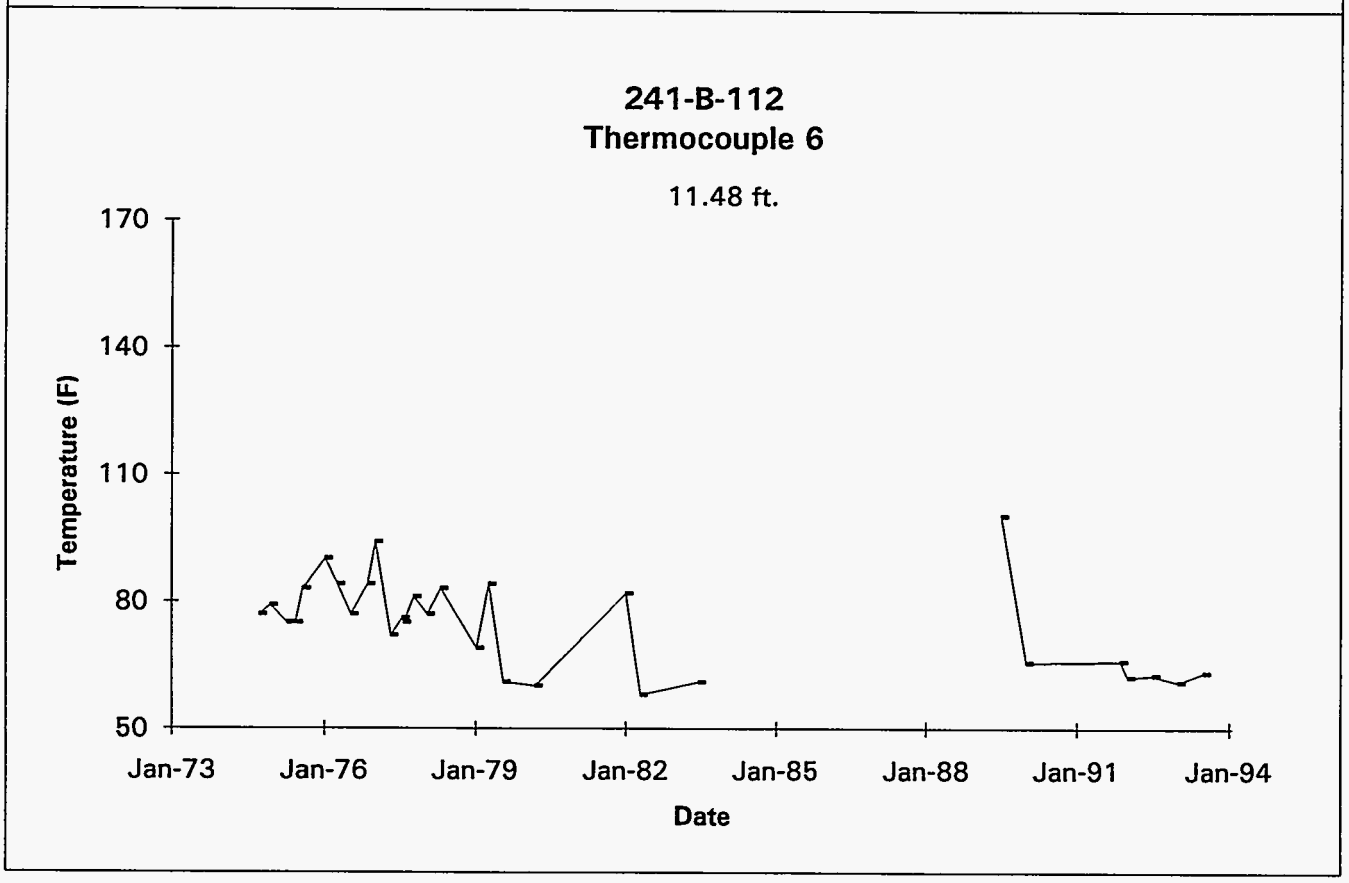

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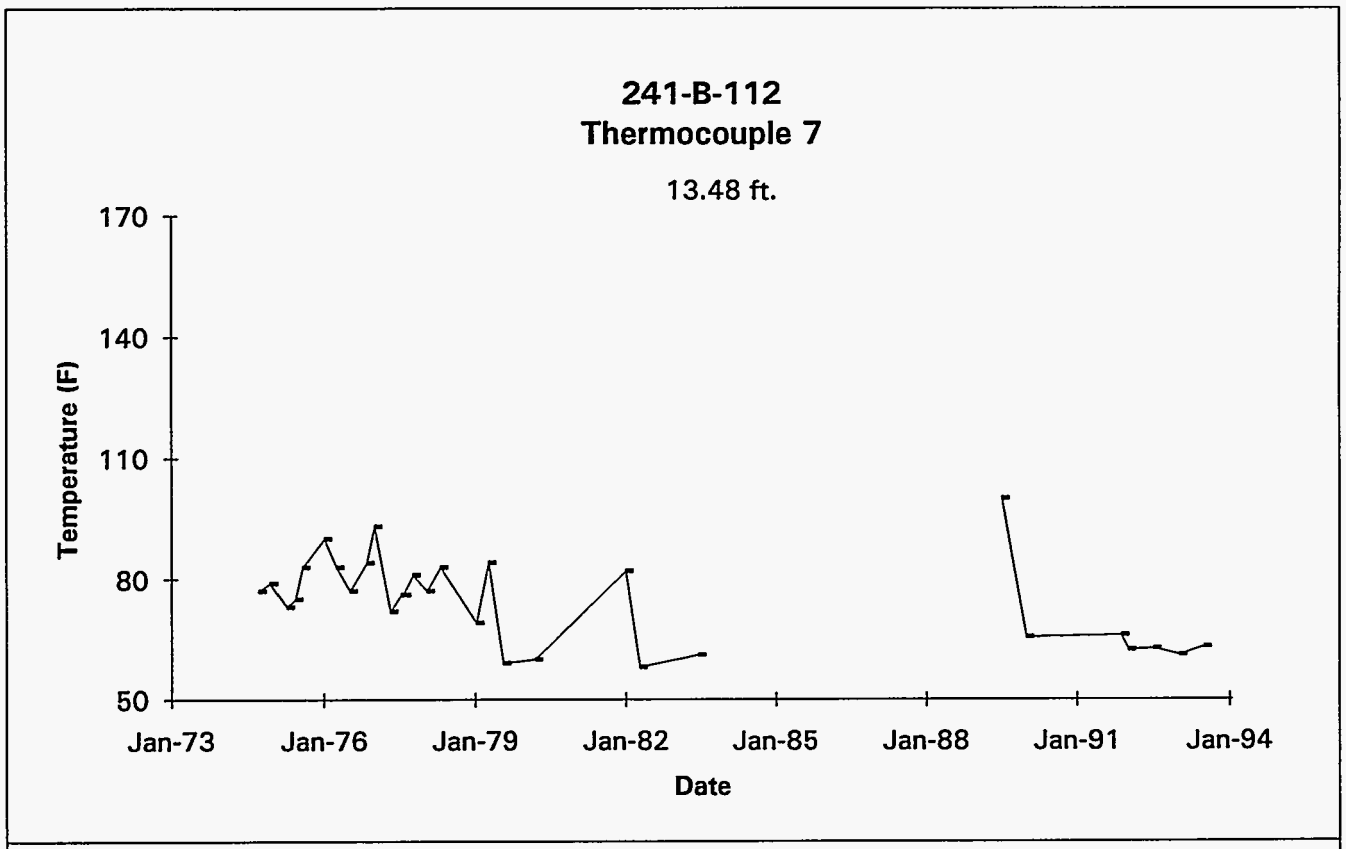

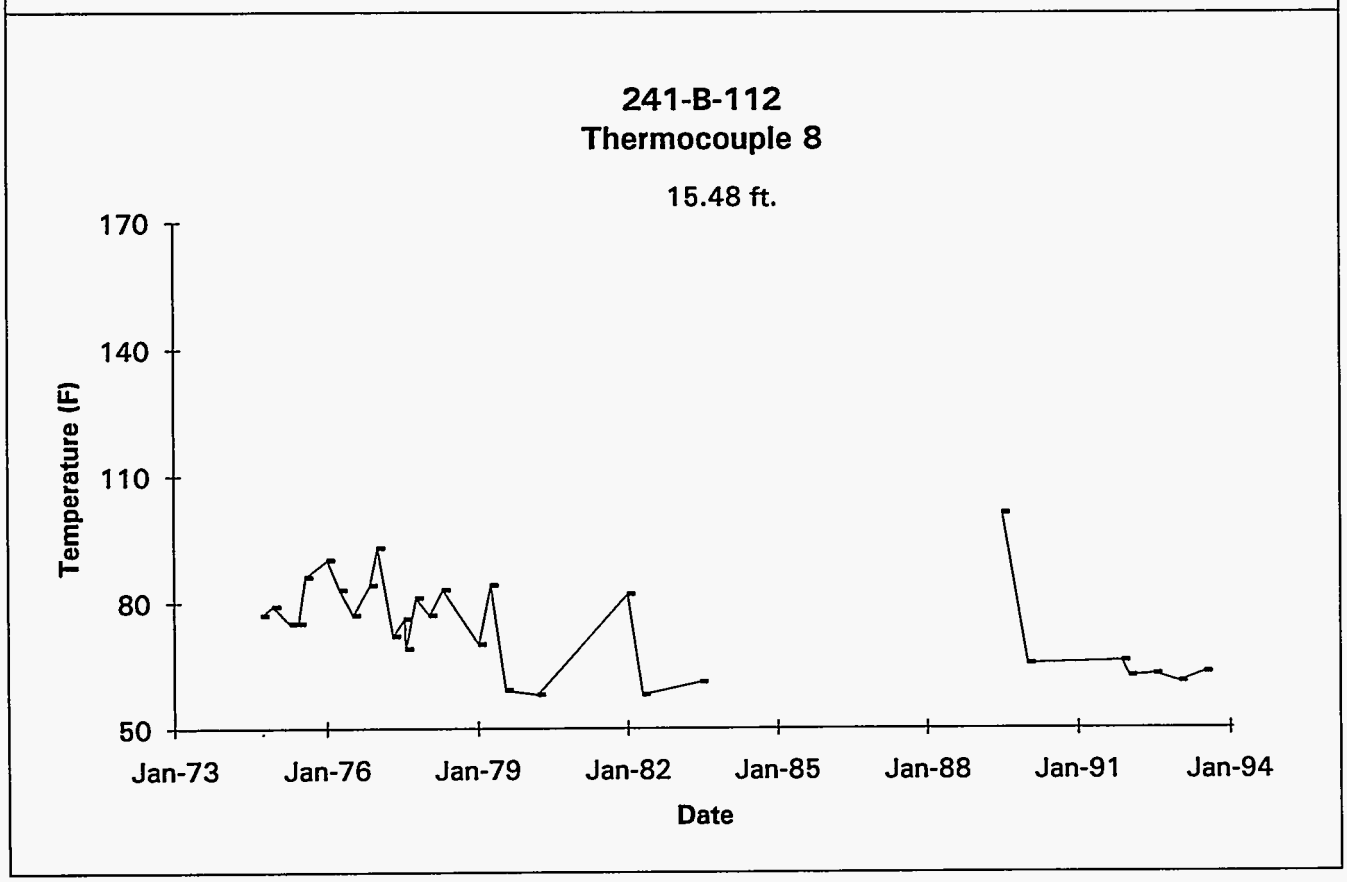

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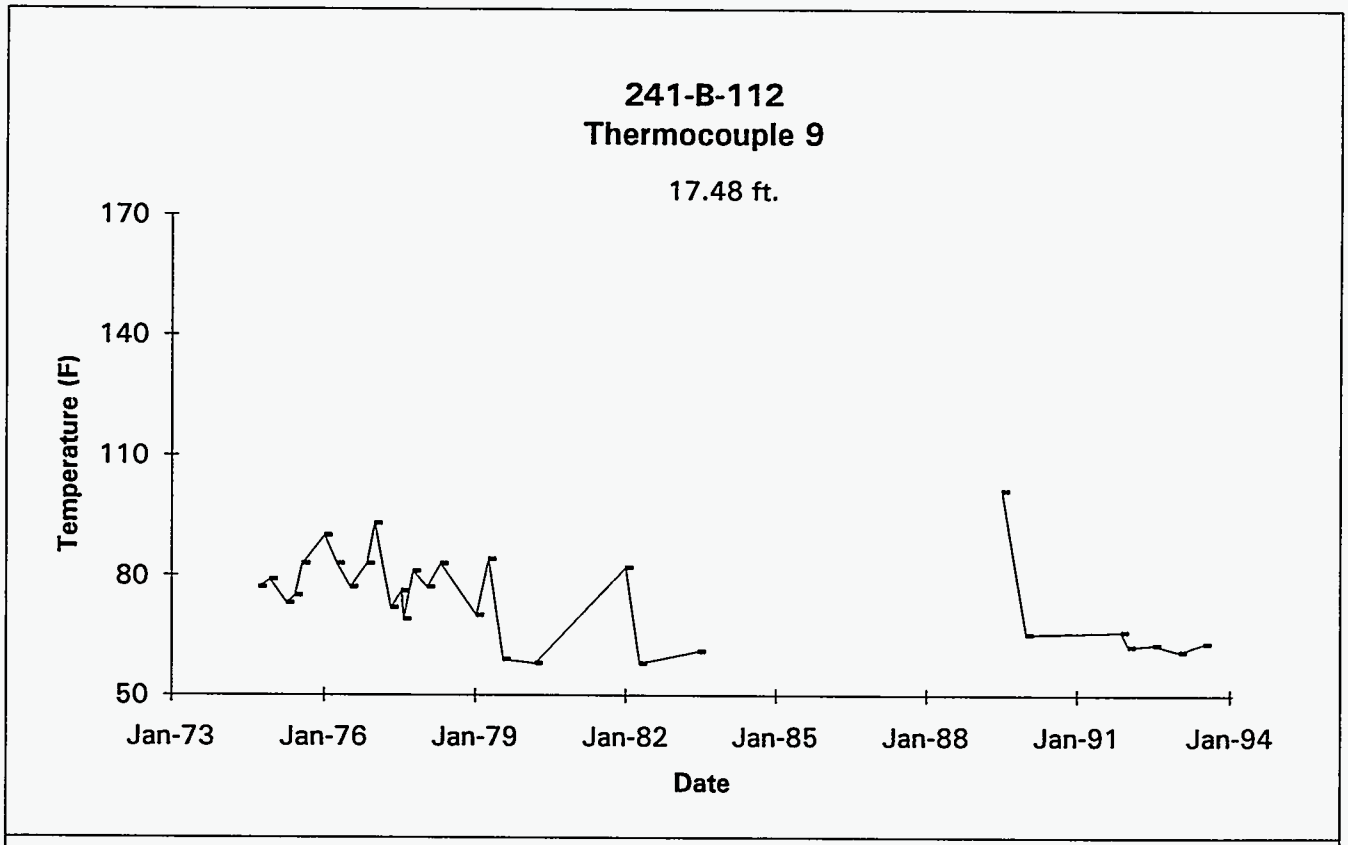

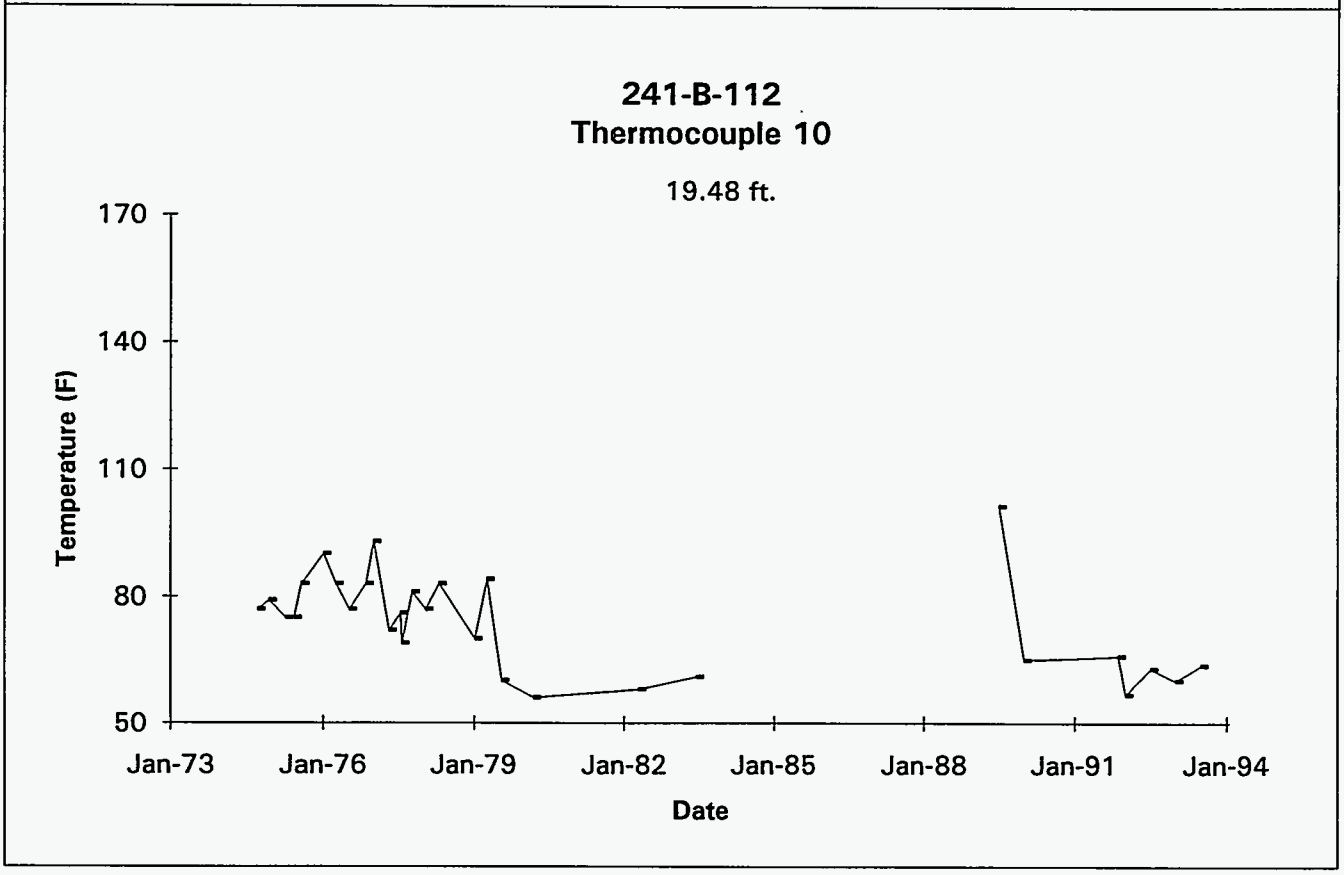

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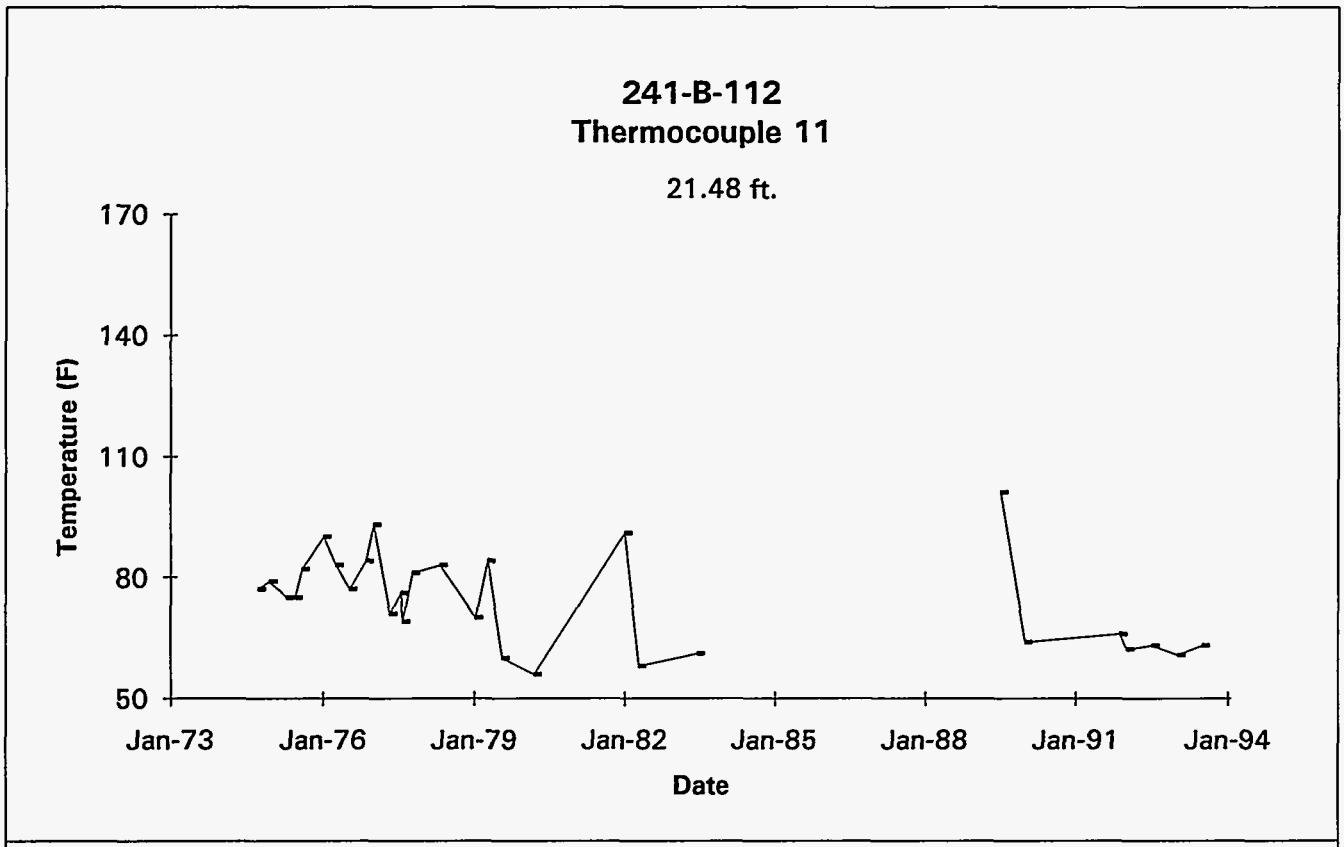

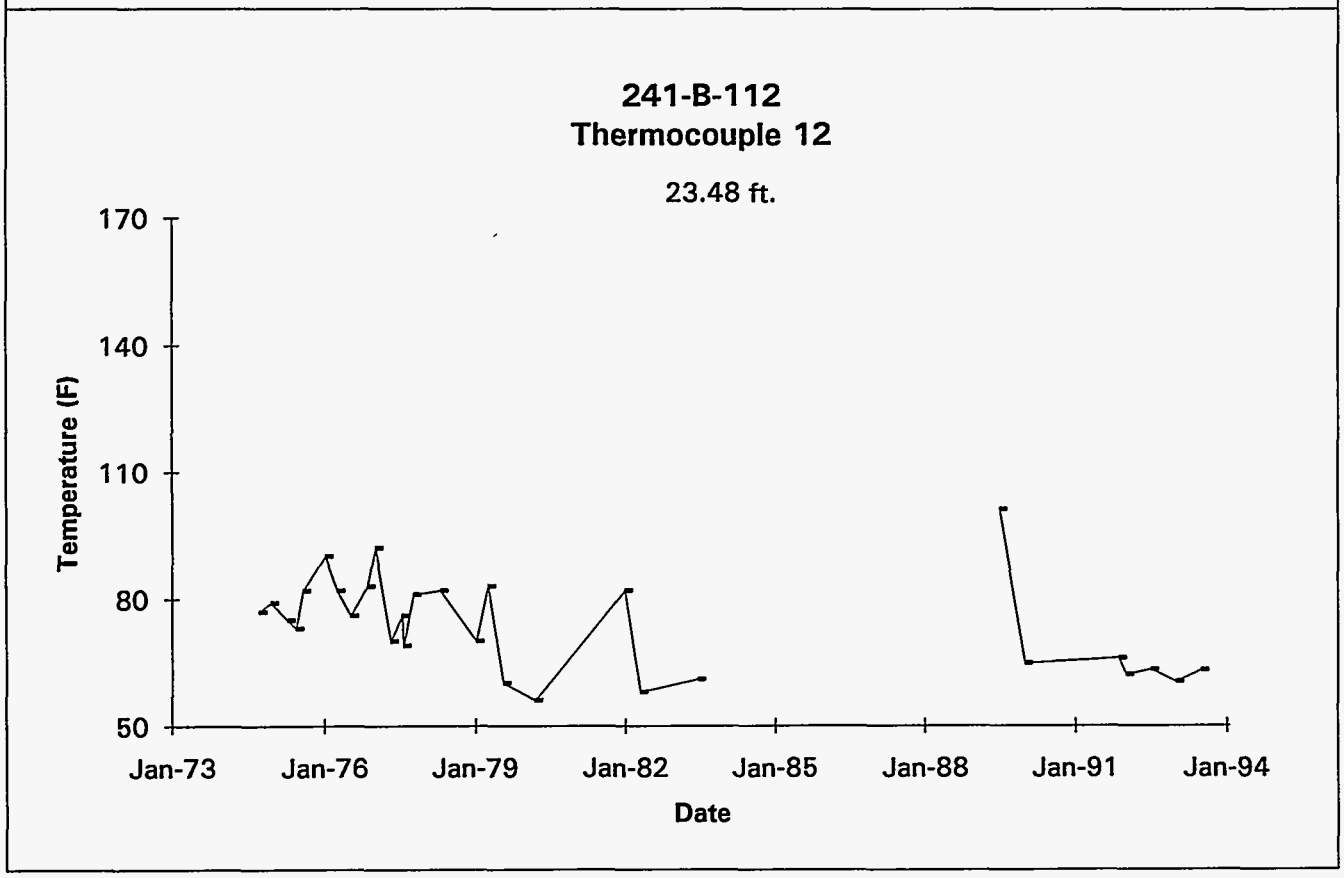

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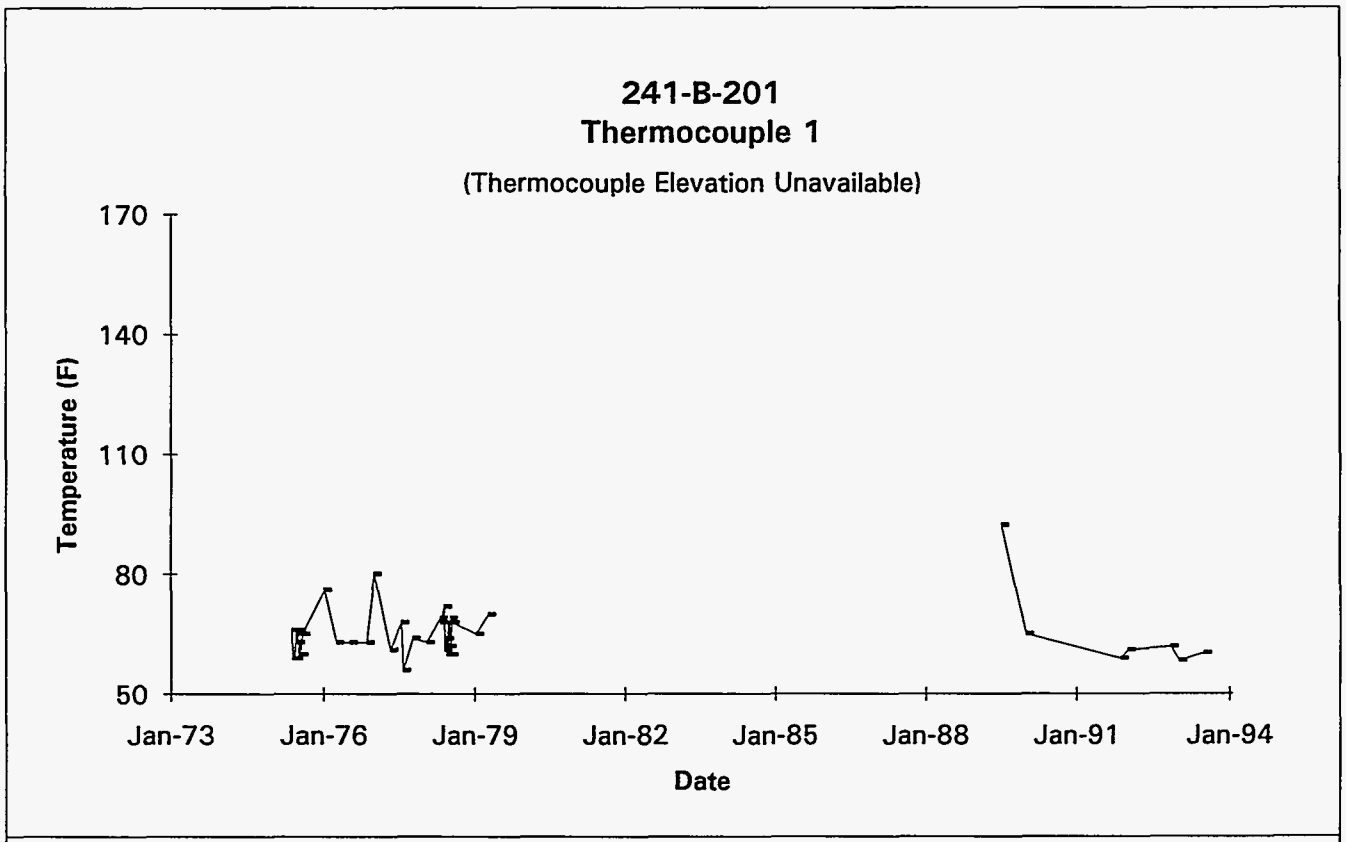

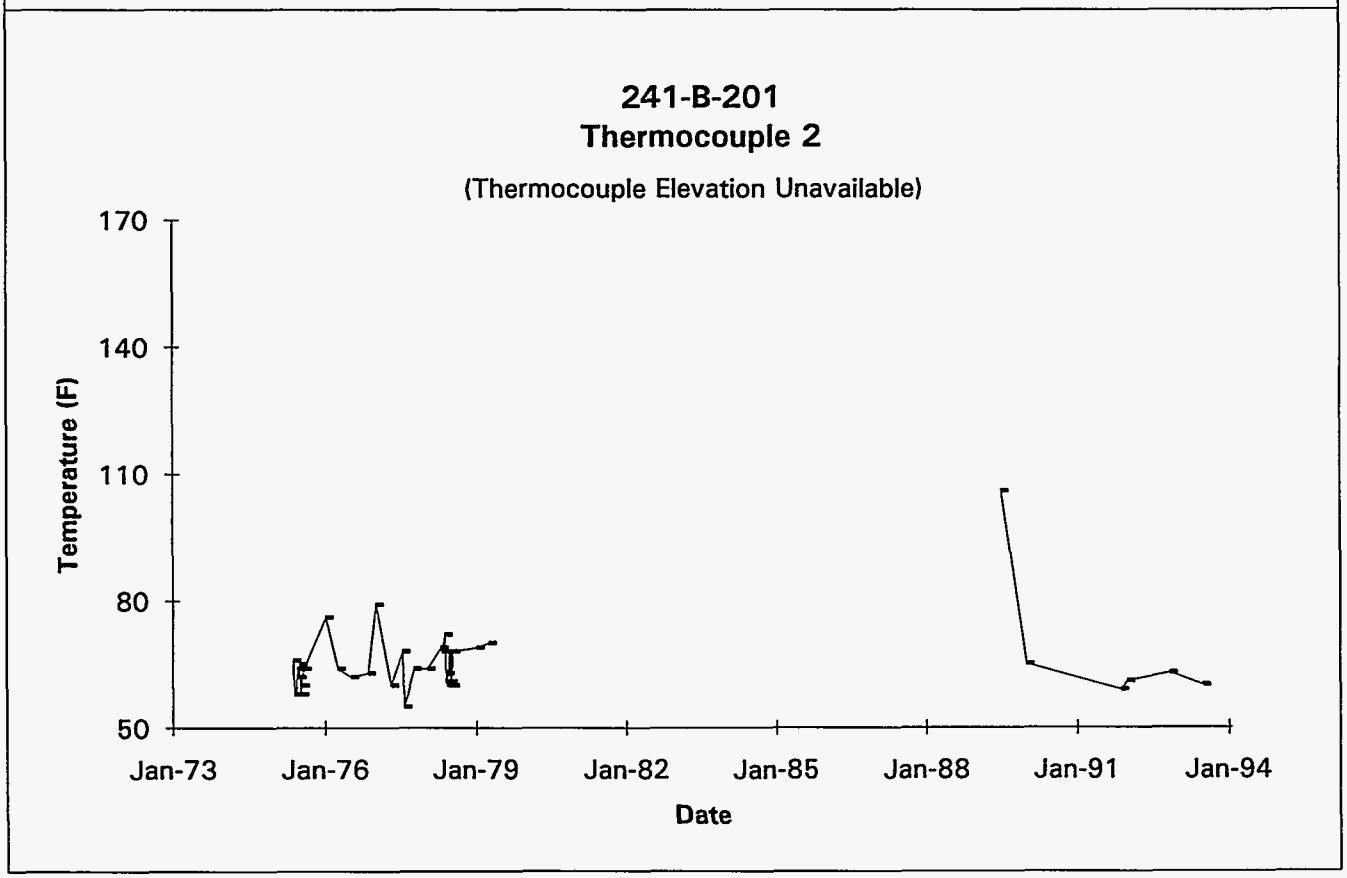

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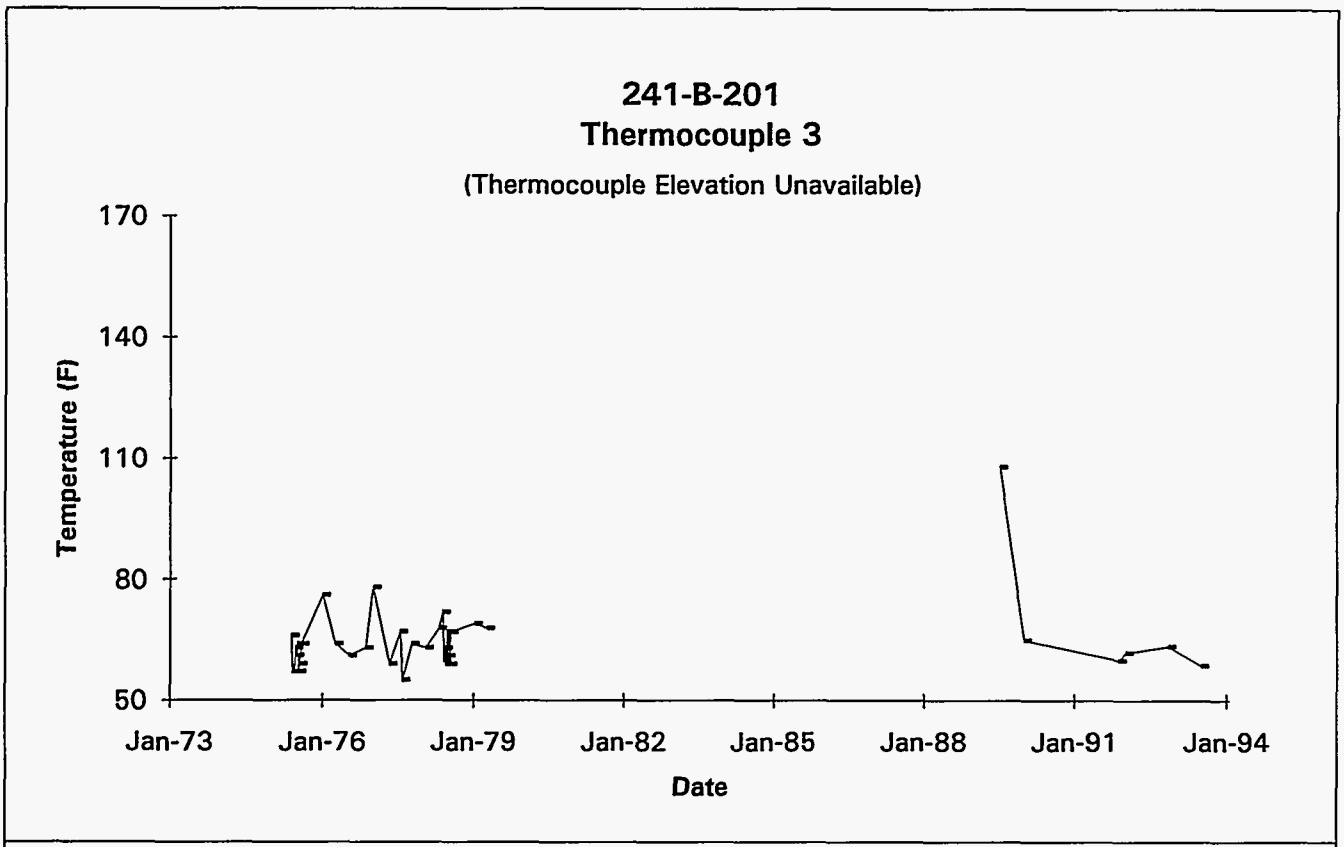

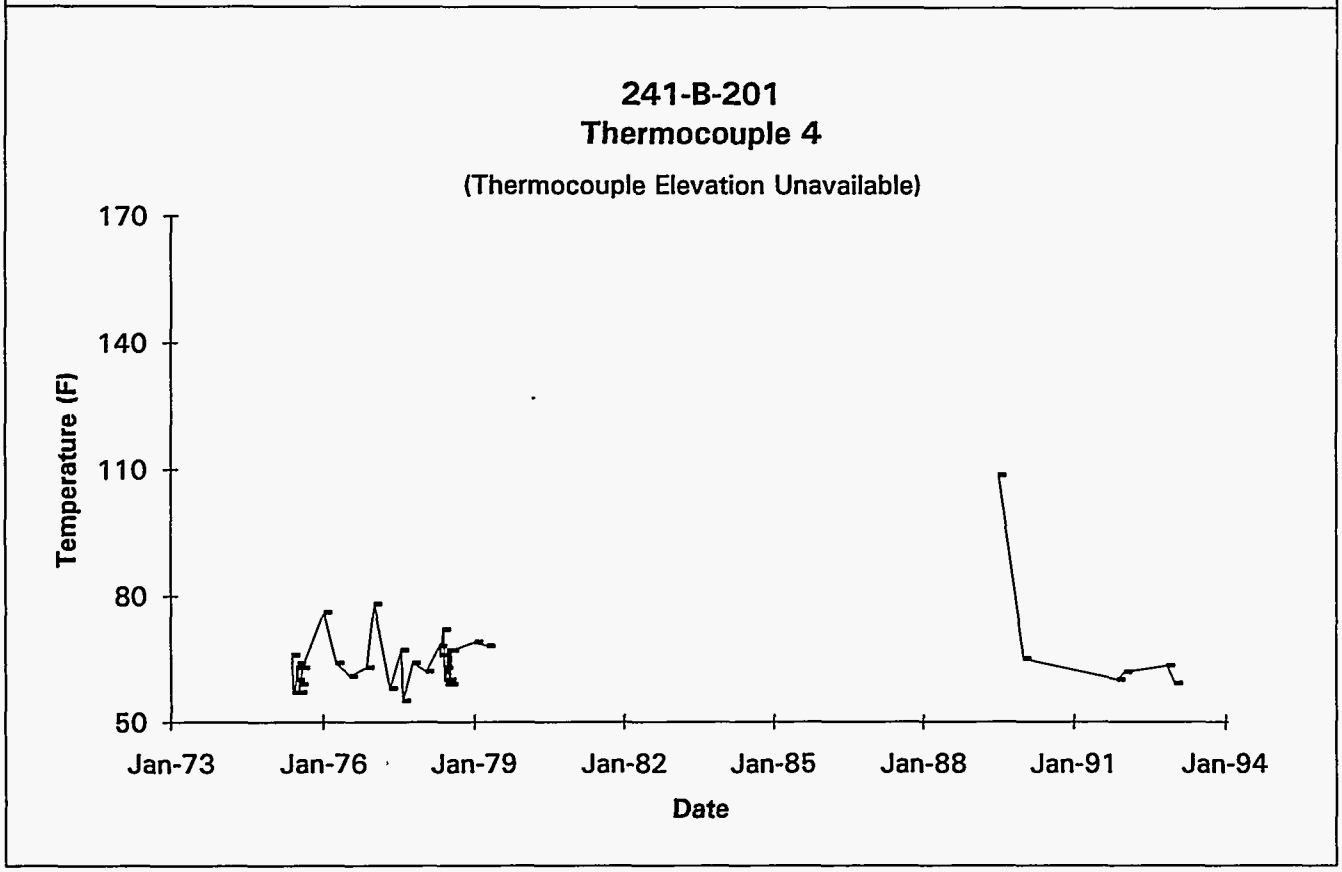

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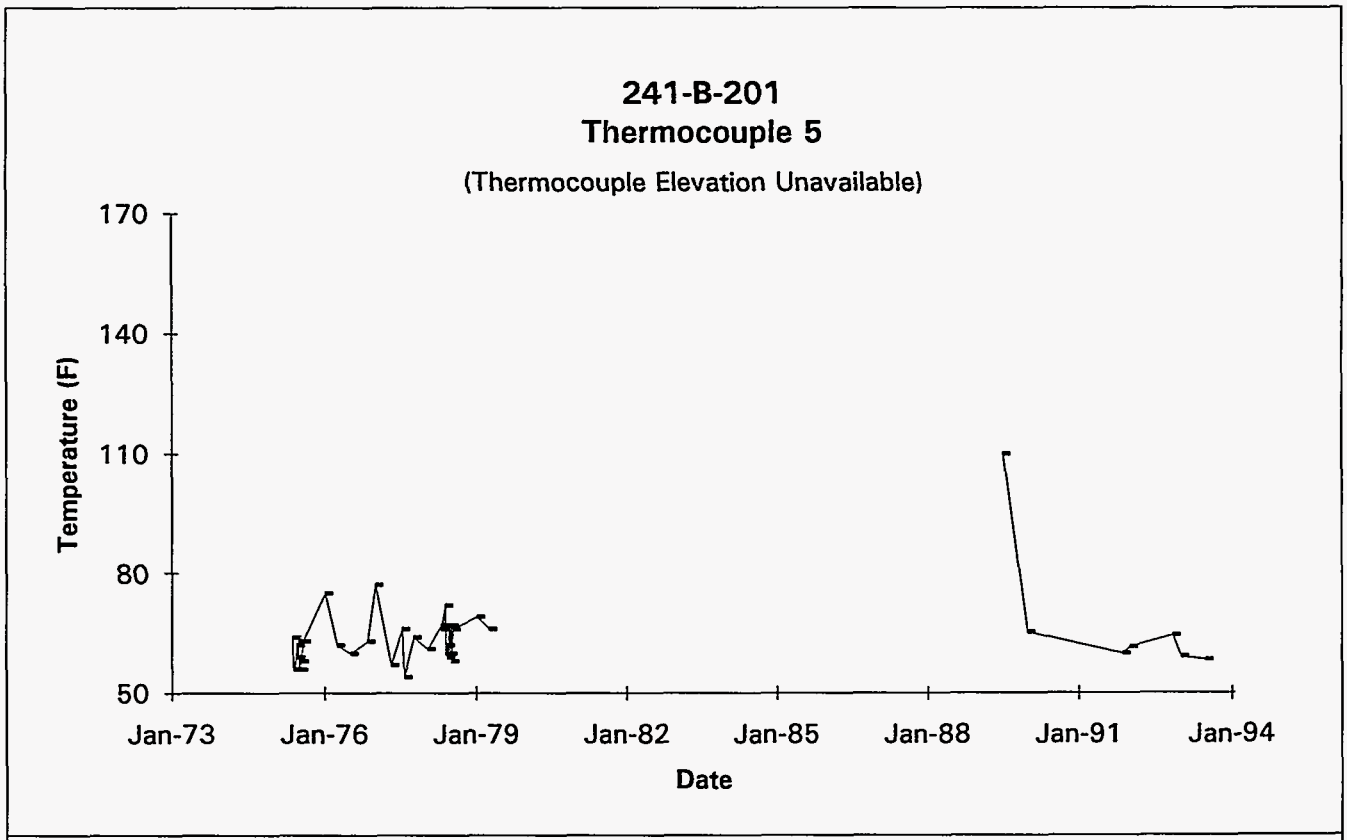

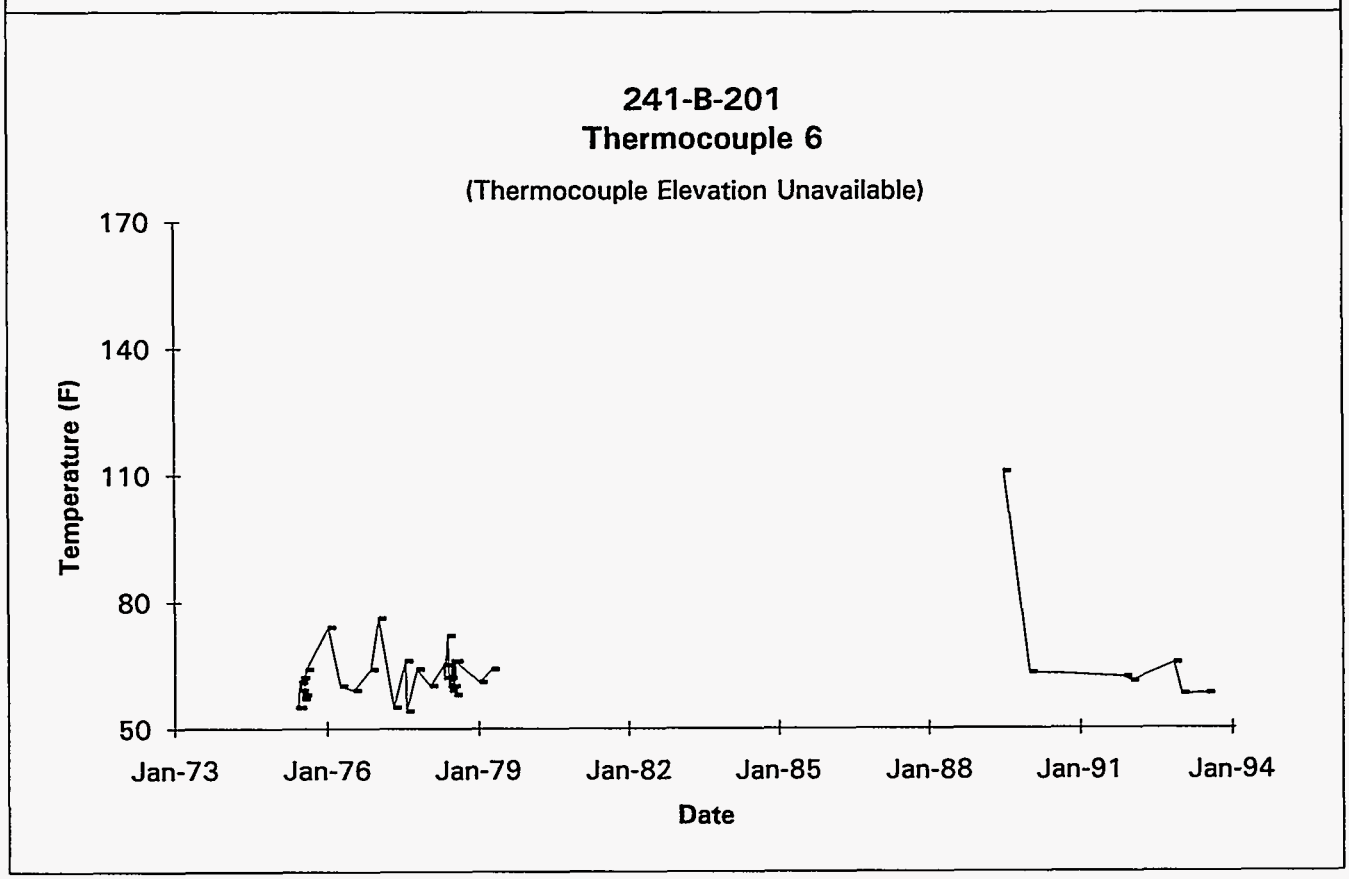

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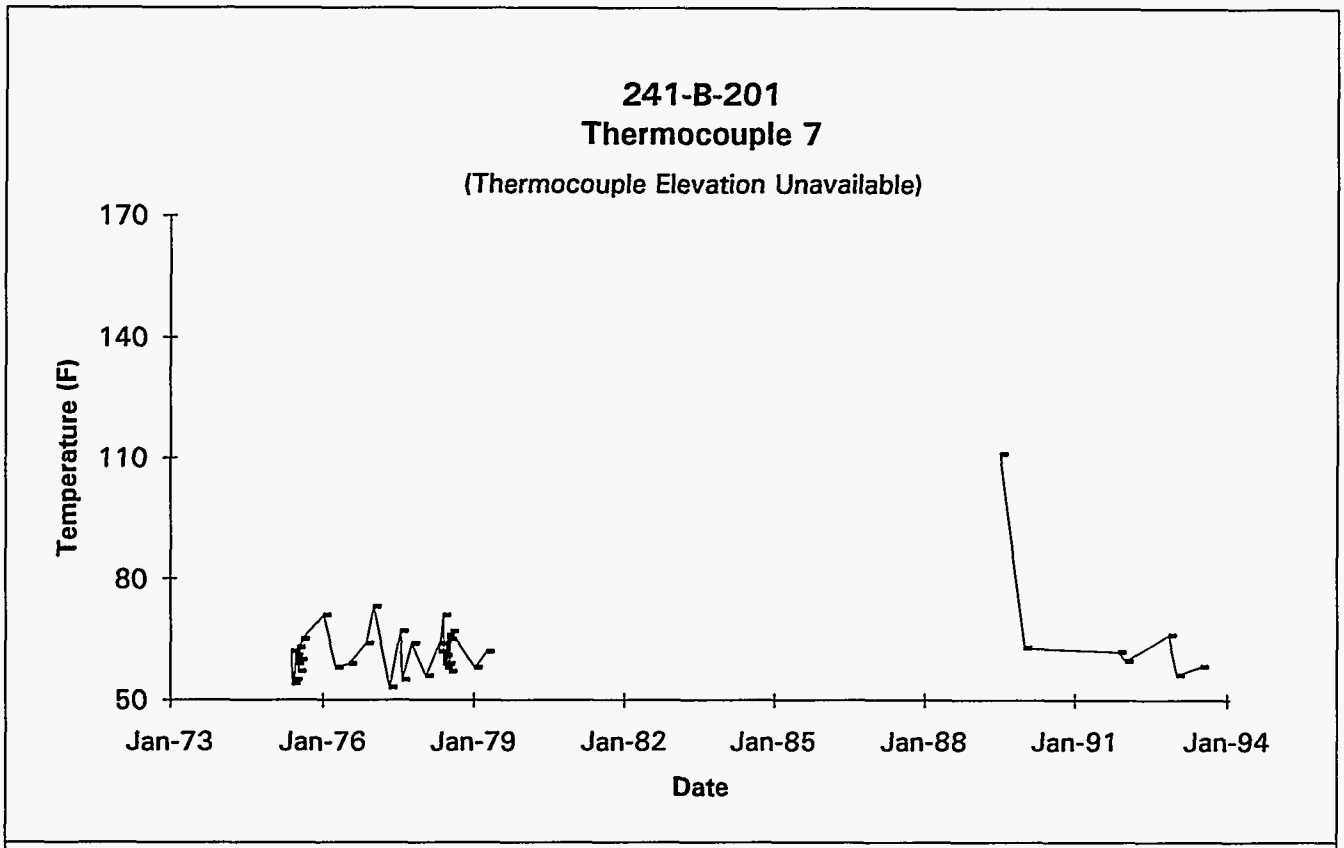

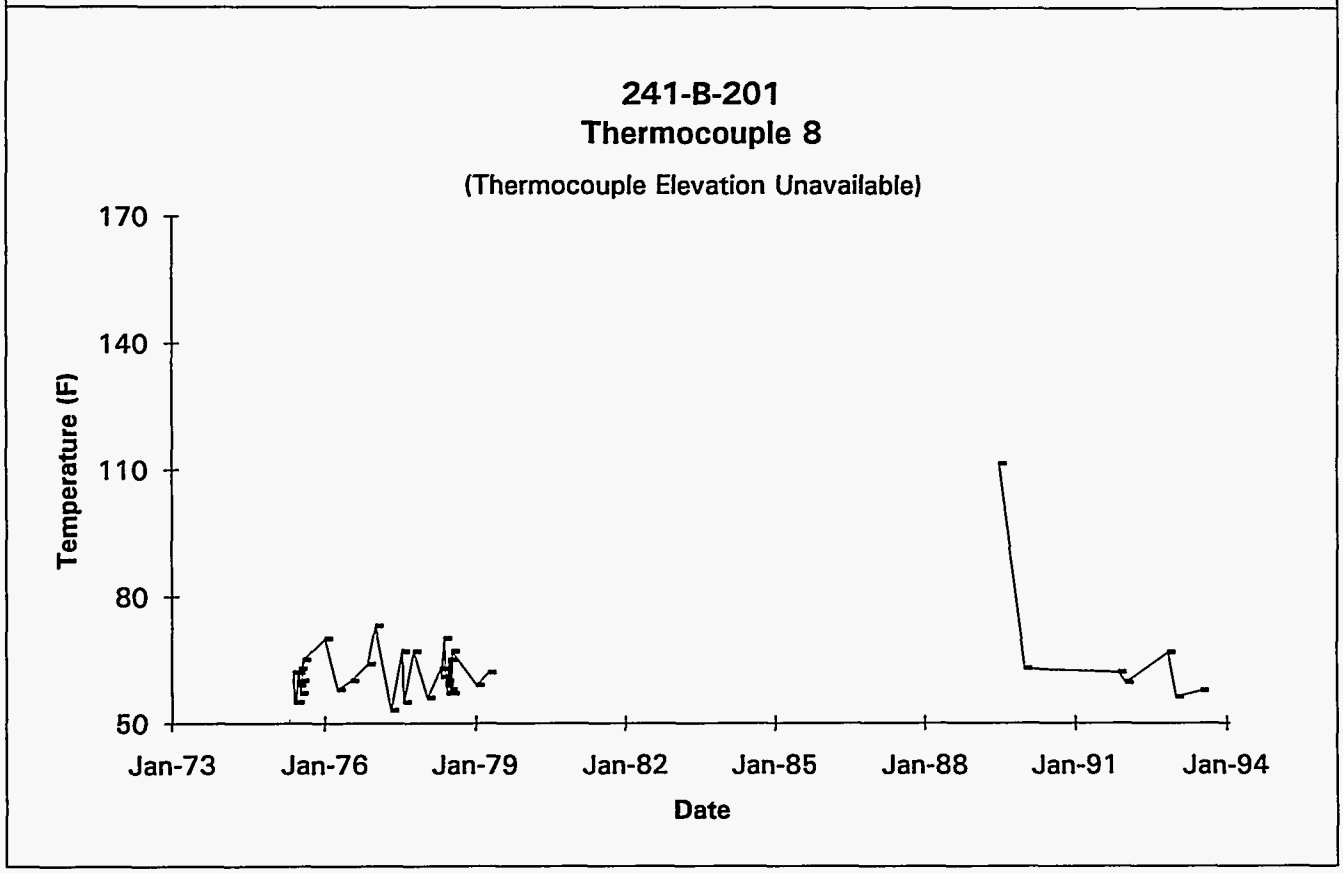

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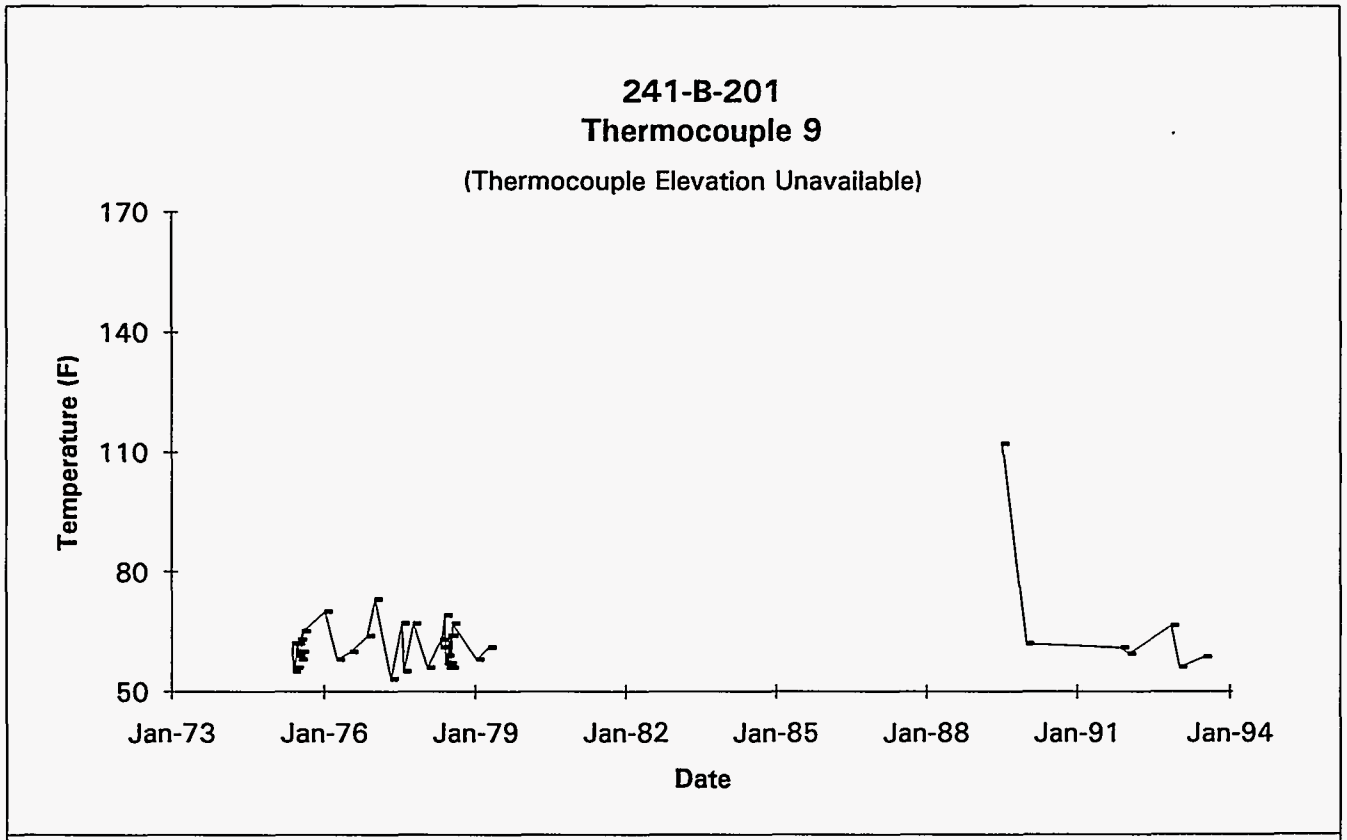

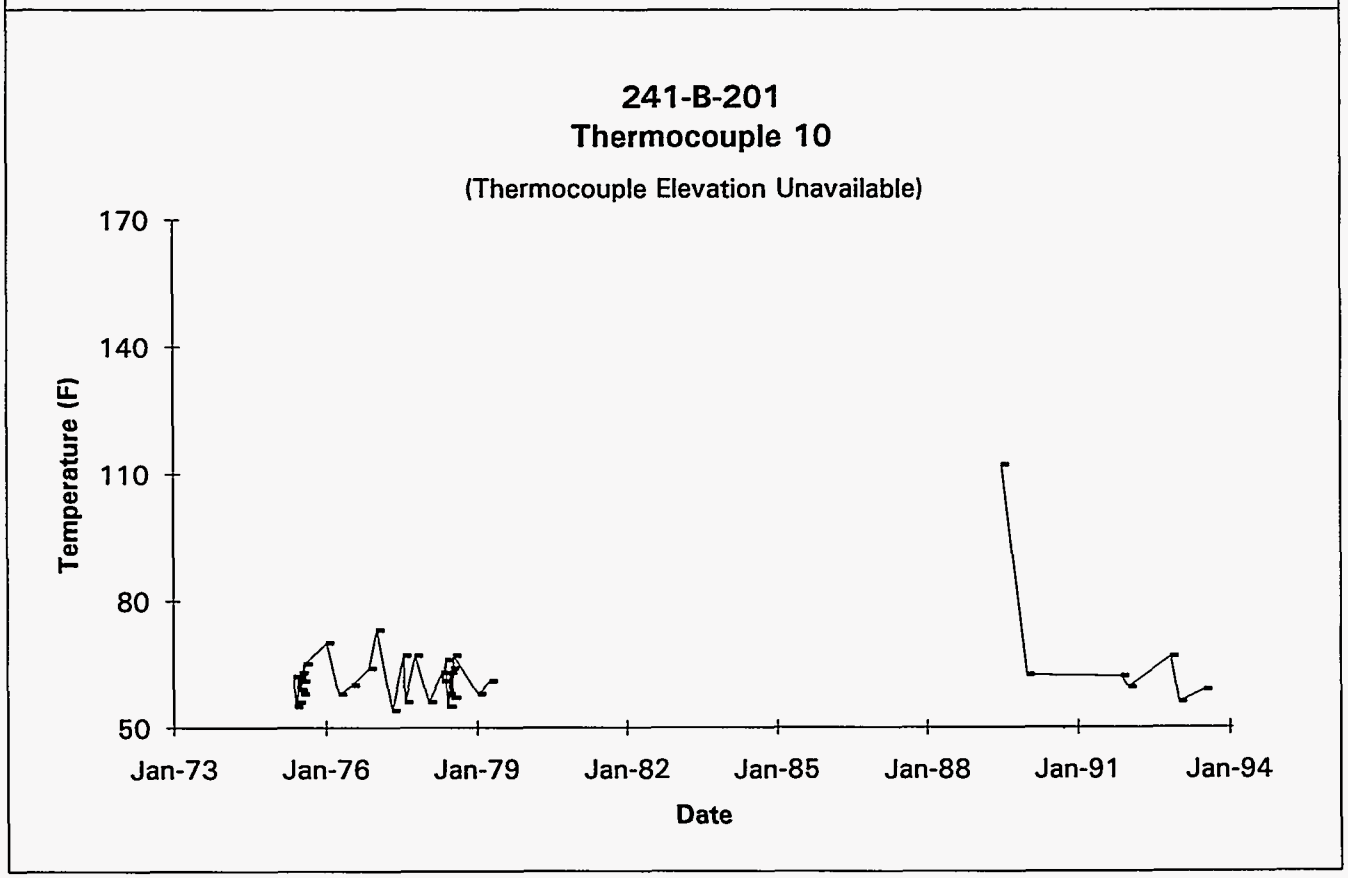

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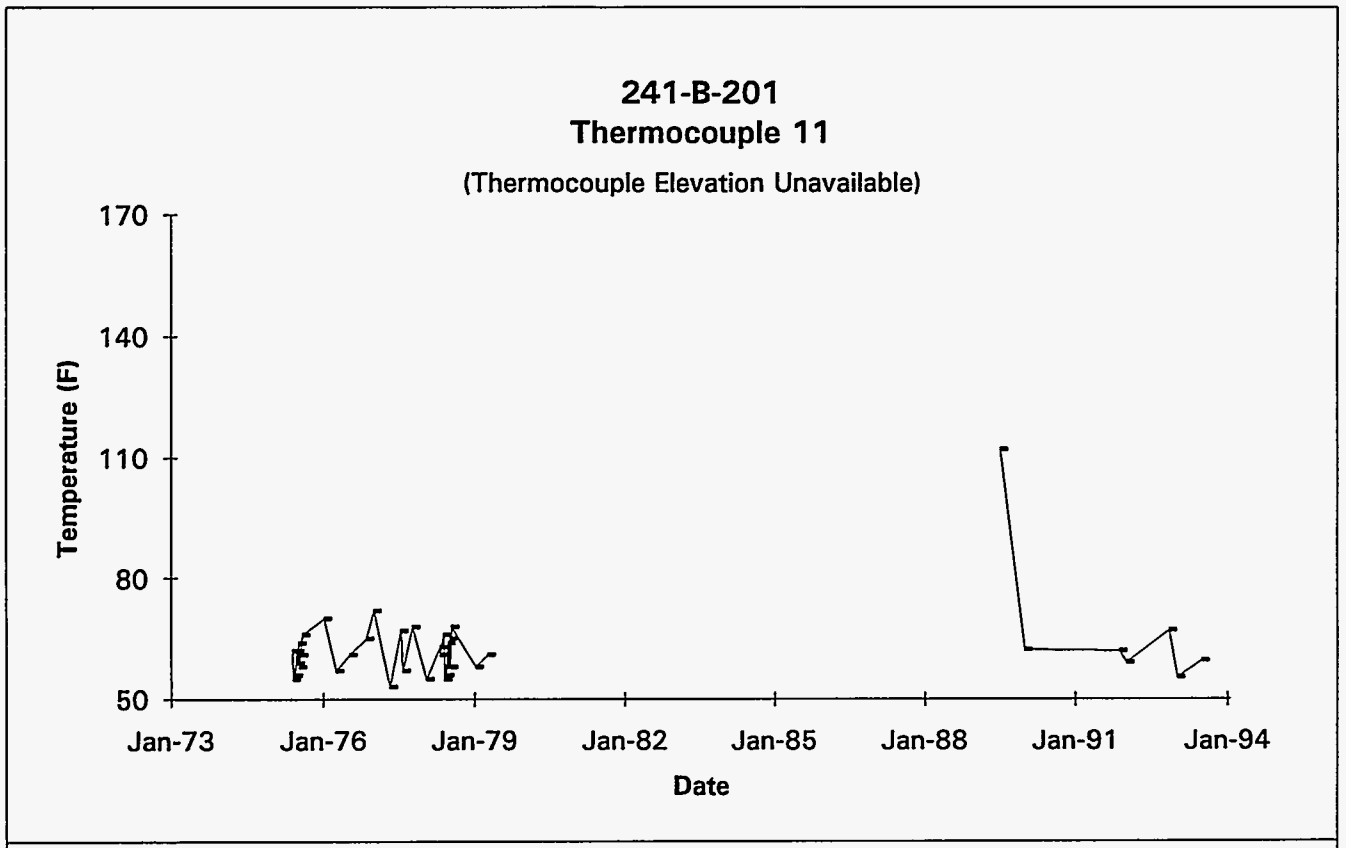

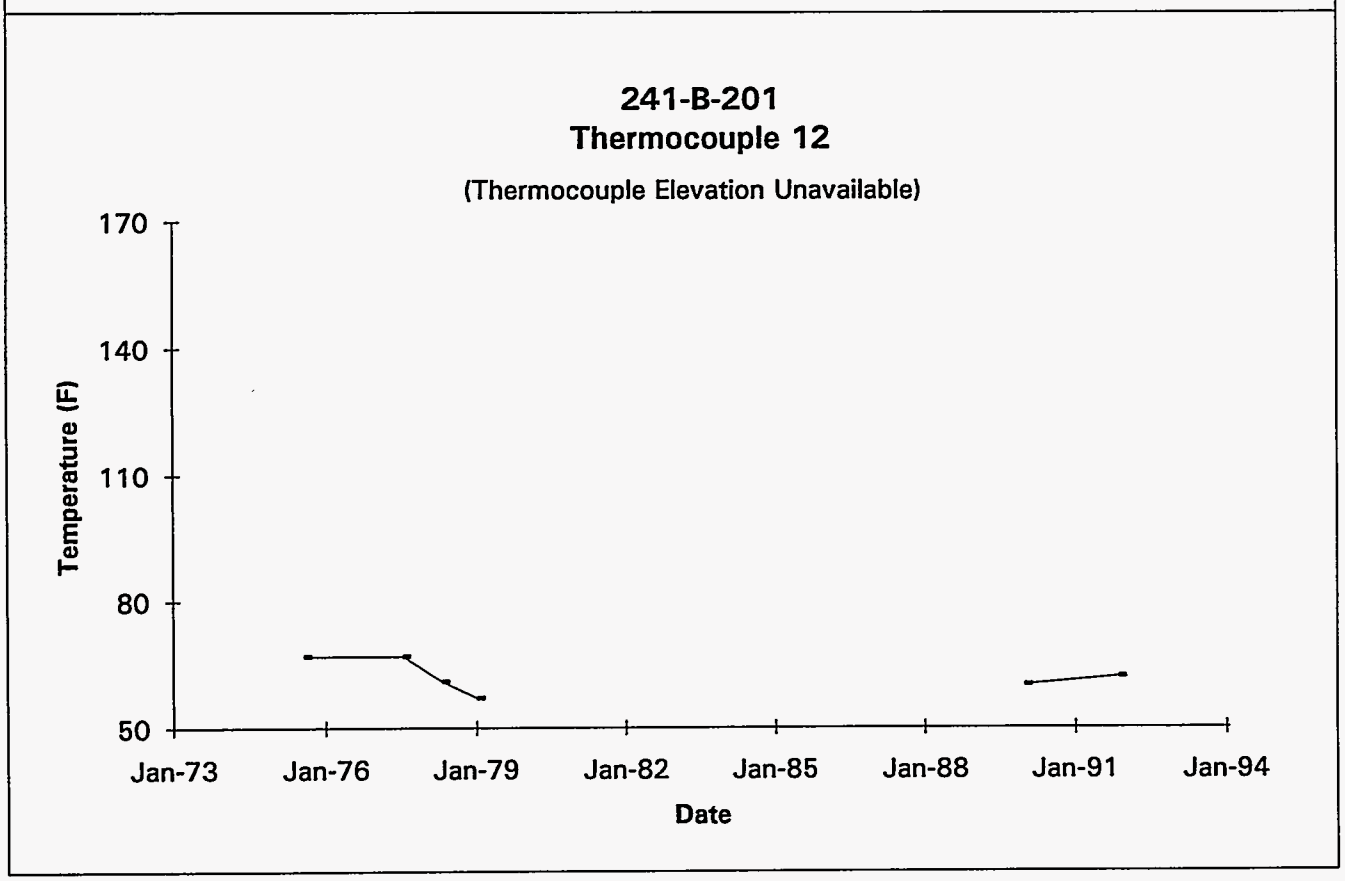

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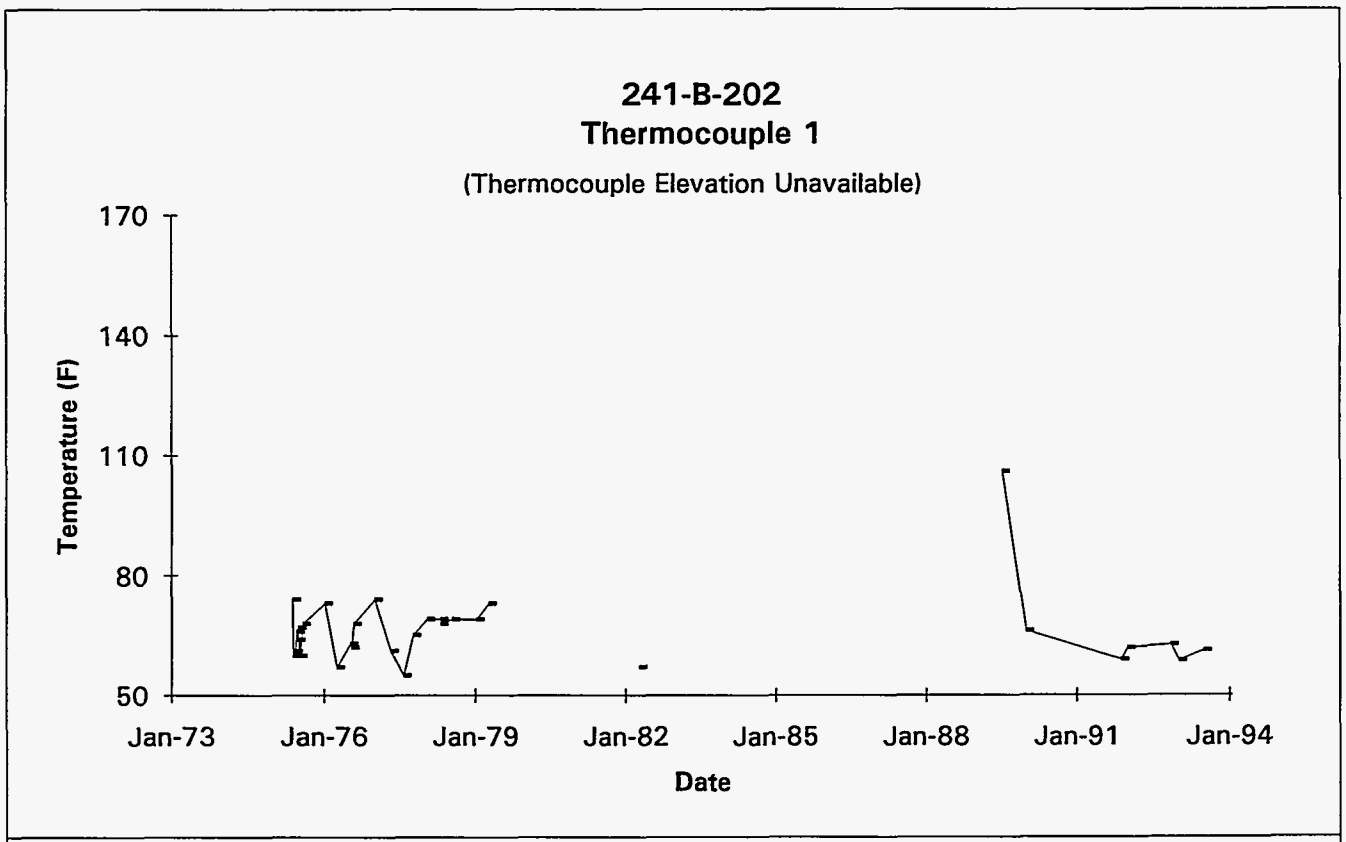

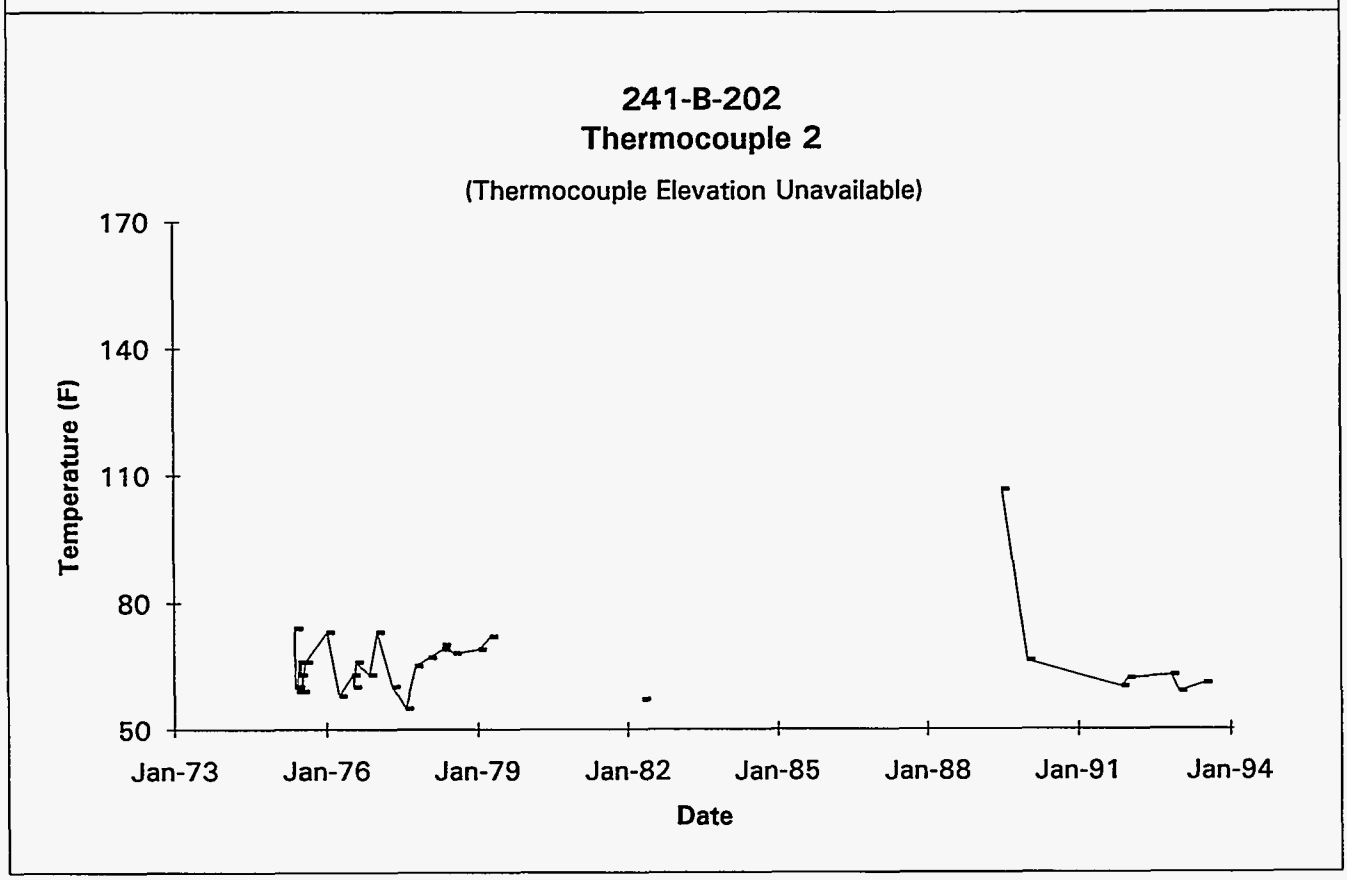

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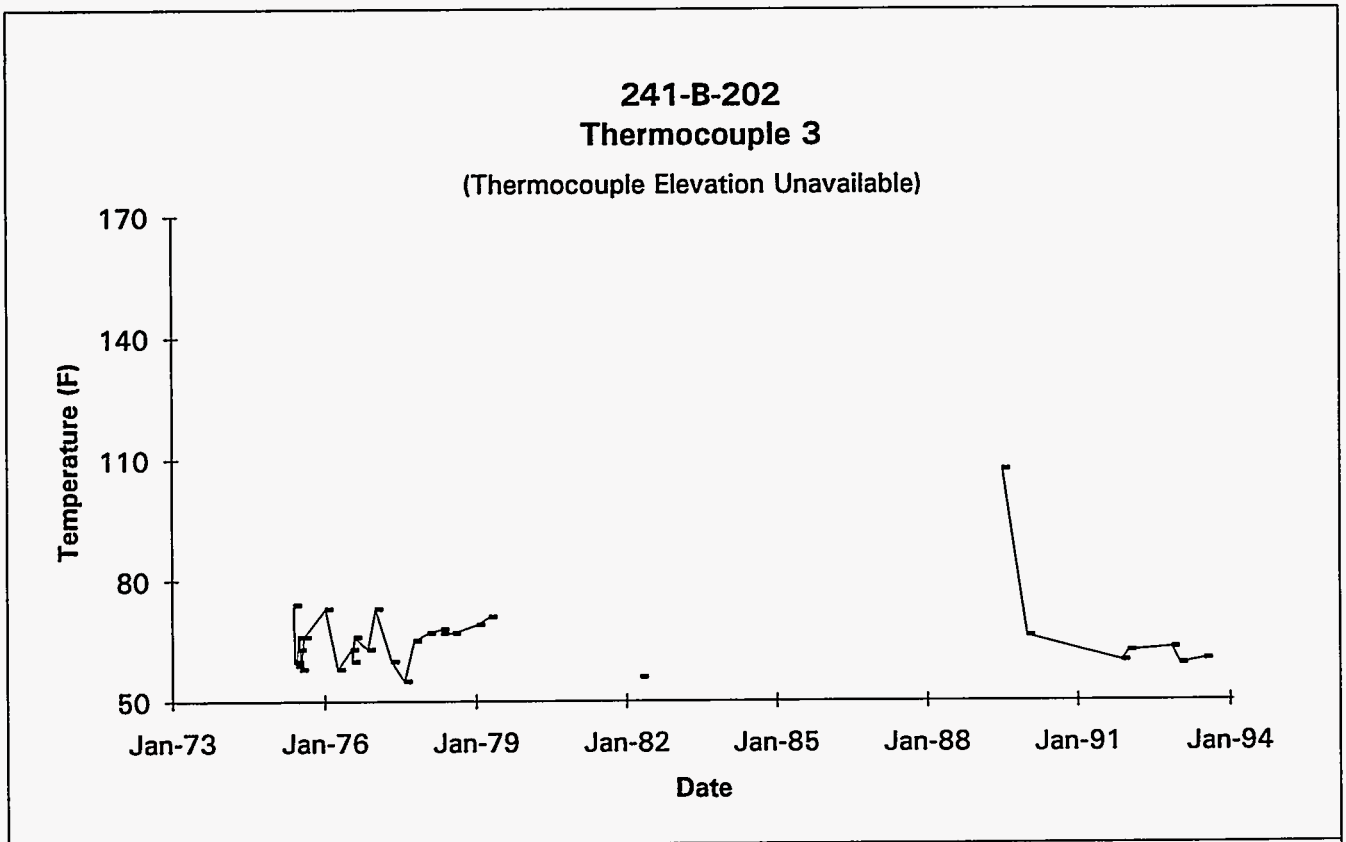

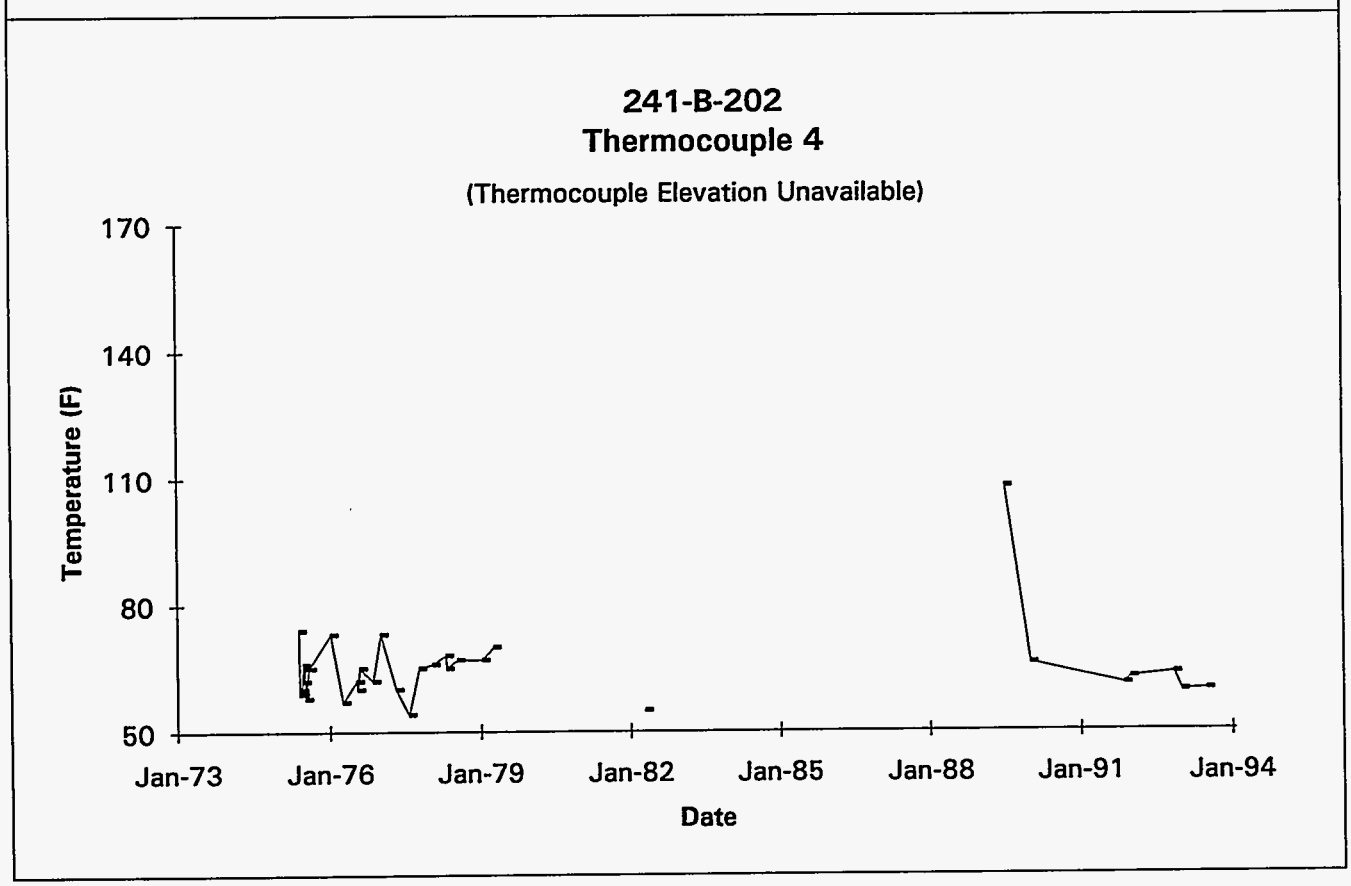

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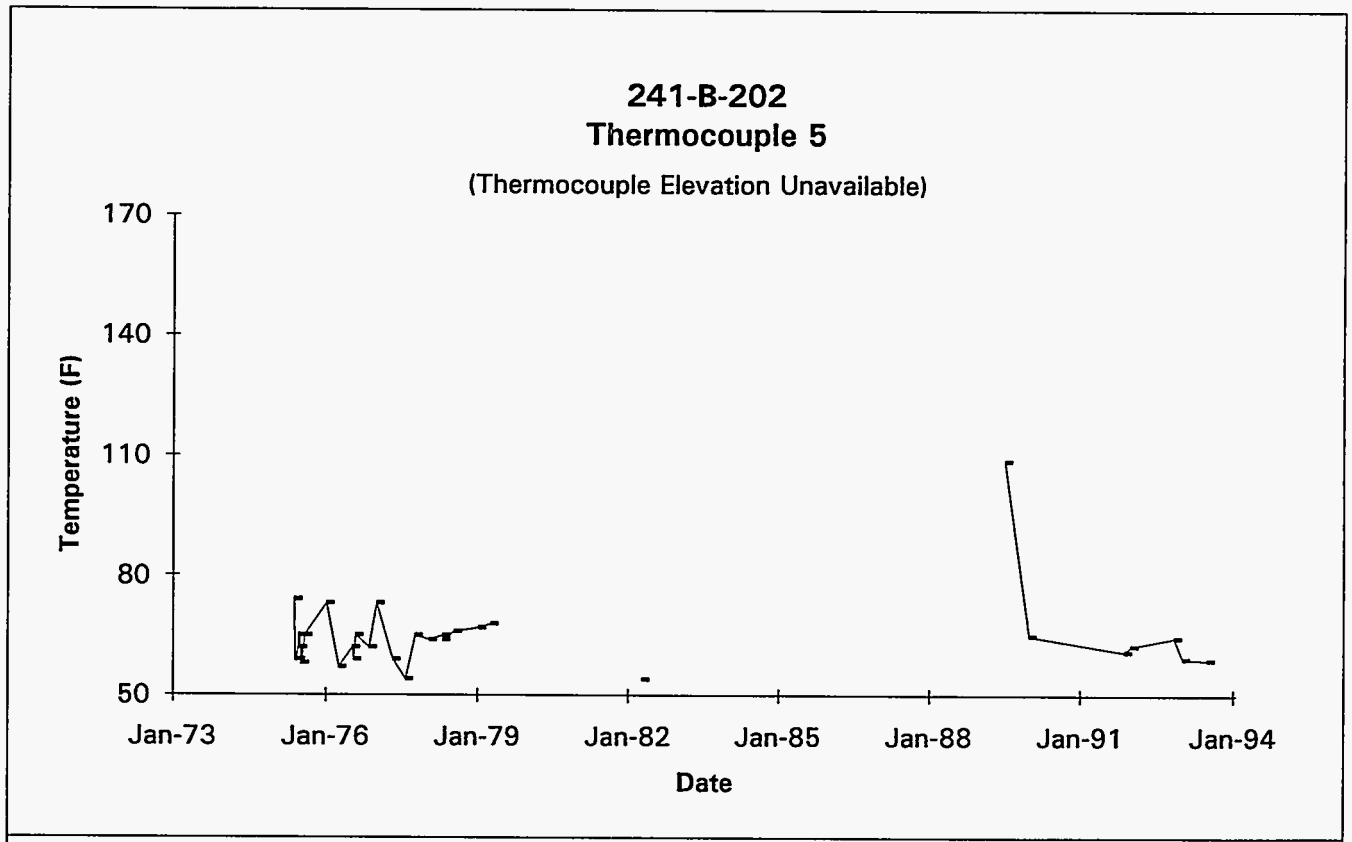

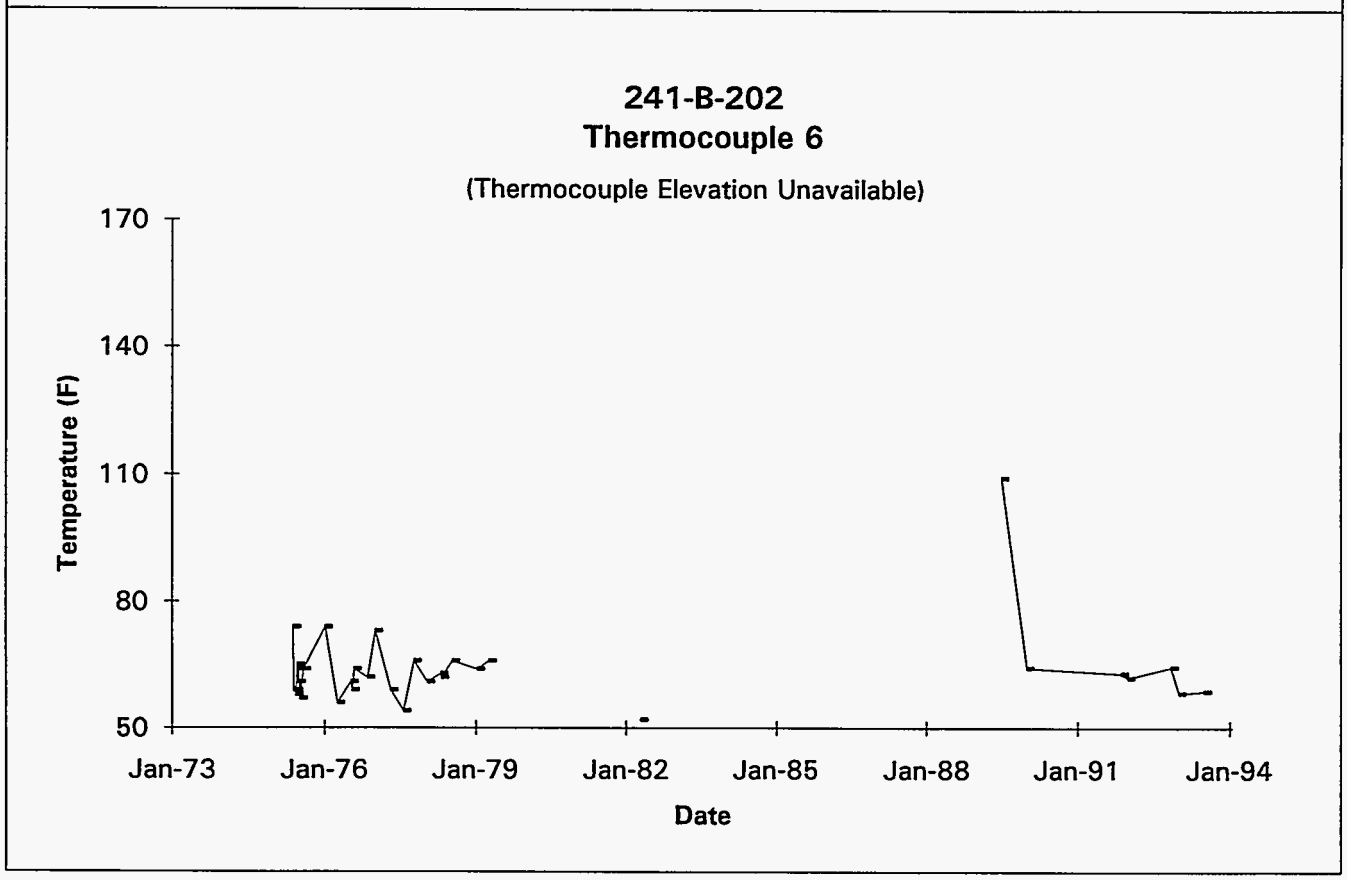

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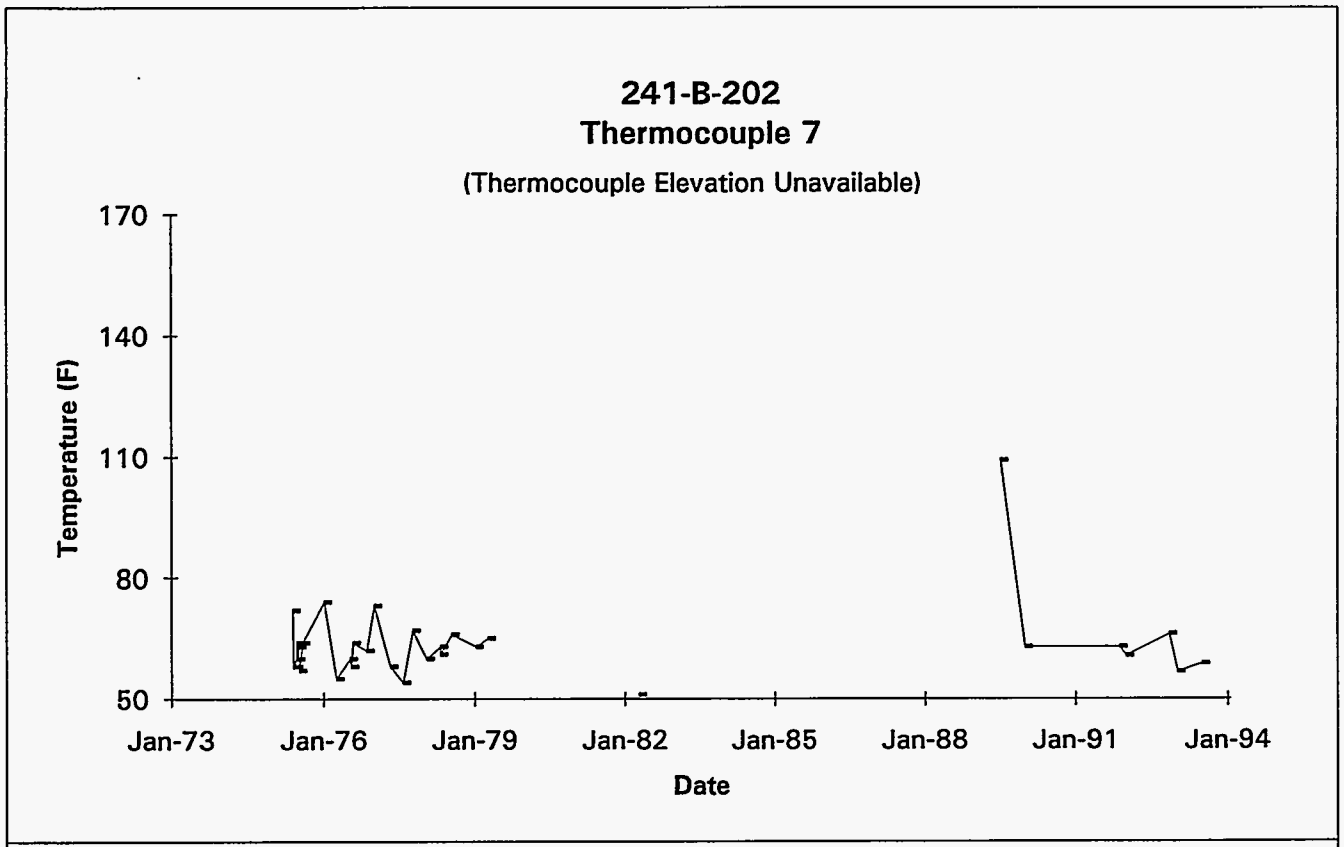

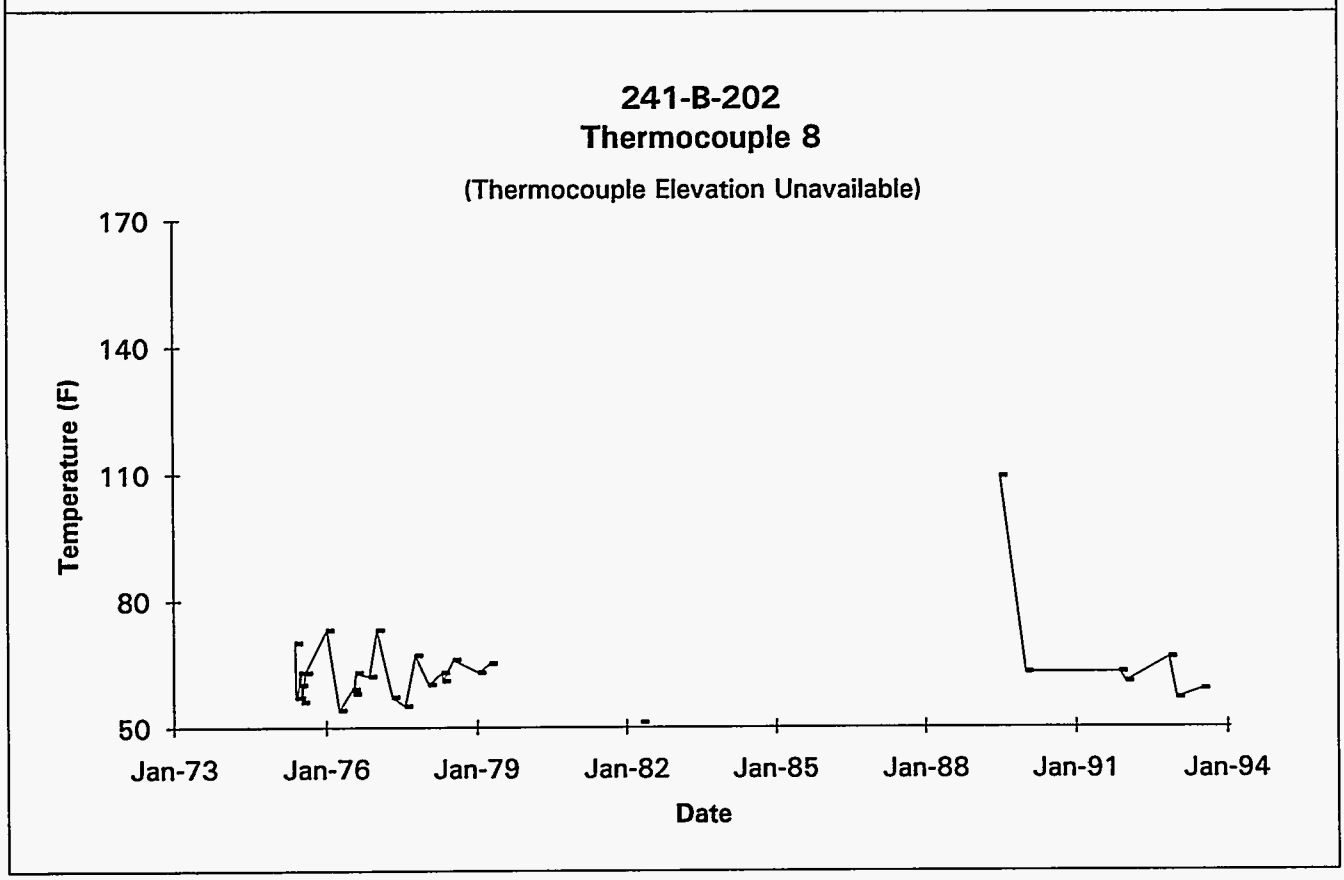

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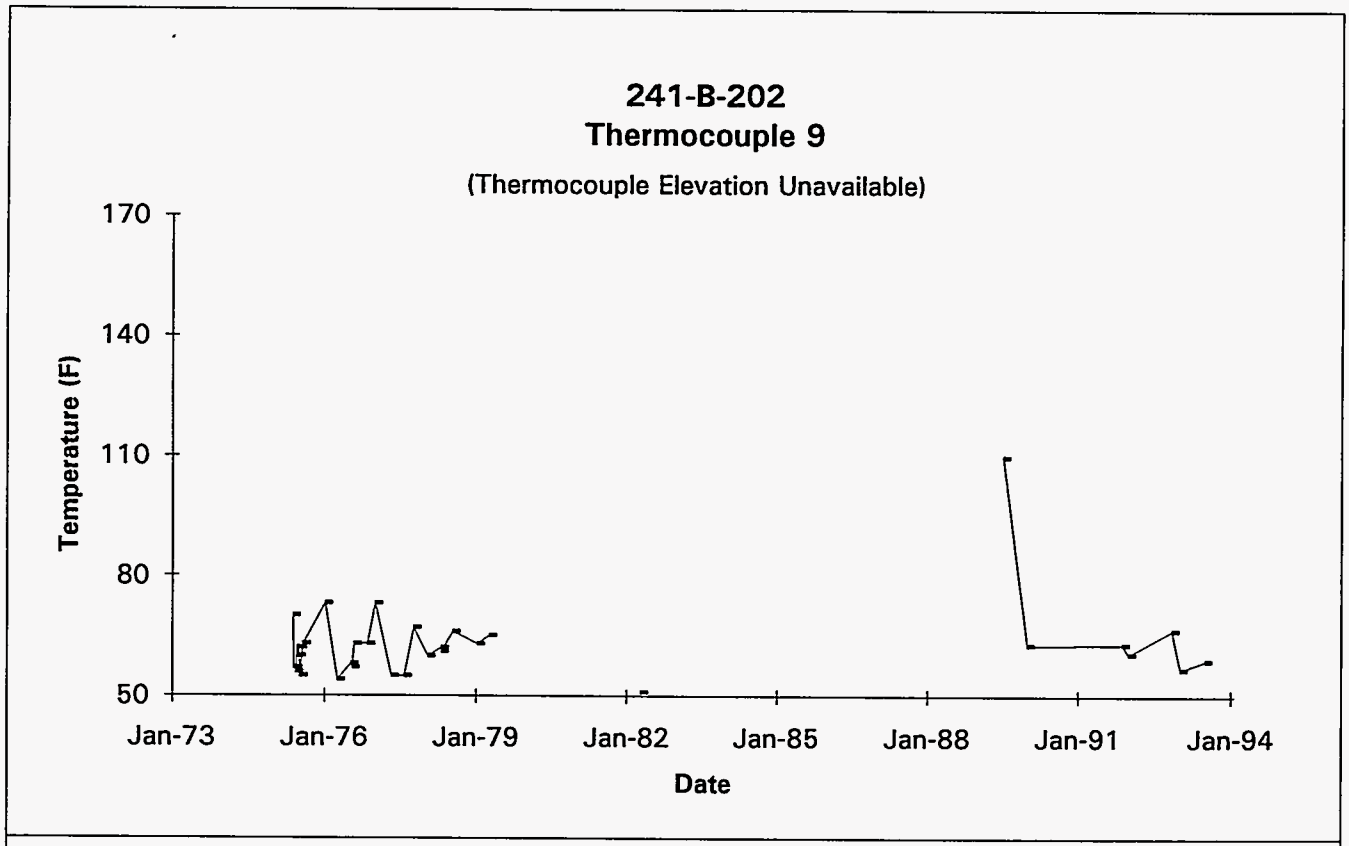

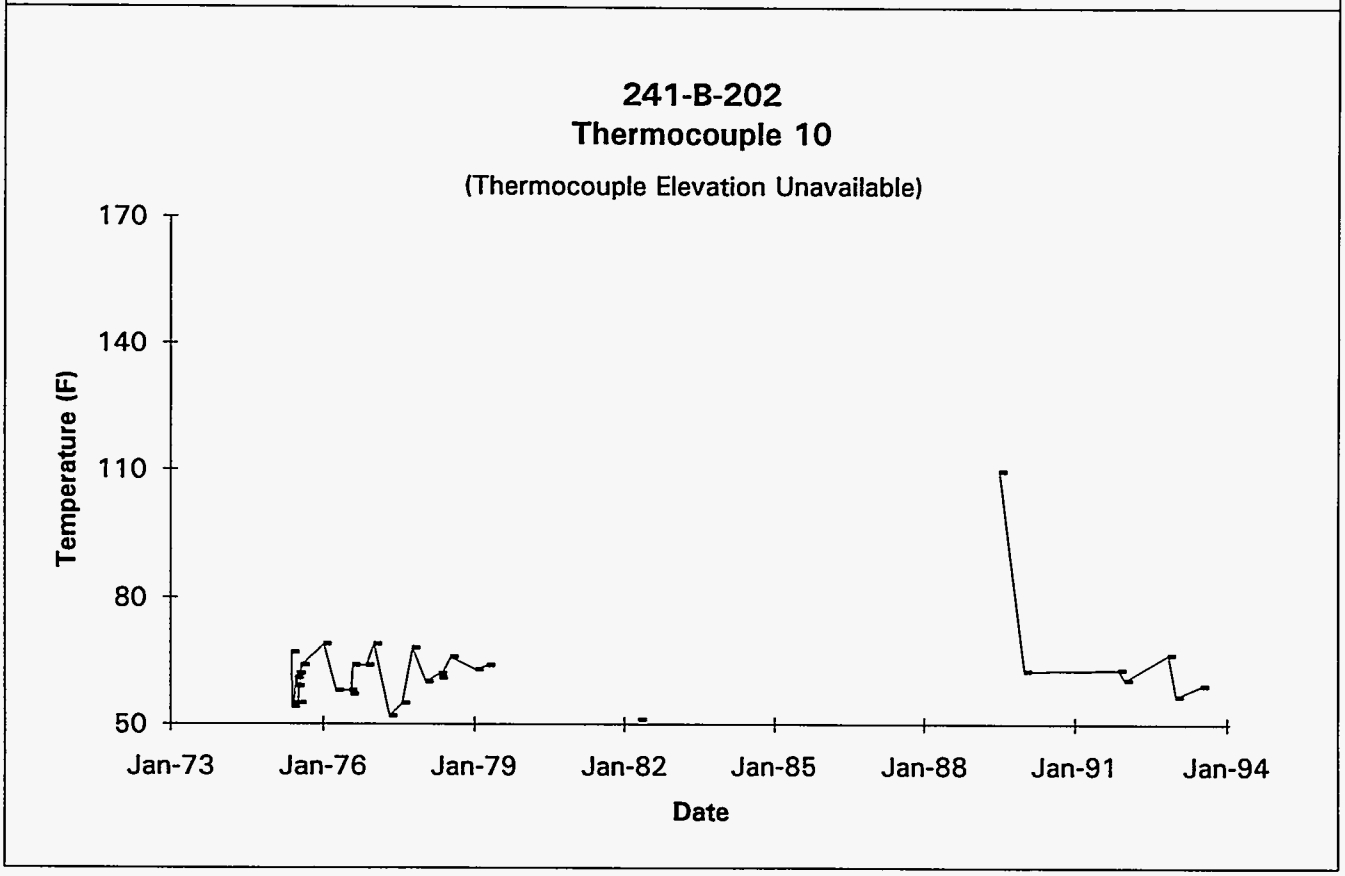

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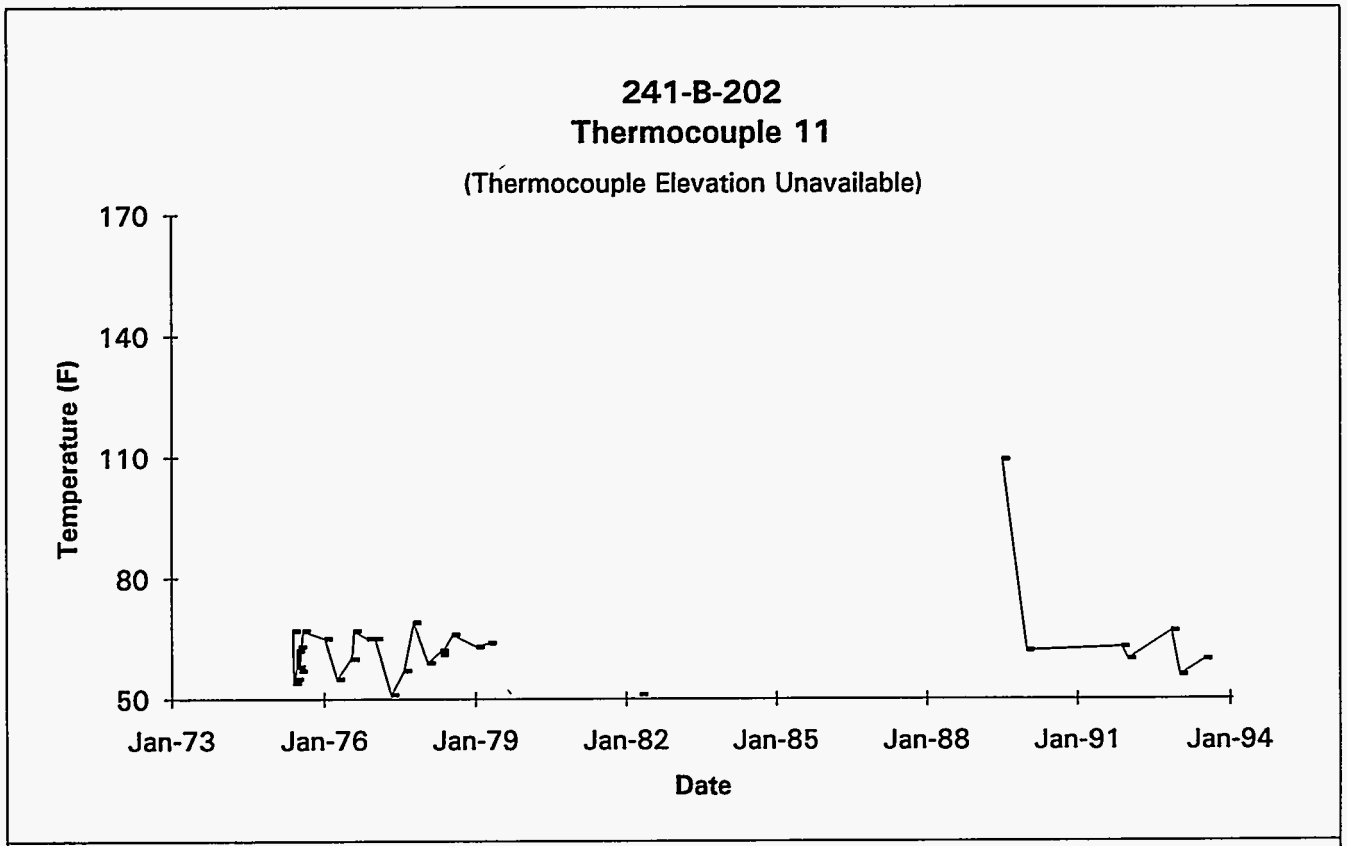

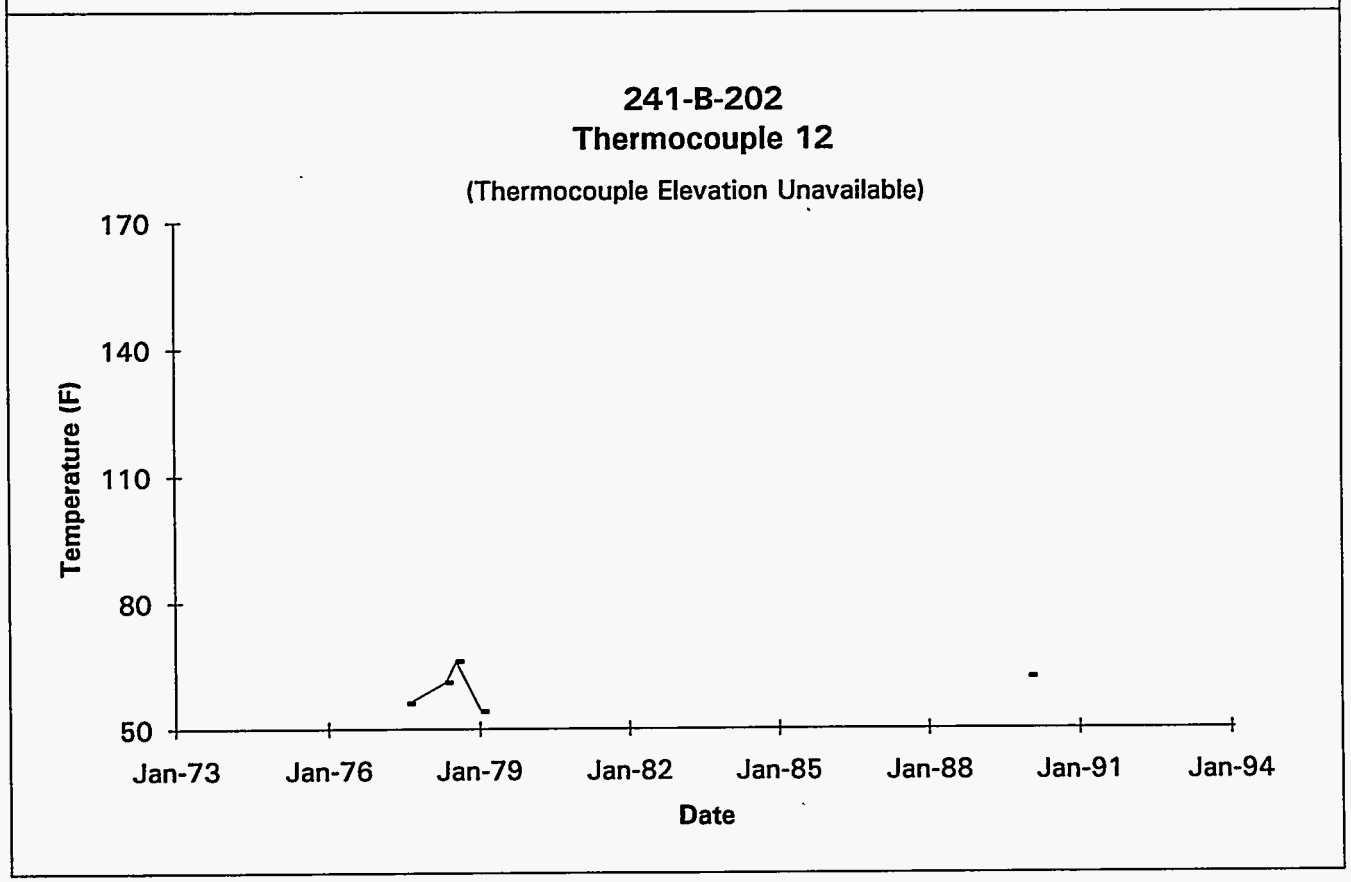

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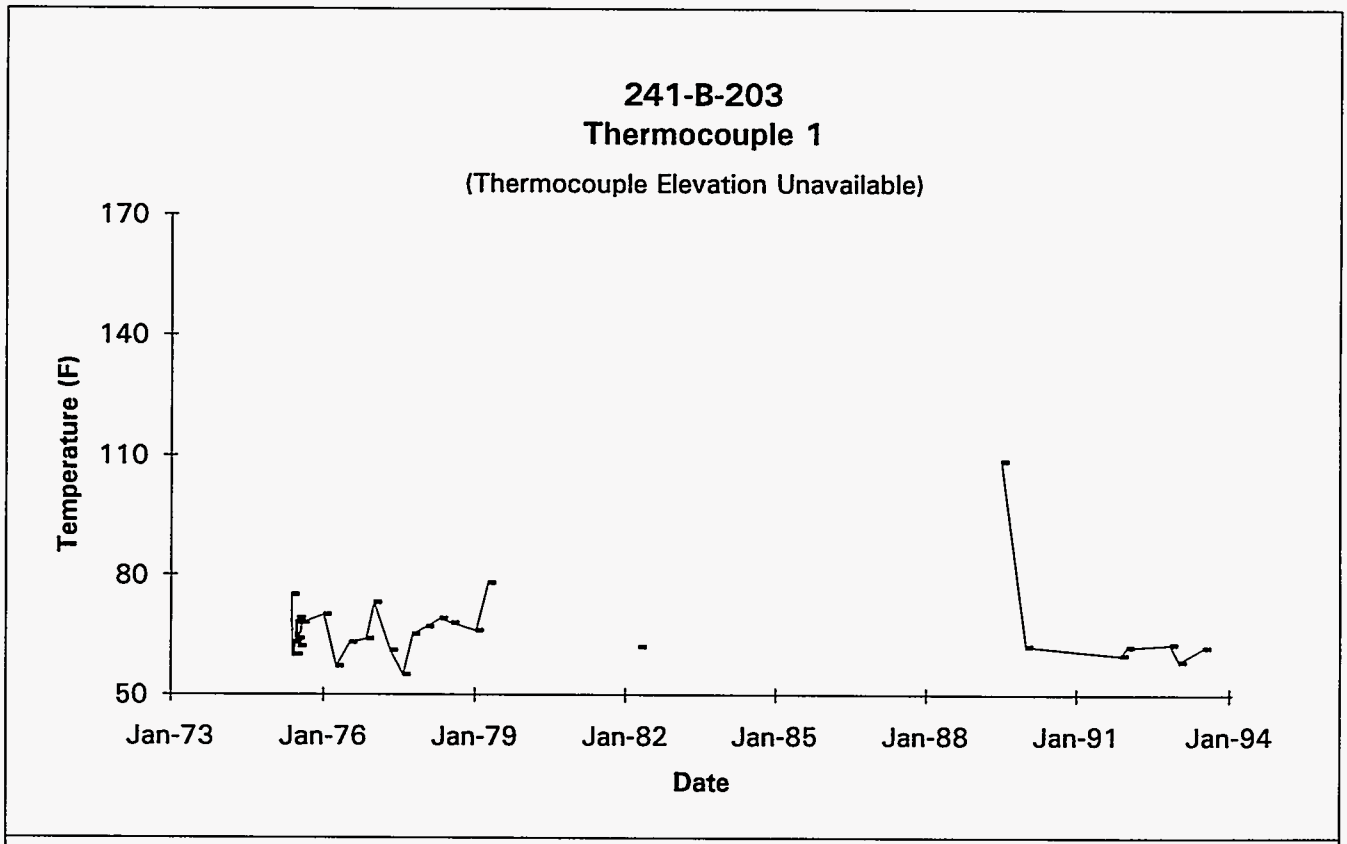

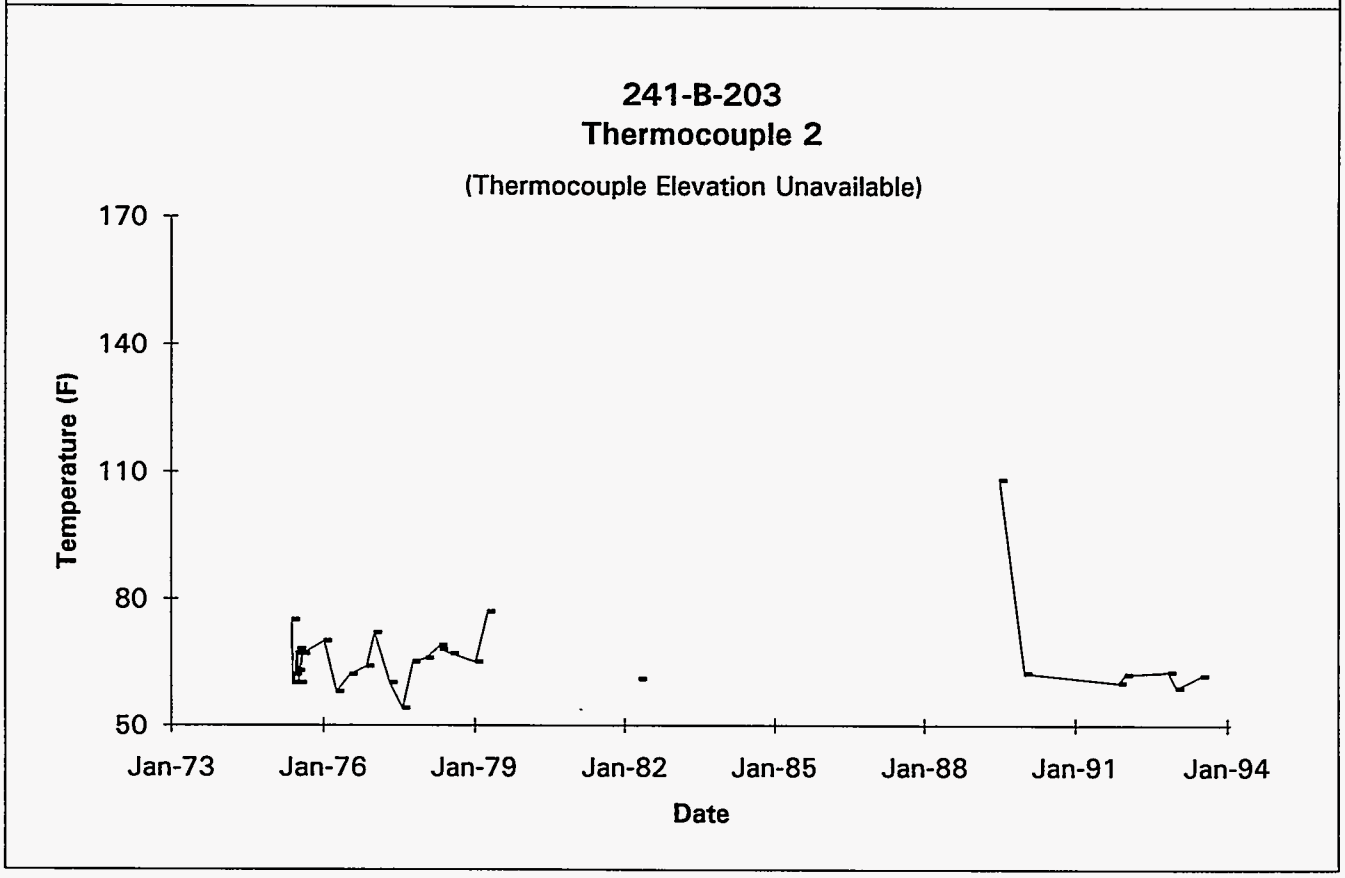

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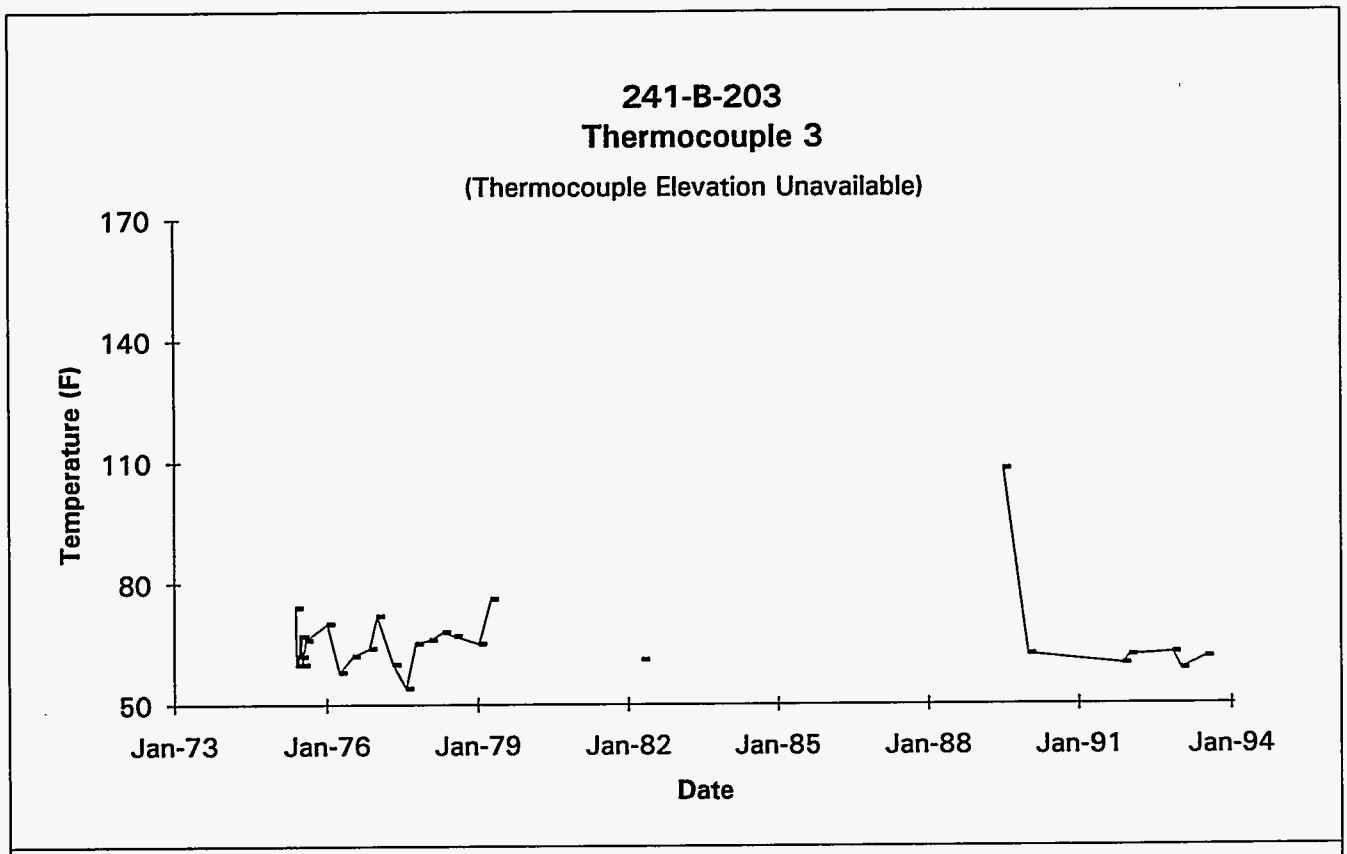

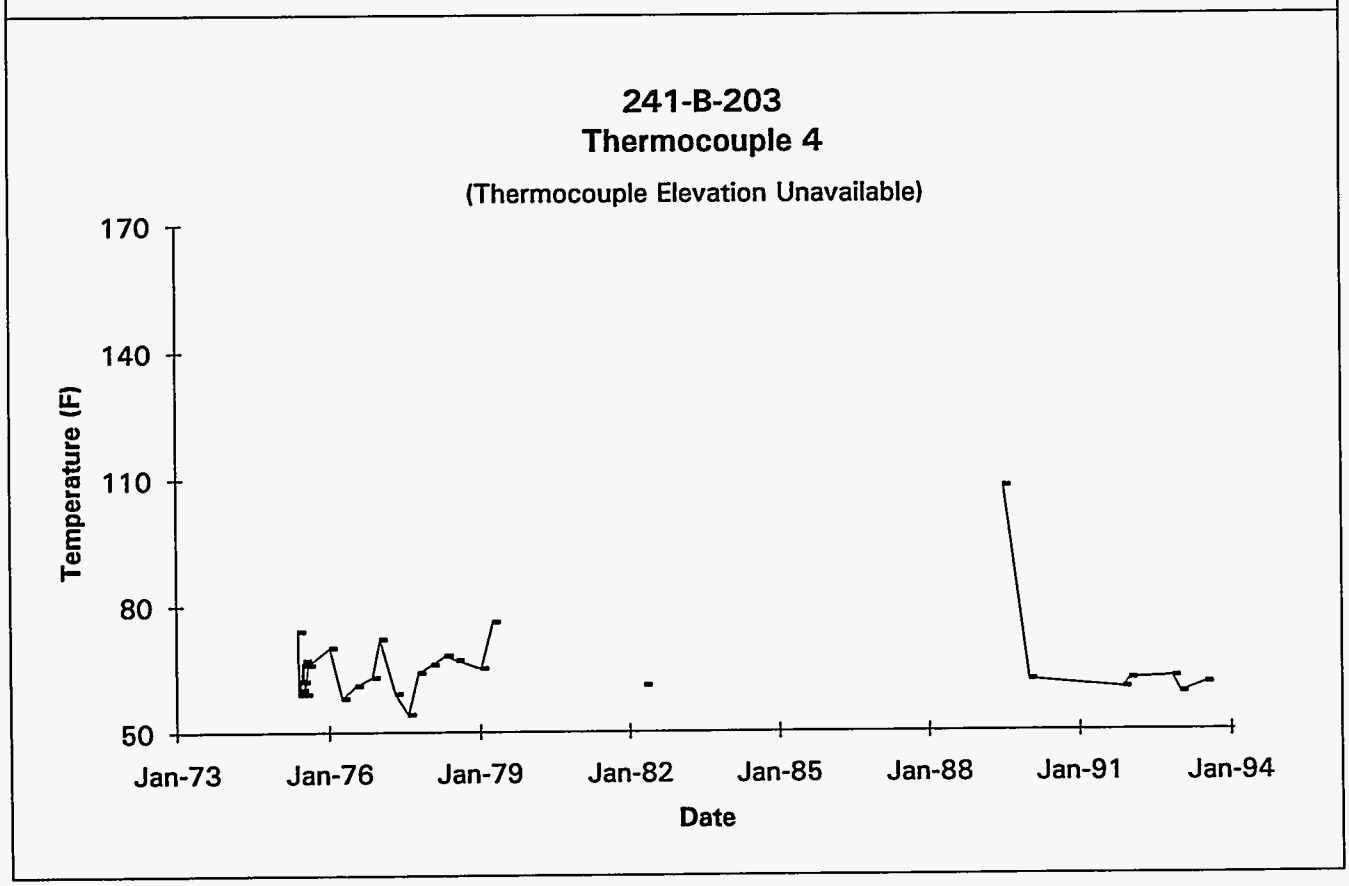

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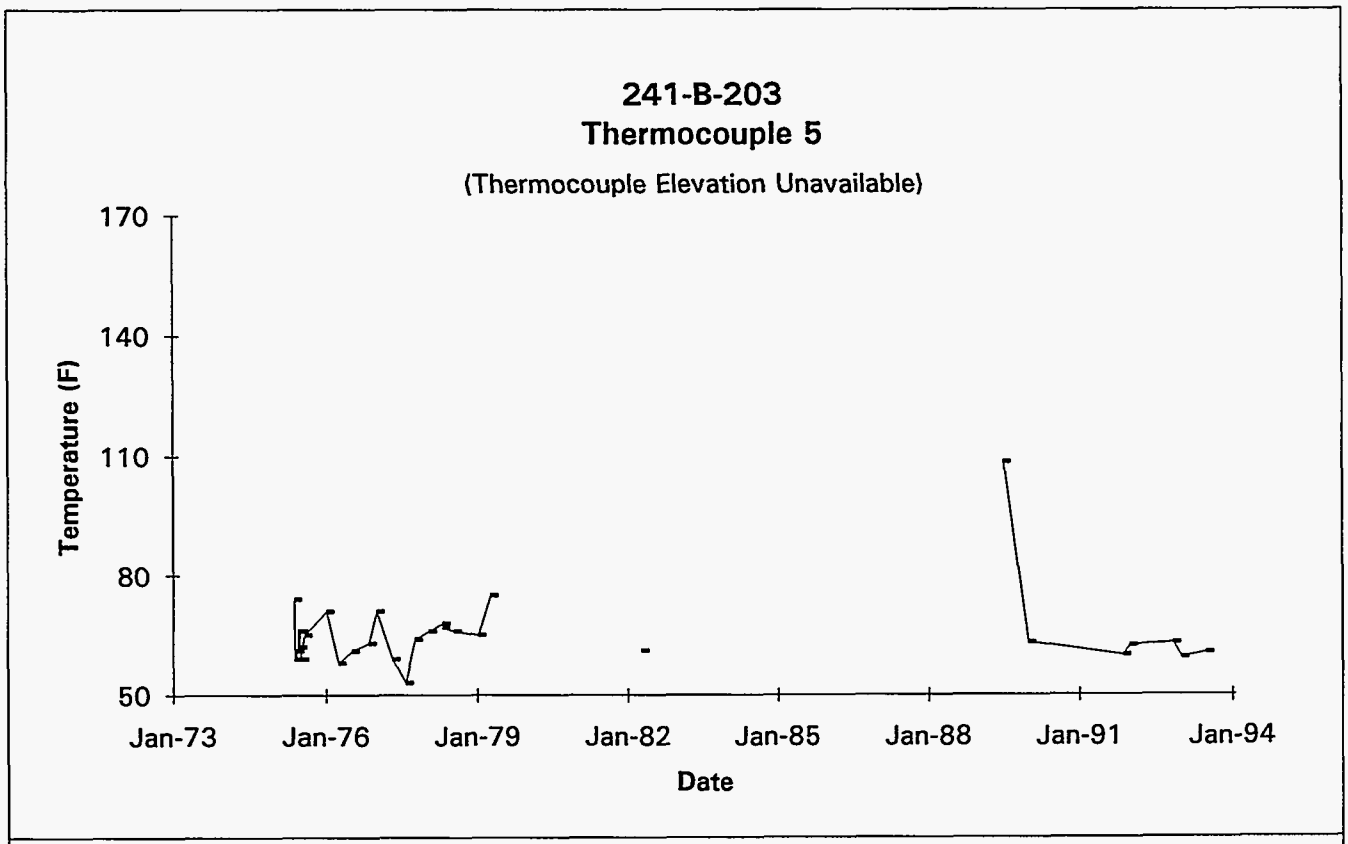

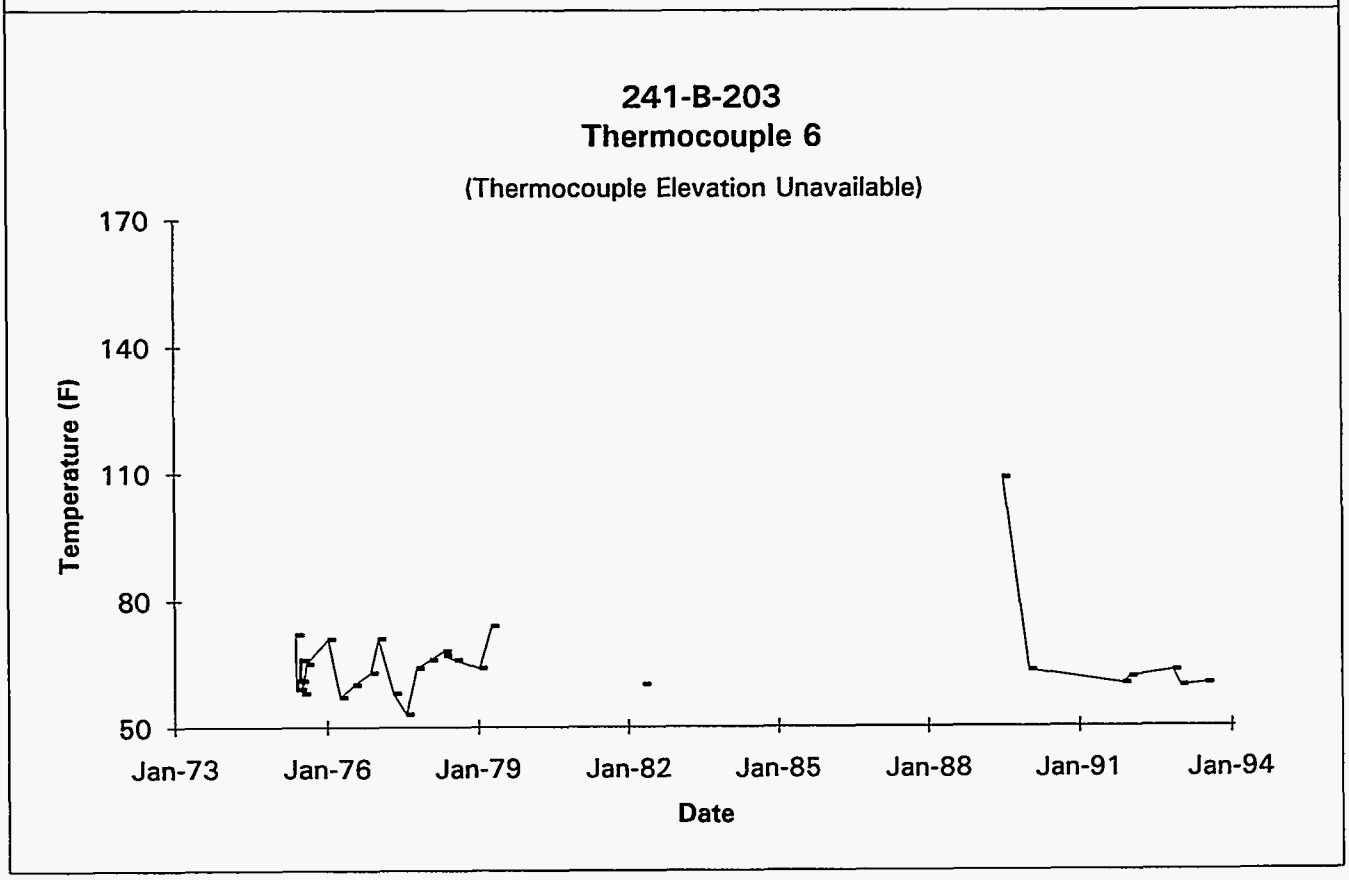

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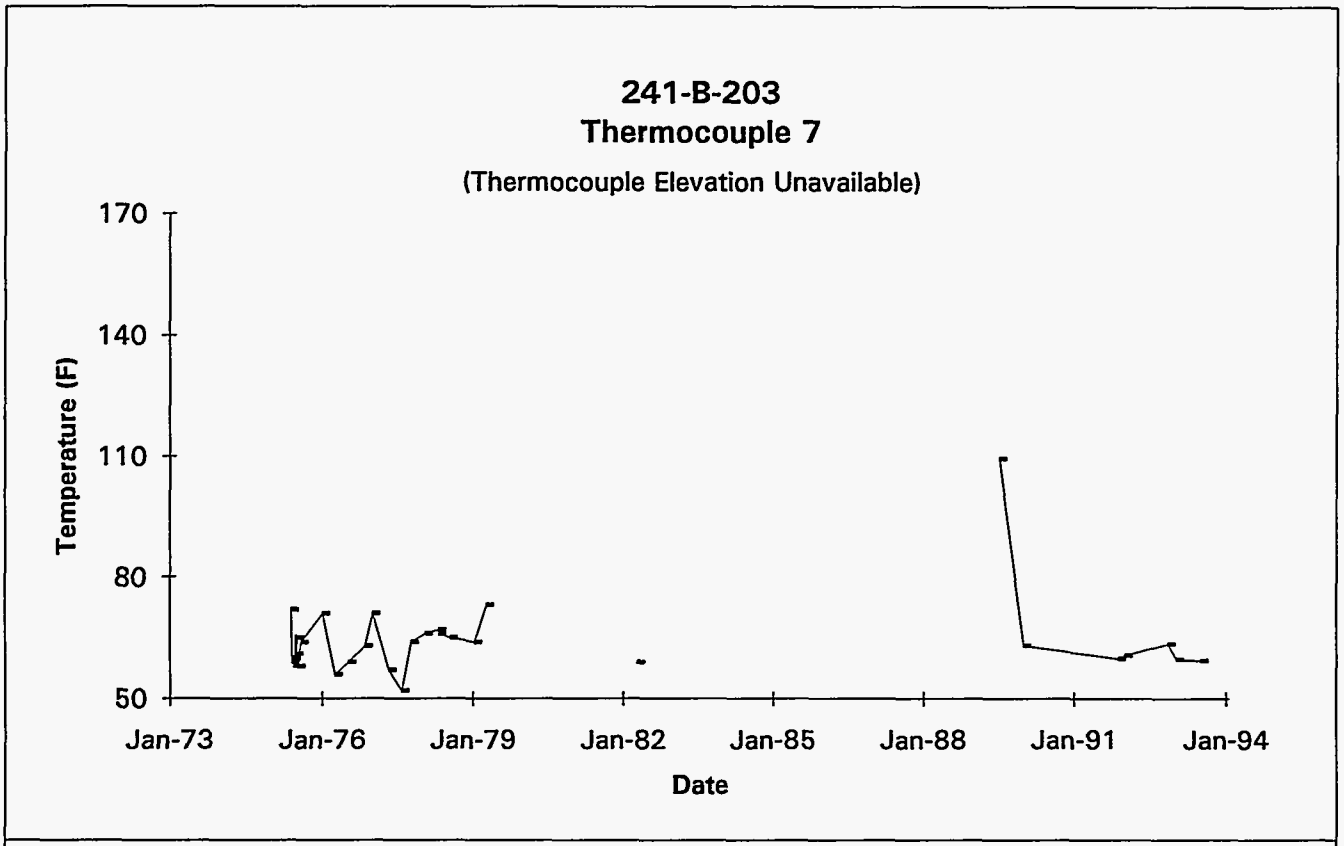

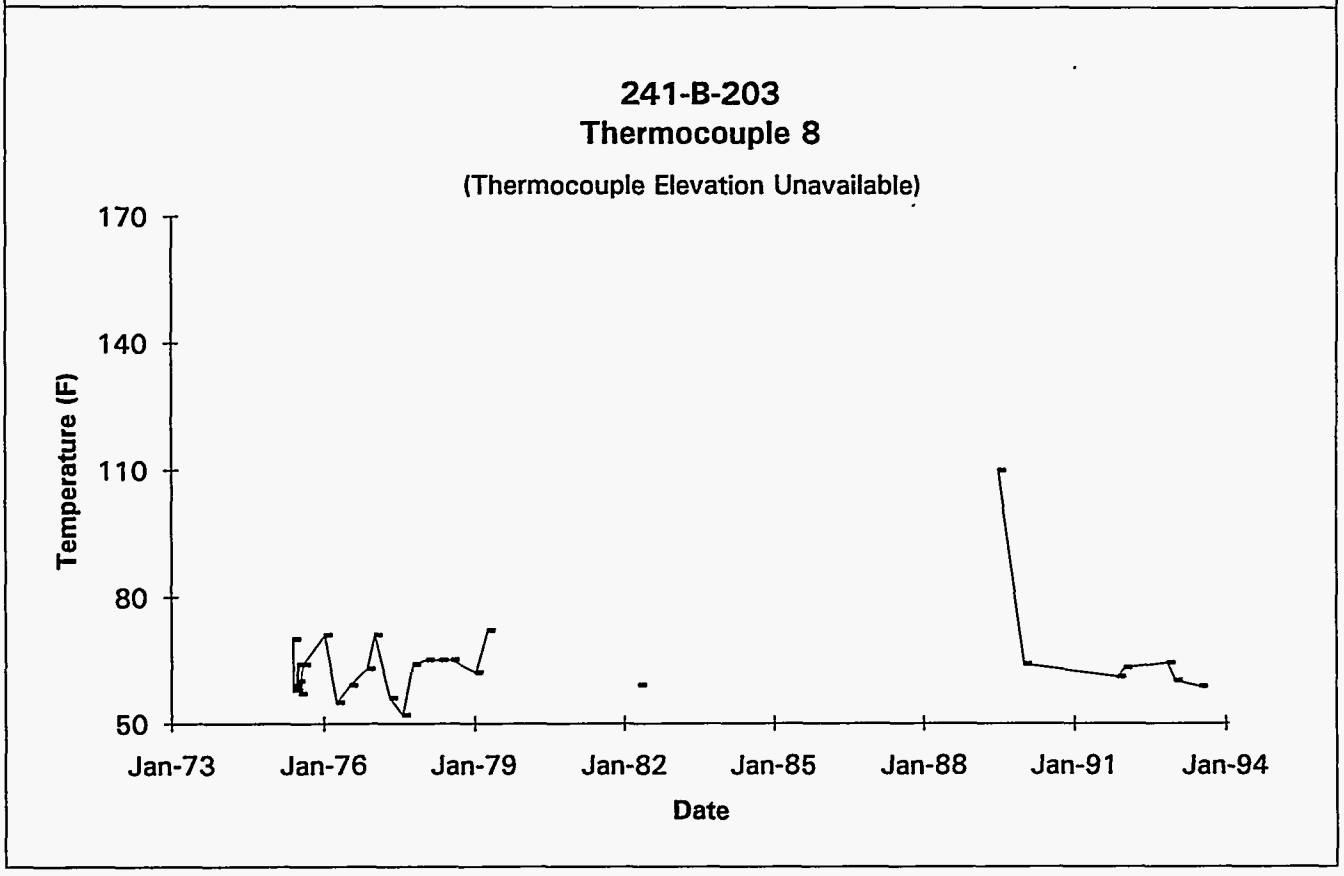

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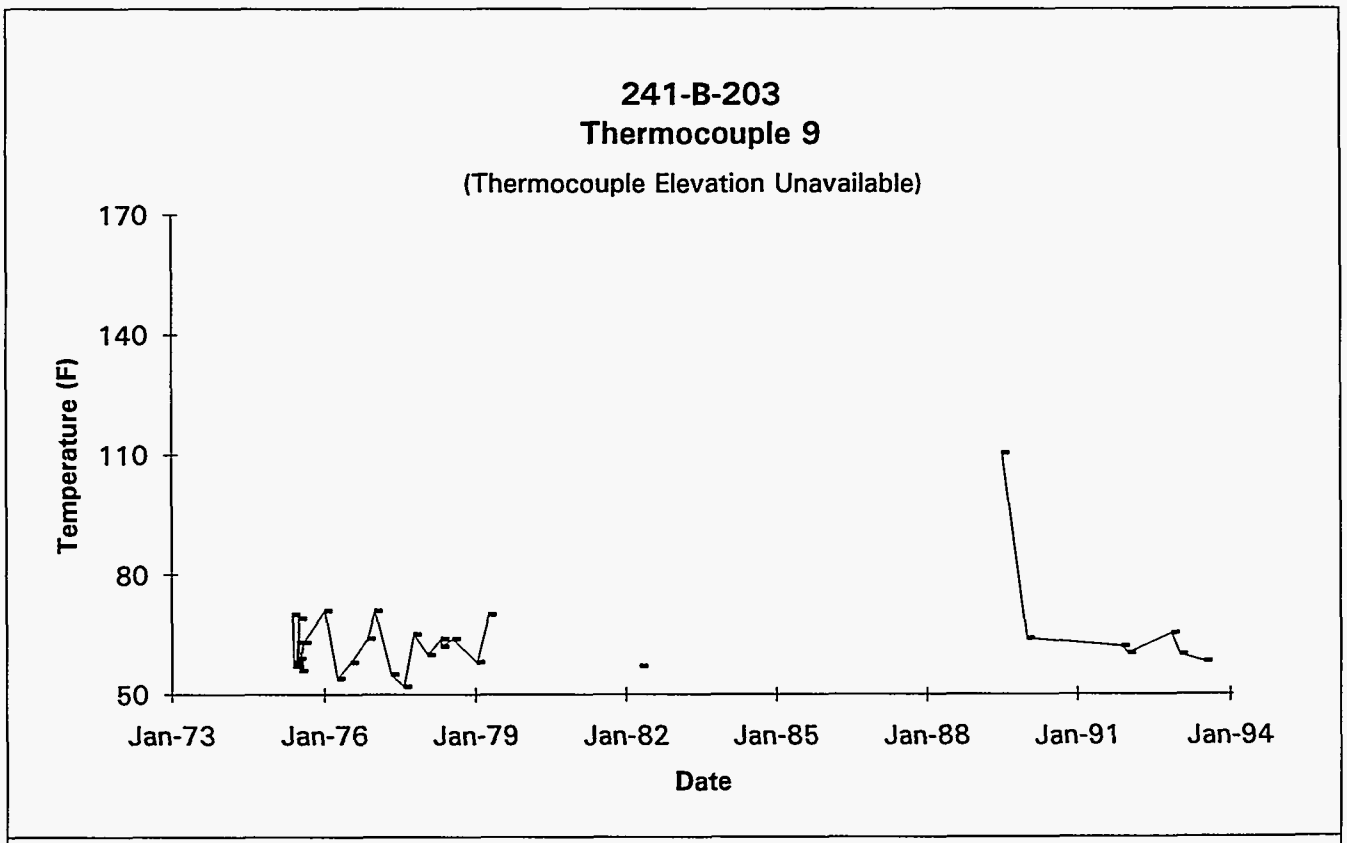

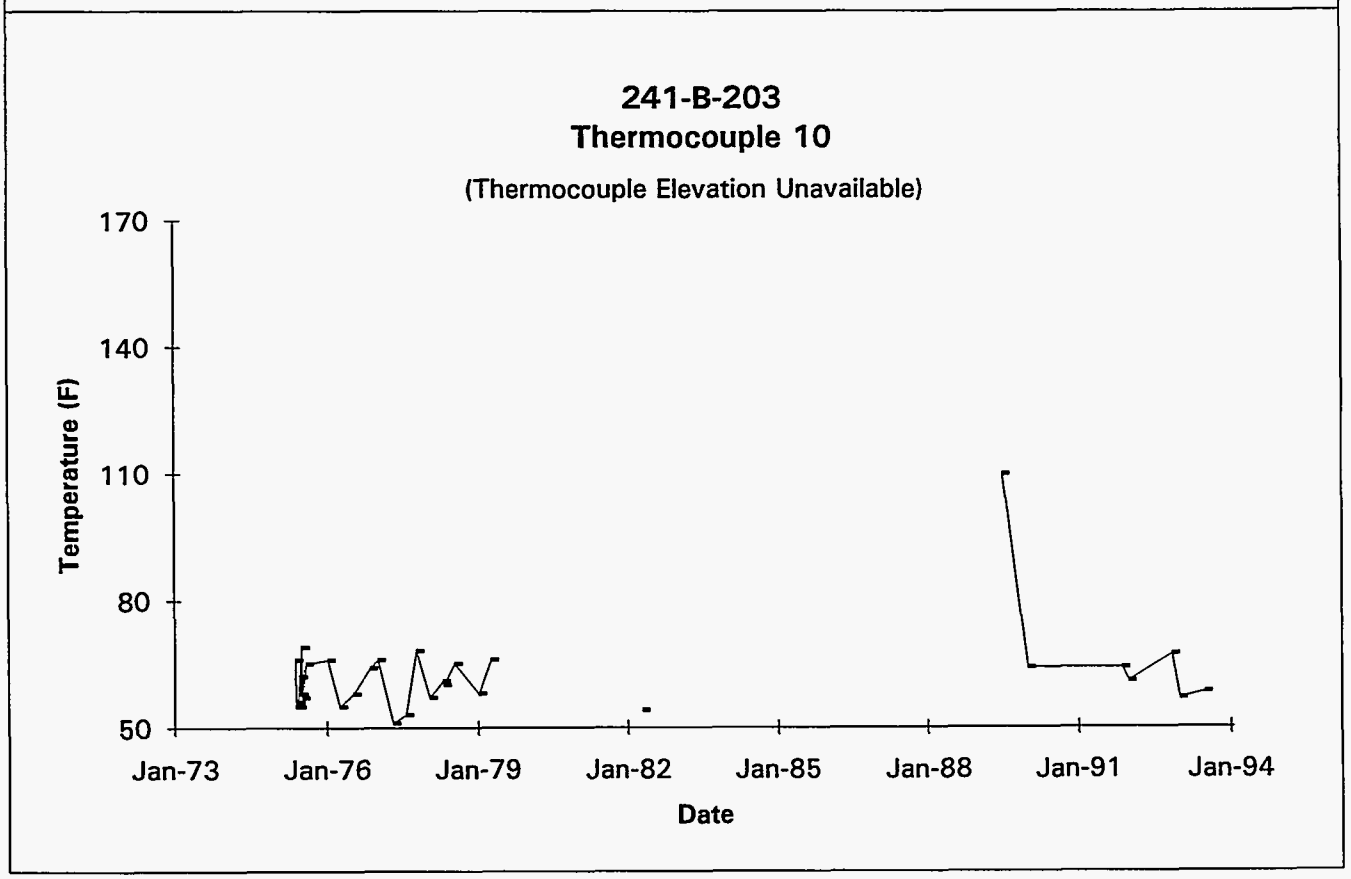

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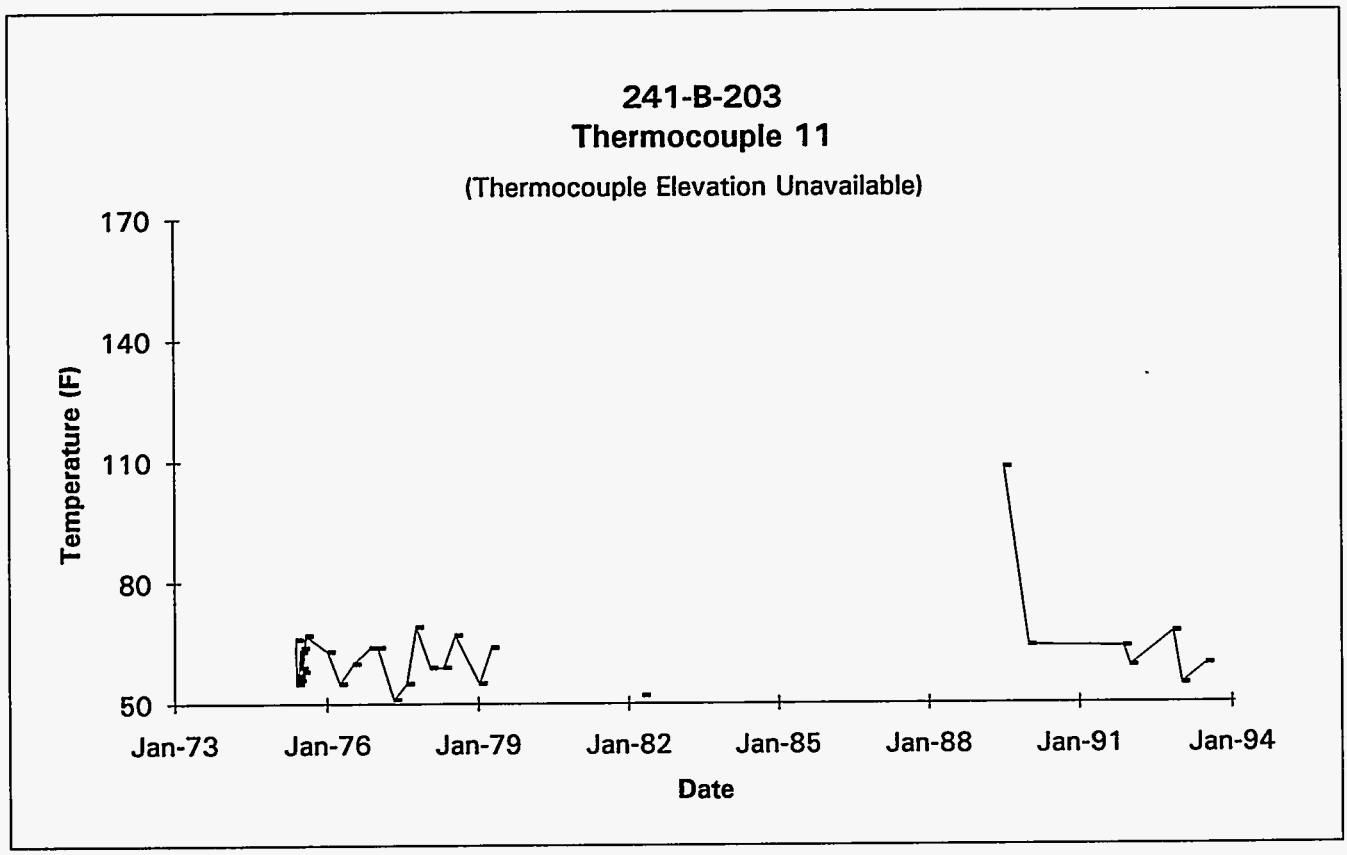

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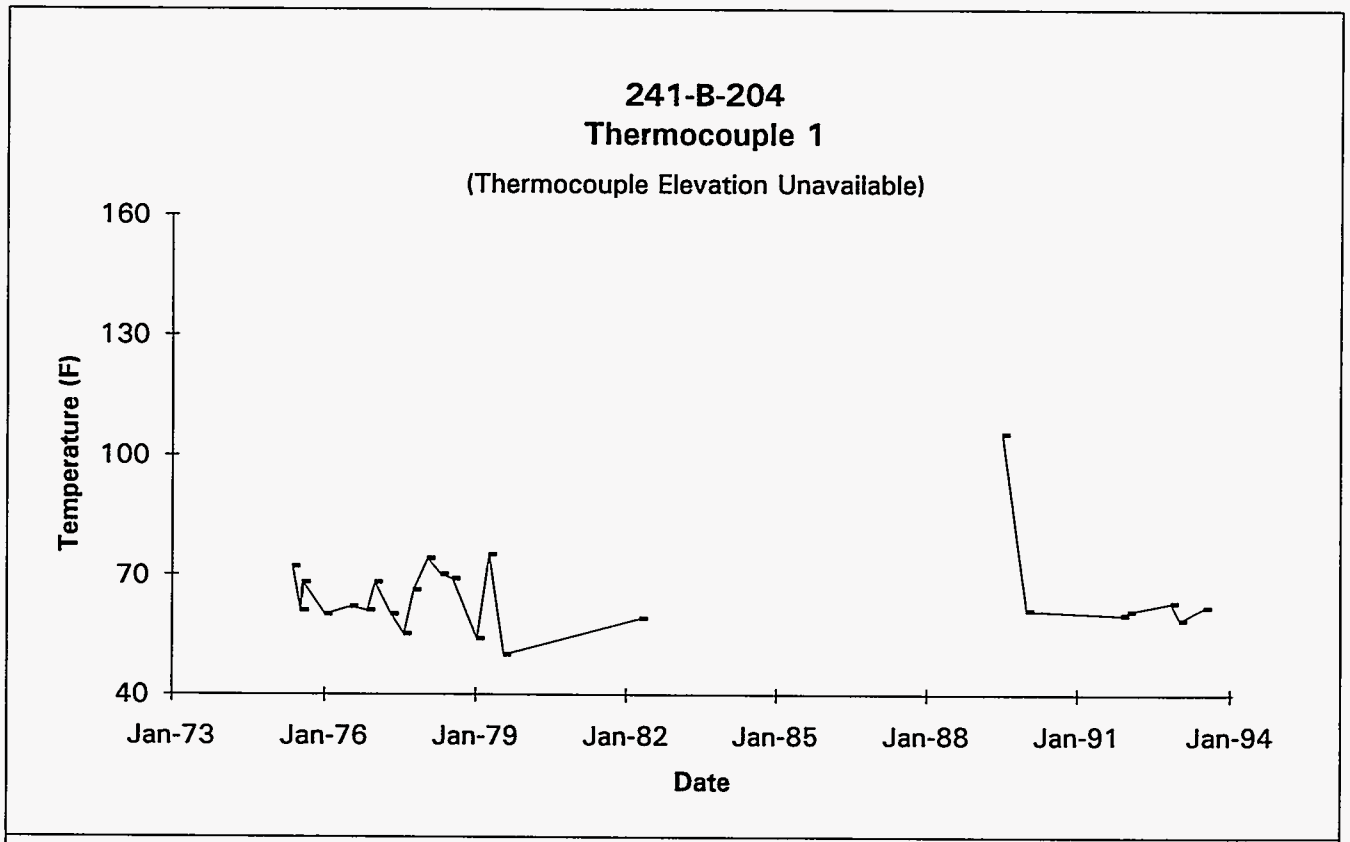

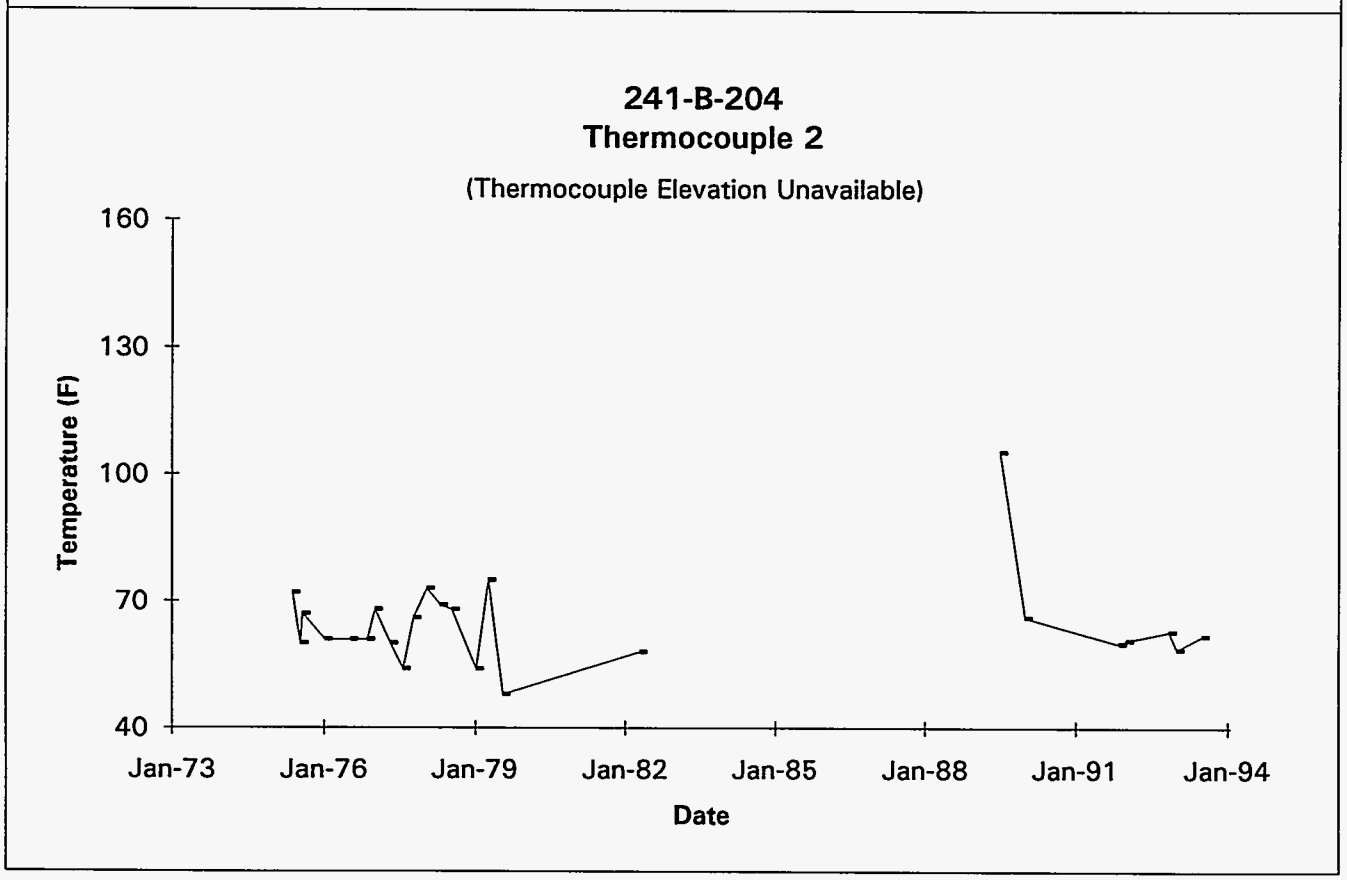

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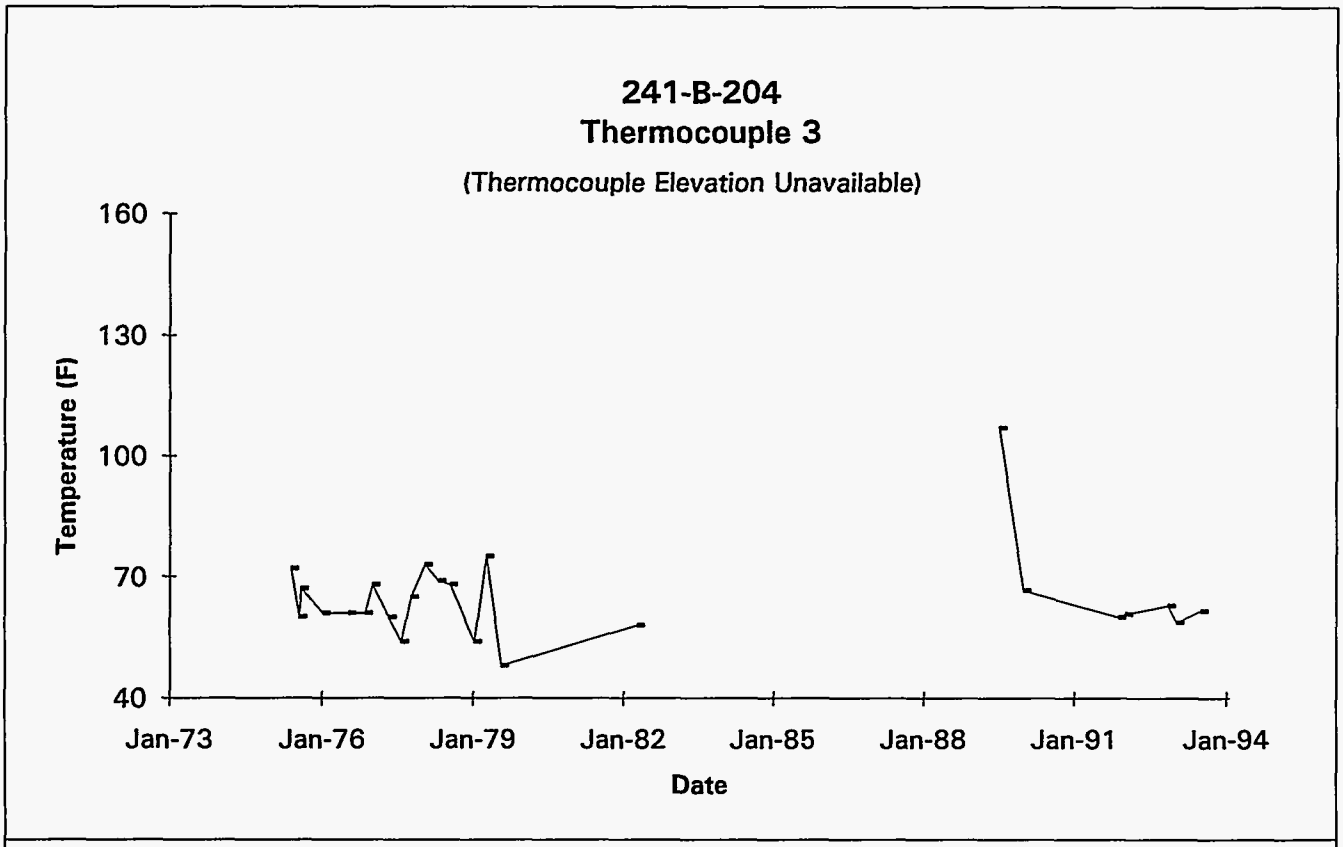

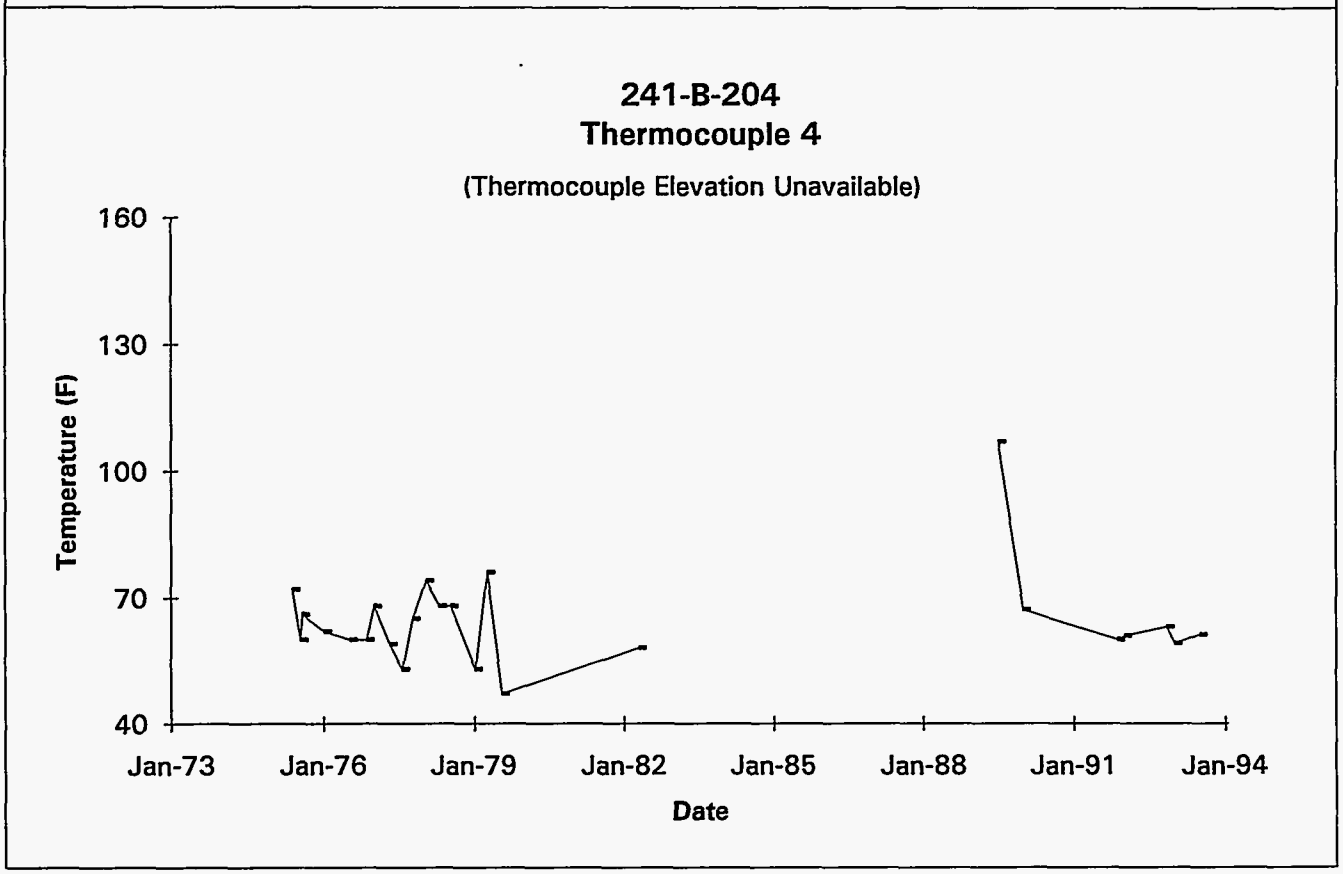

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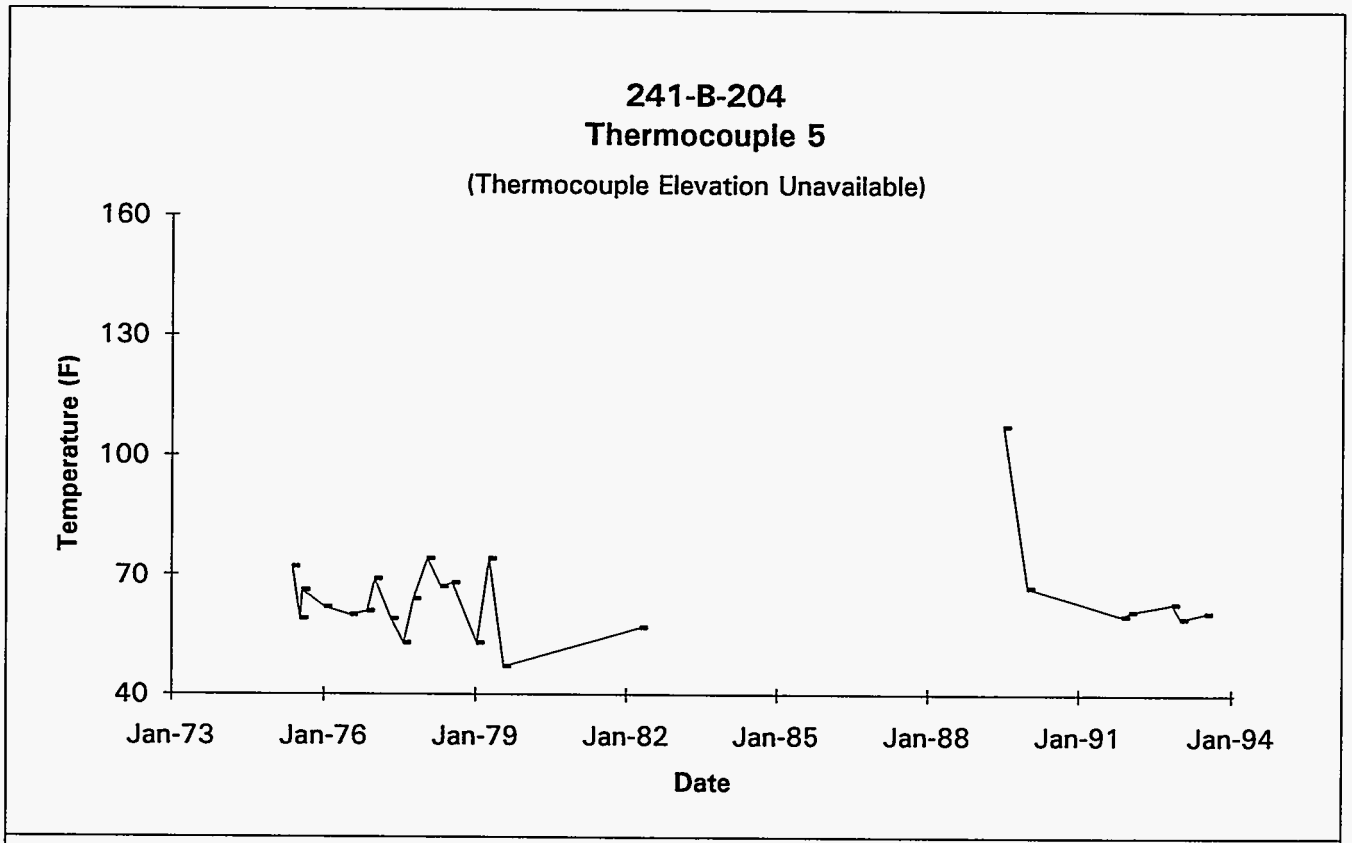

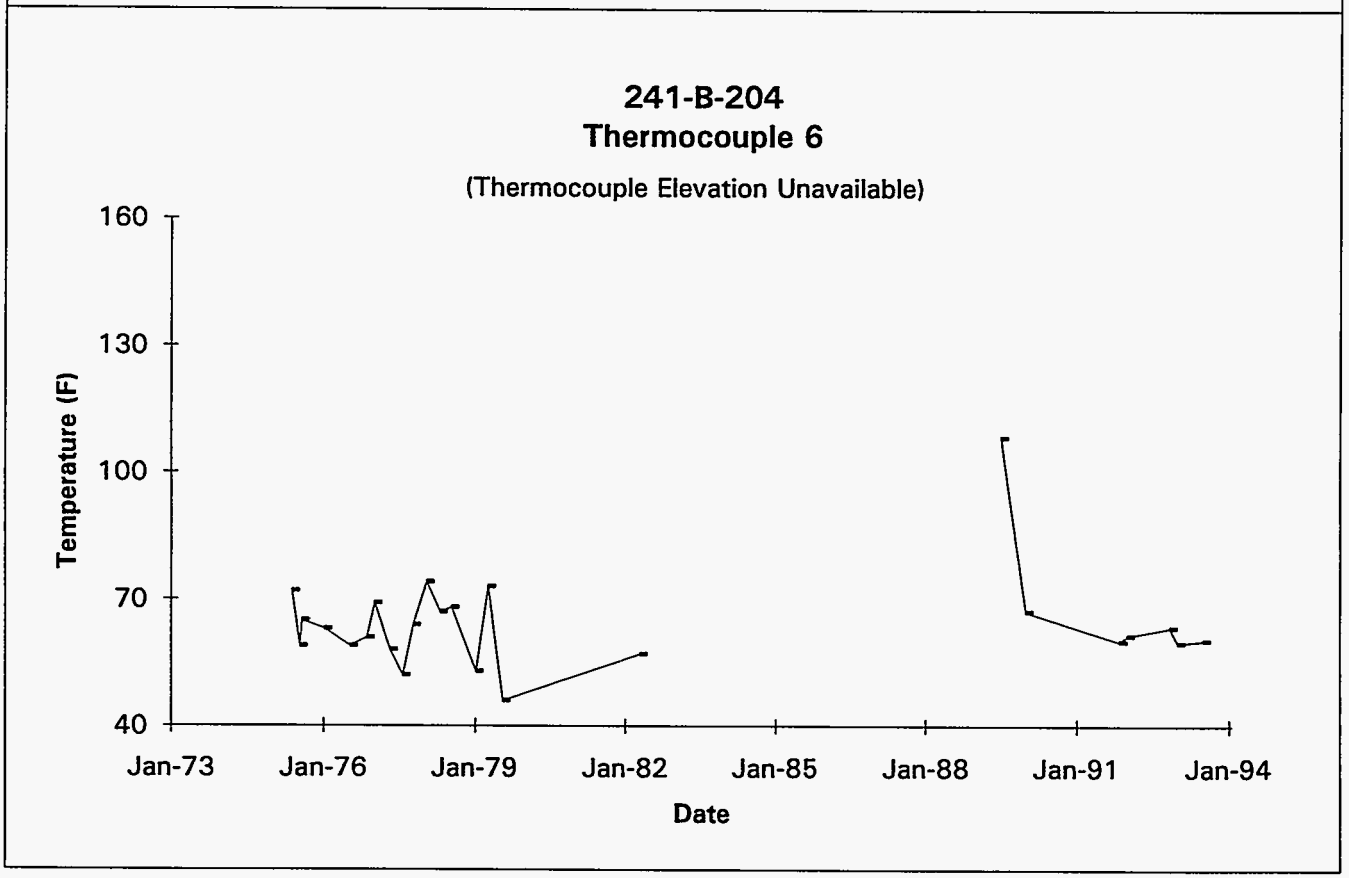

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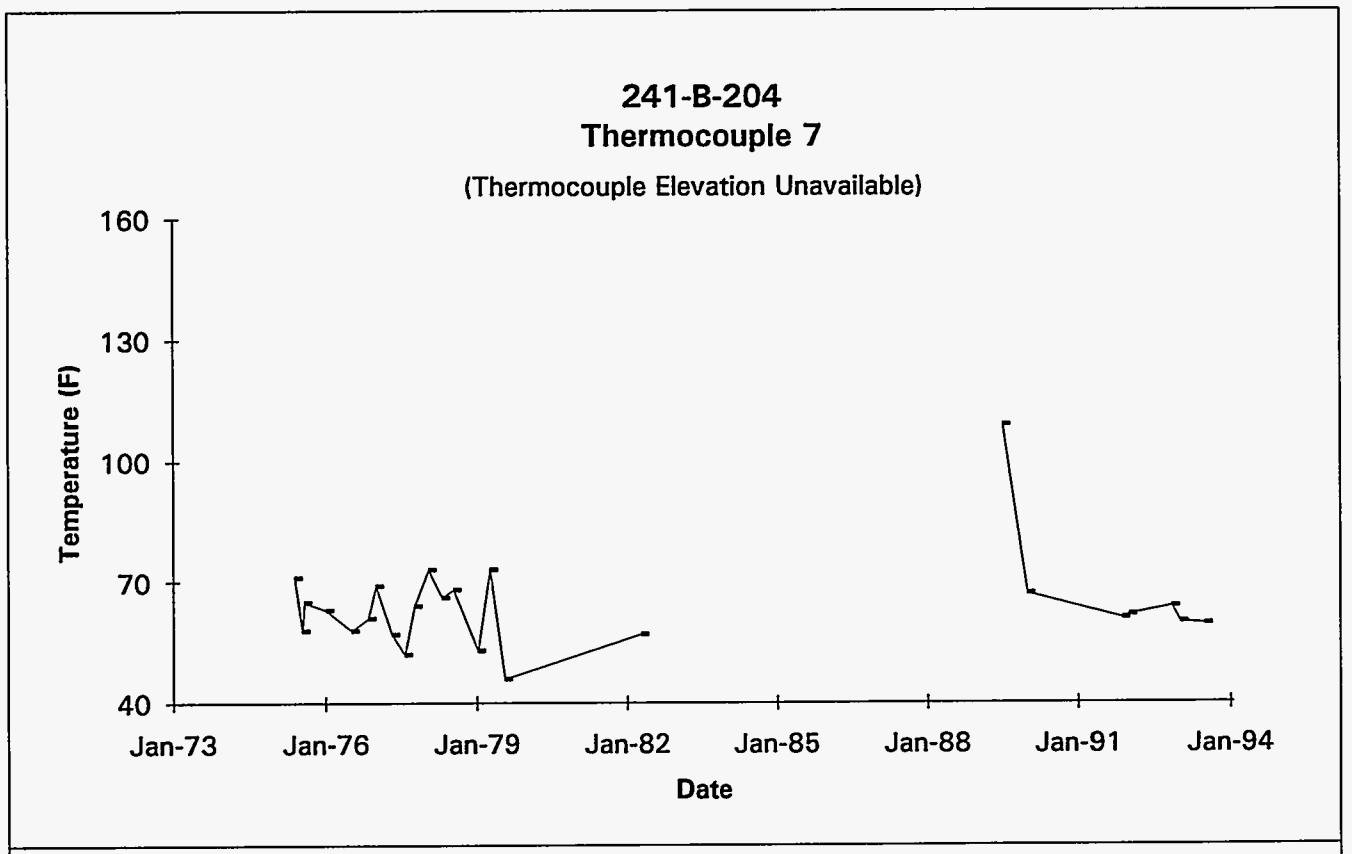

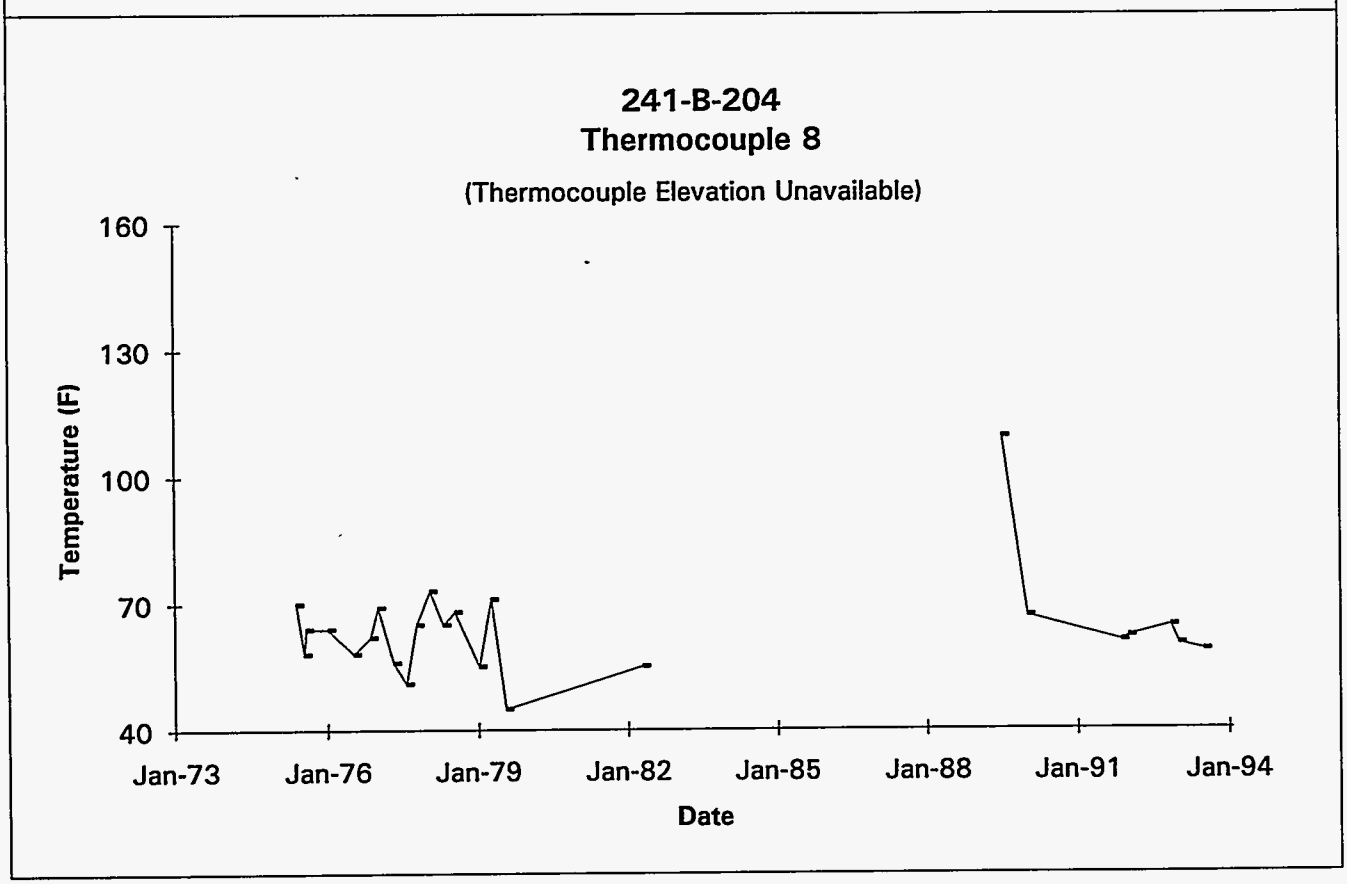

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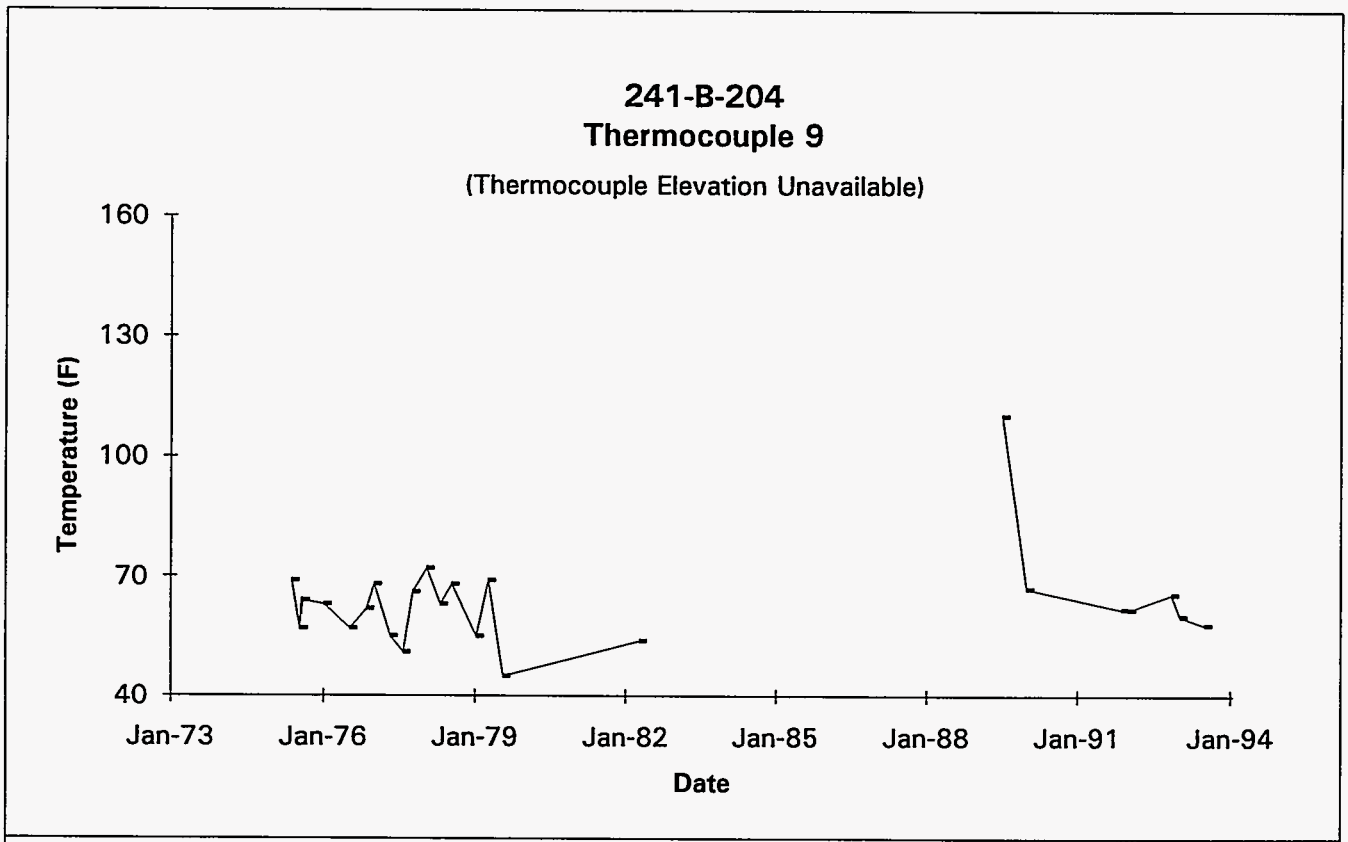

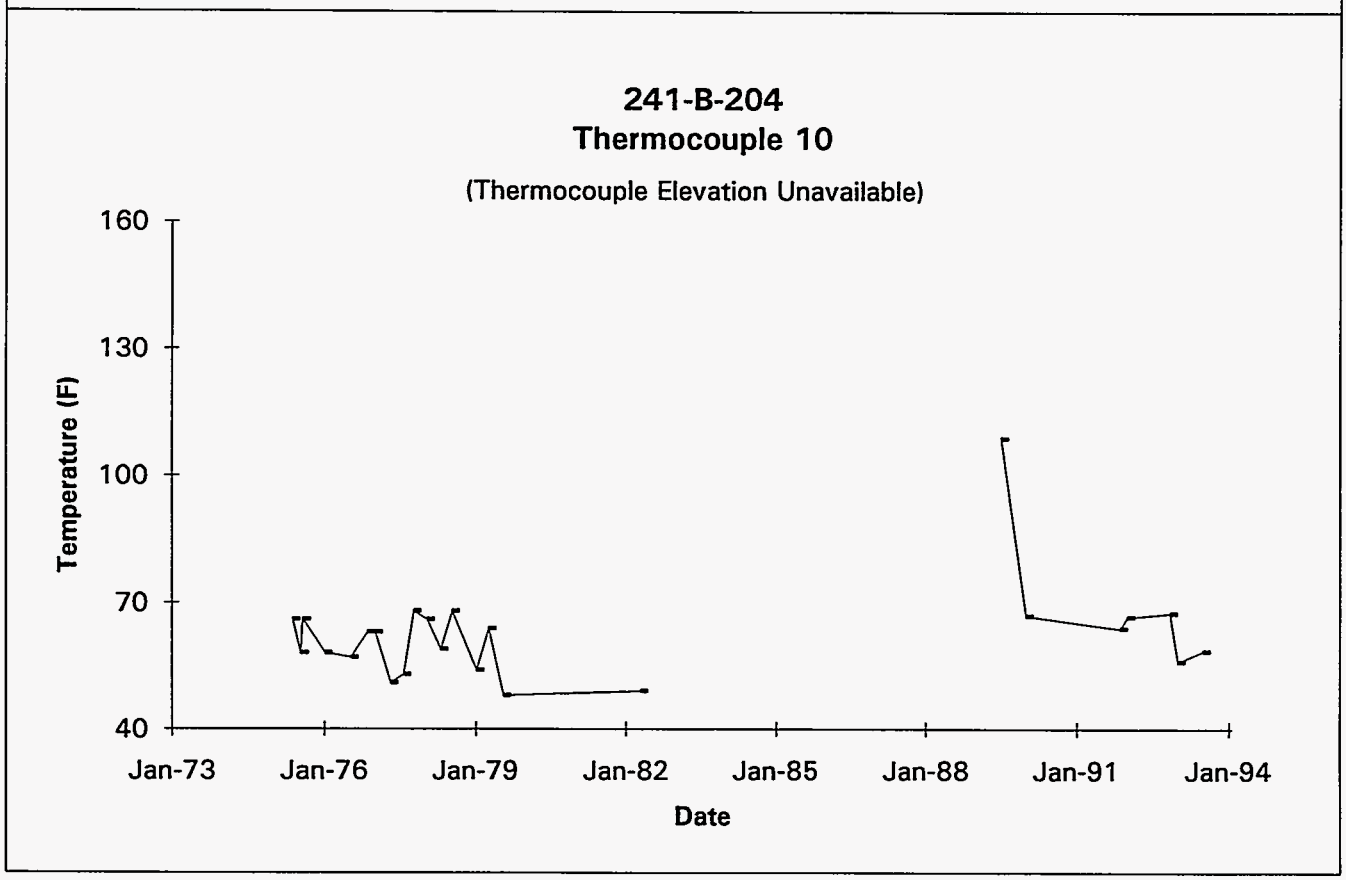

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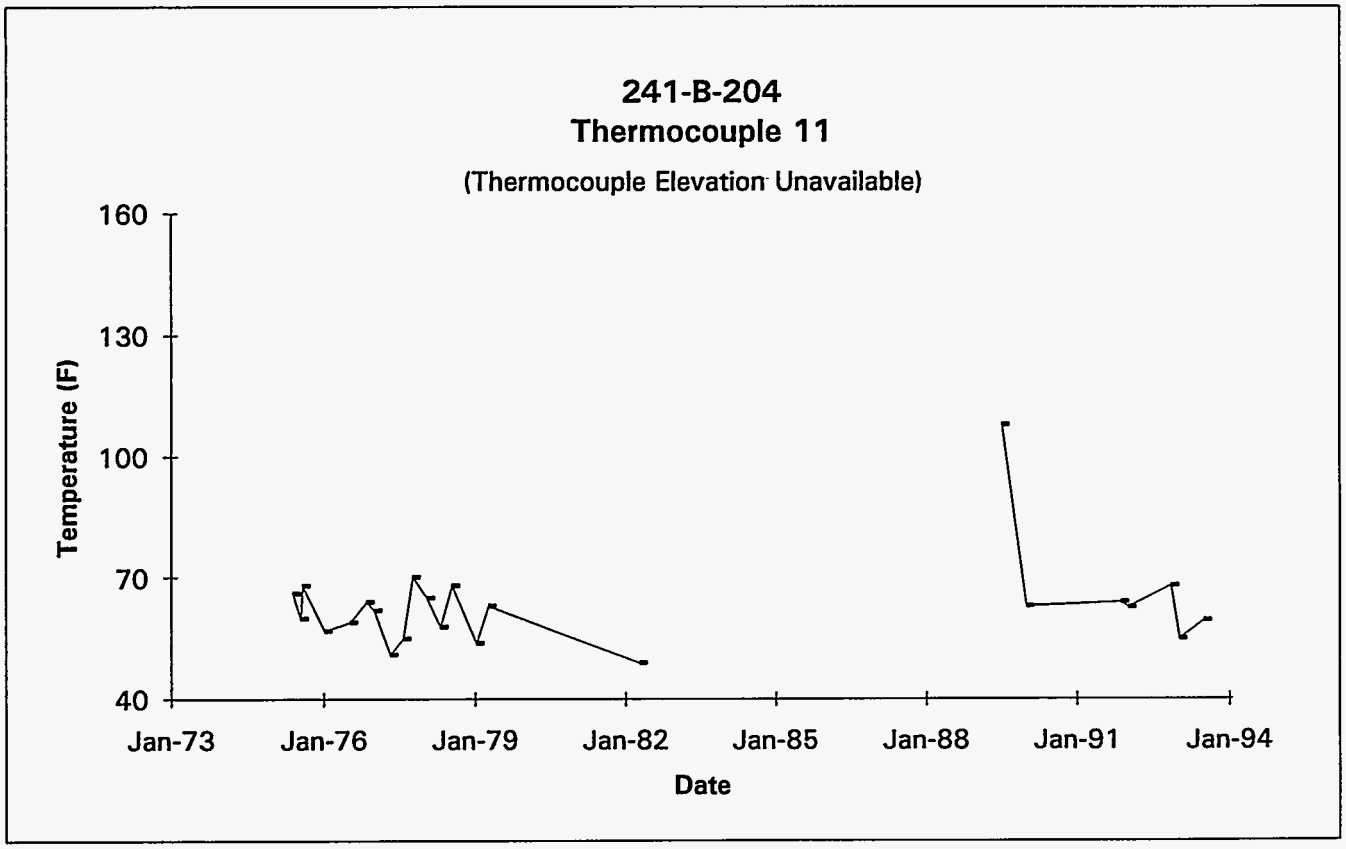


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #.	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/23/74	1		60	140	Y	raw data - assumed degree C
1	5/23/74	2		58	136.4	N	raw data - assumed degree C
1	5/23/74	3		50	122	N	raw data - assumed degree C
1	5/23/74	4		50	122	N	raw data - assumed degree C
1	5/23/74	5		50	122	N	raw data - assumed degree C
1	5/23/74	6		50	122	N	raw data - assumed degree C
1	5/23/74	7		50	122	N	raw data - assumed degree C
1	5/23/74	8		47	116.6	N	raw data - assumed degree C
1	5/23/74	9		46	114.8	N	raw data - assumed degree C
1	5/23/74	10		46	114.8	N	raw data - assumed degree C
1	5/23/74	11		46	114.8	N	raw data - assumed degree C
1	5/23/74	12		44	111.2	N	raw data - assumed degree C
1	5/23/74	13		38	100.4	N	raw data - assumed degree C
1	5/23/74	14		24	75.2	N	raw data - assumed degree C
1	8/14/74	1	1		124	Y	
1	8/14/74	2	1		124	N	
1	8/14/74	3	1		109	N	
1	8/14/74	4	1		109	N	
1	8/14/74	5	1		109	N	
1	8/14/74	6	1		109	N	
1	8/14/74	7	1		109	N	
1	8/14/74	8	1		100	N	
1	8/14/74	9	1		100	N	
1	8/14/74	10	1		100	N	
1	8/14/74	11	1		100	N	
1	8/14/74	12	1		100	N	
1	8/14/74	13	1		100	N	
1	8/14/74	14	1		82	N	
1	8/21/74	1	1		126	Y	
1	8/21/74	2	1		122	N	
1	8/21/74	3	1		108	N	
1	8/21/74	4	1		108	N	
1	8/21/74	5	1		108	N	
1	8/21/74	6	1		108	N	
1	8/21/74	7	1		108	N	
1	8/21/74	8	1		97	N	
1	8/21/74	9	1		97	N	
1	8/21/74	10	1		97	N	
1	8/21/74	11	1		97	N	
1	8/21/74	12	1		97	N	
1	8/21/74	13	1		97	N	
1	8/21/74	14	1		93	N	
1	8/28/74	1	1		126	Y	
1	8/28/74	2	1		122	N	
1	8/28/74	3	1		104	N	
1	8/28/74	4	1		104	N	
1	8/28/74	5	1		104	N	
1	8/28/74	6	1		104	N	
1	8/28/74	7	1		104	N	
1	8/28/74	8	1		99	N	
1	8/28/74	9	1		99	N	
1	8/28/74	10	1		99	N	
1	8/28/74	11	1		99	N	
1	8/28/74	12	1		99	N	
1	8/28/74	13	1		97	N	
1	8/28/74	14	1		97	N	
1	9/4/74	1	1		126	Y	
1	9/4/74	2	1		118	N	
1	9/4/74	3	1		104	N	
1	9/4/74	4	1		104	N	
1	9/4/74	5	1		104	N	
1	9/4/74	6	1		104	N	
1	9/4/74	7	1		104	N	
1	9/4/74	8	1		95	N	
1	9/4/74	9	1		95	N	
1	9/4/74	10	1		95	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/4/74	11	1		95	N	
1	9/4/74	12	1		95	N	
1	9/4/74	13	1		95	N	
1	9/4/74	14	1		90	N	
1	9/18/74	1	1		122	Y	
1	9/18/74	2	1		118	N	
1	9/18/74	3	1		104	N	
1	9/18/74	4	1		104	N	
1	9/18/74	5	1		104	N	
1	9/18/74	6	1		104	N	
1	9/18/74	7	1		104	N	
1	9/18/74	8	1		93	N	
1	9/18/74	9	1		93	N	
1	9/18/74	10	1		93	N	
1	9/18/74	11	1		93	N	
1	9/18/74	12	1		99	N	
1	9/18/74	13	1		95	N	
1	9/18/74	14	1		95	N	
1	9/25/74	1	1		122	Y	
1	9/25/74	2	1		117	N	
1	9/25/74	3	1		100	N	
1	9/25/74	4	1		100	N	
1	9/25/74	5	1		100	N	
1	9/25/74	6	1		100	N	
1	9/25/74	7	1		100	N	
1	9/25/74	8	1		93	N	
1	9/25/74	9	1		93	N	
1	9/25/74	10	1		93	N	
1	9/25/74	11	1		93	N	
1	9/25/74	12	1		93	N	
1	9/25/74	13	1		91	N	
1	9/25/74	14	1		90	N	
1	10/2/74	1	1		115	Y	
1	10/2/74	2	1		109	N	
1	10/2/74	3	1		93	N	
1	10/2/74	4	1		93	N	
1	10/2/74	5	1		93	N	
1	10/2/74	6	1		93	N	
1	10/2/74	7	1		93	N	
1	10/2/74	8	1		88	N	
1	10/2/74	9	1		88	N	
1	10/2/74	10	1		88	N	
1	10/2/74	11	1		88	N	
1	10/2/74	12	1		90	N	
1	10/2/74	13	1		93	N	
1	10/2/74	14	1		86	N	
1	10/17/74	1	1		120	Y	
1	10/17/74	2	1		117	N	
1	10/17/74	3	1		99	N	
1	10/17/74	4	1		99	N	
1	10/17/74	5	1		99	N	
1	10/17/74	6	1		99	N	
1	10/17/74	7	1		99	N	
1	10/17/74	8	1		86	N	
1	10/17/74	9	1		86	N	
1	10/17/74	10	1		86	N	
1	10/17/74	11	1		90	N	
1	10/17/74	12	1		90	N	
1	10/17/74	13	1		93	N	
1	10/17/74	14	1		90	N	
1	10/24/74	1	1		120	Y	
1	10/24/74	2	1		111	N	
1	10/24/74	3	1		95	N	
1	10/24/74	4	1		95	N	
1	10/24/74	5	1		95	N	
1	10/24/74	6	1		95	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/24/74	7	1		95	N	
1	10/24/74	8	1		84	N	
1	10/24/74	9	1		84	N	
1	10/24/74	10	1		84	N	
1	10/24/74	11	1		84	N	
1	10/24/74	12	1		84	N	
1	10/24/74	13	1		90	N	
1	10/24/74	14	1		88	N	
1	10/30/74	1	1		120	Y	
1	10/30/74	2	1		111	N	
1	10/30/74	3	1		97	N	
1	10/30/74	4	1		97	N	
1	10/30/74	5	1		97	N	
1	10/30/74	6	1		97	N	
1	10/30/74	7	1		95	N	
1	10/30/74	8	1		86	N	
1	10/30/74	9	1		86	N	
1	10/30/74	10	1		86	N	
1	10/30/74	11	1		86	N	
1	10/30/74	12	1		90	N	
1	10/30/74	13	1		90	N	
1	10/30/74	14	1		82	N	
1	11/6/74	1	1		120	Y	
1	11/6/74	2	1		111	N	
1	11/6/74	3	1		93	N	
1	11/6/74	4	1		93	N	
1	11/6/74	5	1		93	N	
1	11/6/74	6	1		93	N	
1	11/6/74	7	1		93	N	
1	11/6/74	8	1		84	N	
1	11/6/74	9	1		84	N	
1	11/6/74	10	1		84	N	
1	11/6/74	11	1		84	N	
1	11/6/74	12	1		88	N	
1	11/6/74	13	1		90	N	
1	11/6/74	14	1		84	N	
1	11/13/74	1	1		124	Y	
1	11/13/74	2	1		117	N	
1	11/13/74	3	1		99	N	
1	11/13/74	4	1		99	N	
1	11/13/74	5	1		99	N	
1	11/13/74	6	1		99	N	
1	11/13/74	7	1		95	N	
1	11/13/74	8	1		88	N	
1	11/13/74	9	1		88	N	
1	11/13/74	10	1		88	N	
1	11/13/74	11	1		88	N	
1	11/13/74	12	1		90	N	
1	11/13/74	13	1		91	N	
1	11/13/74	14	1		84	N	
1	11/21/74	1	1		115	Y	
1	11/21/74	2	1		106	N	
1	11/21/74	3	1		86	N	
1	11/21/74	4	1		86	N	
1	11/21/74	5	1		86	N	
1	11/21/74	6	1		86	N	
1	11/21/74	7	1		86	N	
1	11/21/74	8	1		81	N	
1	11/21/74	9	1		81	N	
1	11/21/74	10	1		81	N	
1	11/21/74	11	1		81	N	
1	11/21/74	12	1		81	N	
1	11/21/74	13	1		88	N	
1	11/21/74	14	1		75	N	
1	12/4/74	1	1		117	Y	
1	12/4/74	2	1		108	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	12/4/74	3	1		81	N	
1	12/4/74	4	1		81	N	
1	12/4/74	5	1		81	N	
1	12/4/74	6	1		81	N	
1	12/4/74	7	1		79	N	
1	12/4/74	8	1		70	N	
1	12/4/74	9	1		68	N	
1	12/4/74	10	1		68	N	
1	12/4/74	11	1		68	N	
1	12/4/74	12	1		79	N	
1	12/4/74	13	1		91	N	
1	12/4/74	14	1		84	N	
1	12/11/74	1	1		118	Y	
1	12/11/74	2	1		111	N	
1	12/11/74	3	1		91	N	
1	12/11/74	4	1		91	N	
1	12/11/74	5	1		91	N	
1	12/11/74	6	1		91	N	
1	12/11/74	7	1		88	N	
1	12/11/74	8	1		81	N	
1	12/11/74	9	1		81	N	
1	12/11/74	10	1		81	N	
1	12/11/74	11	1		81	N	
1	12/11/74	12	1		84	N	
1	12/11/74	13	1		75	N	
1	12/11/74	14	1		68	N	
1	12/18/74	1	1		106	Y	
1	12/18/74	2	1		97	N	
1	12/18/74	3	1		79	N	
1	12/18/74	4	1		79	N	
1	12/18/74	5	1		79	N	
1	12/18/74	6	1		68	N	
1	12/18/74	7	1		66	N	
1	12/18/74	8	1		66	N	
1	12/18/74	9	1		66	N	
1	12/18/74	10	1		66	N	
1	12/18/74	11	1		66	N	
1	12/18/74	12	1		68	N	
1	12/18/74	13	1		72	N	
1	12/18/74	14	1		66	N	
1	12/27/74	1	1		108	Y	
1	12/27/74	2	1		97	N	
1	12/27/74	3	1		75	N	
1	12/27/74	4	1		75	N	
1	12/27/74	5	1		75	N	
1	12/27/74	6	1		68	N	
1	12/27/74	7	1		68	N	
1	12/27/74	8	1		68	N	
1	12/27/74	9	1		68	N	
1	12/27/74	10	1		68	N	
1	12/27/74	11	1		68	N	
1	12/27/74	12	1		68	N	
1	12/27/74	13	1		72	N	
1	12/27/74	14	1		64	N	
1	1/2/75	1	1		100	Y	
1	1/2/75	2	1		91	N	
1	1/2/75	3	1		73	N	
1	1/2/75	4	1		73	N	
1	1/2/75	5	1		73	N	
1	1/2/75	6	1		72	N	
1	1/2/75	7	1		72	N	
1	1/2/75	8	1		72	N	
1	1/2/75	9	1		72	N	
1	1/2/75	10	1		72	N	
1	1/2/75	11	1		72	N	
1	1/2/75	12	1		70	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/2/75	13	1		63	N	
1	1/2/75	14	1		54	N	
1	1/8/75	1	1		102	Y	
1	1/8/75	2	1		93	N	
1	1/8/75	3	1		75	N	
1	1/8/75	4	1		75	N	
1	1/8/75	5	1		75	N	
1	1/8/75	6	1		72	N	
1	1/8/75	7	1		72	N	
1	1/8/75	8	1		72	N	
1	1/8/75	9	1		70	N	
1	1/8/75	10	1		70	N	
1	1/8/75	11	1		70	N	
1	1/8/75	12	1		68	N	
1	1/8/75	13	1		66	N	
1	1/8/75	14	1		59	N	
1	1/15/75	1	1		102	Y	
1	1/15/75	2	1		93	N	
1	1/15/75	3	1		66	N	
1	1/15/75	4	1		64	N	
1	1/15/75	5	1		64	N	
1	1/15/75	6	1		64	N	
1	1/15/75	7	1		64	N	
1	1/15/75	8	1		64	N	
1	1/15/75	9	1		64	N	
1	1/15/75	10	1		64	N	
1	1/15/75	11	1		64	N	
1	1/15/75	12	1		68	N	
1	1/15/75	13	1		66	N	
1	1/15/75	14	1		59	N	
1	1/22/75	1	1		90	Y	
1	1/22/75	2	1		81	N	
1	1/22/75	3	1		66	N	
1	1/22/75	4	1		66	N	
1	1/22/75	5	1		66	N	
1	1/22/75	6	1		64	N	
1	1/22/75	7	1		64	N	
1	1/22/75	8	1		64	N	
1	1/22/75	9	1		64	N	
1	1/22/75	10	1		64	N	
1	1/22/75	11	1		64	N	
1	1/22/75	12	1		63	N	
1	1/22/75	13	1		59	N	
1	1/22/75	14	1		54	N	
1	1/29/75	1	1		104	Y	
1	1/29/75	2	1		90	N	
1	1/29/75	3	1		82	N	
1	1/29/75	4	1		82	N	
1	1/29/75	5	1		82	N	
1	1/29/75	6	1		82	N	
1	1/29/75	7	1		82	N	
1	1/29/75	8	1		82	N	
1	1/29/75	9	1		82	N	
1	1/29/75	10	1		82	N	
1	1/29/75	11	1		82	N	
1	1/29/75	12	1		82	N	
1	1/29/75	13	1		82	N	
1	1/29/75	14	1		61	N	
1	2/5/75	1	1		100	Y	
1	2/5/75	2	1		93	N	
1	2/5/75	3	1		79	N	
1	2/5/75	4	1		79	N	
1	2/5/75	5	1		79	N	
1	2/5/75	6	1		79	N	
1	2/5/75	7	1		79	N	
1	2/5/75	8	1		79	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	2/5/75	9	1		79	N	
1	2/5/75	10	1		79	N	
1	2/5/75	11	1		79	N	
1	2/5/75	12	1		79	N	
1	2/5/75	13	1		70	N	
1	2/5/75	14	1		57	N	
1	2/12/75	1	1		99	Y	
1	2/12/75	2	1		90	N	
1	2/12/75	3	1		75	N	
1	2/12/75	4	1		75	N	
1	2/12/75	5	1		75	N	
1	2/12/75	6	1		75	N	
1	2/12/75	7	1		75	N	
1	2/12/75	8	1		75	N	
1	2/12/75	9	1		75	N	
1	2/12/75	10	1		75	N	
1	2/12/75	11	1		75	N	
1	2/12/75	12	1		75	N	
1	2/12/75	13	1		68	N	
1	2/12/75	14	1		54	N	
1	2/19/75	1	1		100	Y	
1	2/19/75	2	1		84	N	
1	2/19/75	3	1		77	N	
1	2/19/75	4	1		77	N	
1	2/19/75	5	1		77	N	
1	2/19/75	6	1		77	N	
1	2/19/75	7	1		77	N	
1	2/19/75	8	1		77	N	
1	2/19/75	9	1		77	N	
1	2/19/75	10	1		77	N	
1	2/19/75	11	1		77	N	
1	2/19/75	12	1		72	N	
1	2/19/75	13	1		63	N	
1	2/19/75	14	1		52	N	
1	2/20/75	1	1		118	Y	
1	2/20/75	2	1		113	N	
1	2/20/75	3	1		84	N	
1	2/20/75	4	1		82	N	
1	2/20/75	5	1		82	N	
1	2/20/75	6	1		82	N	
1	2/20/75	7	1		82	N	
1	2/20/75	8	1		82	N	
1	2/20/75	9	1		82	N	
1	2/20/75	10	1		81	N	
1	2/20/75	11	1		79	N	
1	2/26/75	1	1		100	Y	
1	2/26/75	2	1		95	N	
1	2/26/75	3	1		82	N	
1	2/26/75	4	1		82	N	
1	2/26/75	5	1		82	N	
1	2/26/75	6	1		81	N	
1	2/26/75	7	1		81	N	
1	2/26/75	8	1		81	N	
1	2/26/75	9	1		81	N	
1	2/26/75	10	1		81	N	
1	2/26/75	11	1		81	N	
1	2/26/75	12	1		79	N	
1	2/26/75	13	1		72	N	
1	2/26/75	14	1		61	N	
1	3/5/75	1	1		102	Y	
1	3/5/75	2	1		93	N	
1	3/5/75	3	1		82	N	
1	3/5/75	4	1		82	N	
1	3/5/75	5	1		82	N	
1	3/5/75	6	1		82	N	
1	3/5/75	7	1		82	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	3/5/75	8	1		82	N	
1	3/5/75	9	1		82	N	
1	3/5/75	10	1		82	N	
1	3/5/75	11	1		82	N	
1	3/5/75	12	1		79	N	
1	3/5/75	13	1		72	N	
1	3/5/75	14	1		64	N	
1	3/12/75	1	1		100	Y	
1	3/12/75	2	1		91	N	
1	3/12/75	3	1		81	N	
1	3/12/75	4	1		81	N	
1	3/12/75	5	1		81	N	
1	3/12/75	6	1		81	N	
1	3/12/75	7	1		81	N	
1	3/12/75	8	1		81	N	
1	3/12/75	9	1		81	N	
1	3/12/75	10	1		81	N	
1	3/12/75	11	1		81	N	
1	3/12/75	12	1		79	N	
1	3/12/75	13	1		68	N	
1	3/12/75	14	1		61	N	
1	3/19/75	1	1		99	Y	
1	3/19/75	2	1		90	N	
1	3/19/75	3	1		82	N	
1	3/19/75	4	1		82	N	
1	3/19/75	5	1		81	N	
1	3/19/75	6	1		81	N	
1	3/19/75	7	1		81	N	
1	3/19/75	8	1		81	N	
1	3/19/75	9	1		81	N	
1	3/19/75	10	1		81	N	
1	3/19/75	11	1		81	N	
1	3/19/75	12	1		77	N	
1	3/19/75	13	1		68	N	
1	3/19/75	14	1		61	N	
1	3/26/75	1	1		99	Y	
1	3/26/75	2	1		91	N	
1	3/26/75	3	1		81	N	
1	3/26/75	4	1		81	N	
1	3/26/75	5	1		81	N	
1	3/26/75	6	1		81	N	
1	3/26/75	7	1		81	N	
1	3/26/75	8	1		81	N	
1	3/26/75	9	1		81	N	
1	3/26/75	10	1		81	N	
1	3/26/75	11	1		81	N	
1	3/26/75	12	1		79	N	
1	3/26/75	13	1		70	N	
1	3/26/75	14	1		63	N	
1	4/2/75	1	1		100	Y	
1	4/2/75	2	1		97	N	
1	4/2/75	3	1		84	N	
1	4/2/75	4	1		84	N	
1	4/2/75	5	1		84	N	
1	4/2/75	6	1		84	N	
1	4/2/75	7	1		84	N	
1	4/2/75	8	1		84	N	
1	4/2/75	9	1		84	N	
1	4/2/75	10	1		84	N	
1	4/2/75	11	1		84	N	
1	4/2/75	12	1		81	N	
1	4/2/75	13	1		72	N	
1	4/2/75	14	1		66	N	
1	4/9/75	1	1		102	Y	
1	4/9/75	2	1		99	N	
1	4/9/75	3	1		86	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/9/75	4	1		86	N	
1	4/9/75	5	1		86	N	
1	4/9/75	6	1		86	N	
1	4/9/75	7	1		86	N	
1	4/9/75	8	1		86	N	
1	4/9/75	9	1		80	N	
1	4/9/75	10	1		84	N	
1	4/9/75	11	1		86	N	
1	4/9/75	12	1		82	N	
1	4/9/75	13	1		75	N	
1	4/9/75	14	1		68	N	
1	4/23/75	1	1		115	Y	
1	4/23/75	2	1		111	N	
1	4/23/75	3	1		86	N	
1	4/23/75	4	1		82	N	
1	4/23/75	5	1		82	N	
1	4/23/75	6	1		82	N	
1	4/23/75	7	1		82	N	
1	4/23/75	10	1		84	N	
1	4/23/75	11	1		84	N	
1	4/30/75	1	1		106	Y	
1	4/30/75	2	1		102	N	
1	4/30/75	3	1		90	N	
1	4/30/75	4	1		90	N	
1	4/30/75	5	1		88	N	
1	4/30/75	6	1		88	N	
1	4/30/75	7	1		88	N	
1	4/30/75	8	1		88	N	
1	4/30/75	9	1		88	N	
1	4/30/75	10	1		88	N	
1	4/30/75	11	1		88	N	
1	4/30/75	12	1		88	N	
1	4/30/75	13	1		79	N	
1	4/30/75	14	1		75	N	
1	5/7/75	1	1		104	Y	
1	5/7/75	2	1		100	N	
1	5/7/75	3	1		88	N	
1	5/7/75	4	1		88	N	
1	5/7/75	5	1		86	N	
1	5/7/75	6	1		86	N	
1	5/7/75	7	1		86	N	
1	5/7/75	8	1		86	N	
1	5/7/75	9	1		86	N	
1	5/7/75	10	1		86	N	
1	5/7/75	11	1		86	N	
1	5/7/75	12	1		86	N	
1	5/7/75	13	1		82	N	
1	5/7/75	14	1		63	N	
1	5/14/75	1	1		109	Y	
1	5/14/75	2	1		108	N	
1	5/14/75	3	1		97	N	
1	5/14/75	4	1		97	N	
1	5/14/75	5	1		97	N	
1	5/14/75	6	1		97	N	
1	5/14/75	7	1		97	N	
1	5/14/75	8	1		97	N	
1	5/14/75	9	1		97	N	
1	5/14/75	10	1		97	N	
1	5/14/75	11	1		97	N	
1	5/14/75	12	1		93	N	
1	5/14/75	13	1		84	N	
1	5/14/75	14	1		79	N	
1	5/21/75	1	1		106	Y	
1	5/21/75	2	1		104	N	
1	5/21/75	3	1		93	N	
1	5/21/75	4	1		93	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	5	1		93	N	
1	5/21/75	6	1		93	N	
1	5/21/75	7	1		93	N	
1	5/21/75	8	1		93	N	
1	5/21/75	9	1		93	N	
1	5/21/75	10	1		93	N	
1	5/21/75	11	1		93	N	
1	5/21/75	12	1		91	N	
1	5/21/75	13	1		82	N	
1	5/21/75	14	1		79	N	
1	5/21/75	1	2		106	Y	old
1	5/21/75	2	2		104	N	
1	5/21/75	3	2		94	N	
1	5/21/75	4	2		94	N	
1	5/21/75	5	2		94	N	
1	5/21/75	6	2		93	N	
1	5/21/75	7	2		93	N	
1	5/21/75	8	2		93	N	
1	5/21/75	9	2		93	N	
1	5/21/75	10	2		93	N	
1	5/21/75	11	2		93	N	
1	5/21/75	1	3		120	Y	new
1	5/21/75	2	3		118	N	
1	5/21/75	3	3		83	N	
1	5/21/75	4	3		90	N	
1	5/21/75	5	3		90	N	
1	5/21/75	6	3		90	N	
1	5/21/75	7	3		90	N	
1	5/21/75	8	3		90	N	
1	5/21/75	9	3		90	N	
1	5/21/75	10	3		95	N	
1	5/21/75	11	3		95	N	
1	6/9/75	1	1		117	Y	
1	6/9/75	2	1		117	N	
1	6/9/75	3	1		93	N	
1	6/9/75	4	1		90	N	
1	6/9/75	5	1		90	N	
1	6/9/75	6	1		90	N	
1	6/9/75	7	1		90	N	
1	6/9/75	8	1		90	N	
1	6/9/75	9	1		90	N	
1	6/9/75	10	1		90	N	
1	6/9/75	11	1		91	N	
1	6/11/75	1	1		118	Y	
1	6/11/75	2	1		118	N	
1	6/11/75	3	1		95	N	
1	6/11/75	4	1		91	N	
1	6/11/75	5	1		91	N	
1	6/11/75	6	1		91	N	
1	6/11/75	7	1		91	N	
1	6/11/75	8	1		91	N	
1	6/11/75	9	1		91	N	
1	6/11/75	10	1		91	N	
1	6/11/75	11	1		91	N	
1	6/18/75	1	1		120	Y	
1	6/18/75	2	1		120	N	
1	6/18/75	3	1		99	N	
1	6/18/75	4	1		95	N	
1	6/18/75	5	1		95	N	
1	6/18/75	6	1		95	N	
1	6/18/75	7	1		97	N	
1	6/18/75	8	1		95	N	
1	6/18/75	9	1		95	N	
1	6/18/75	10	1		95	N	
1	6/18/75	11	1		95	N	
1	6/28/75	1	1		120	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/28/75	2	1		120	N	
1	6/28/75	3	1		97	N	
1	6/28/75	4	1		93	N	
1	6/28/75	5	1		93	N	
1	6/28/75	6	1		93	N	
1	6/28/75	7	1		93	N	
1	6/28/75	8	1		93	N	
1	6/28/75	9	1		93	N	
1	6/28/75	10	1		93	N	
1	6/28/75	11	1		95	N	
1	7/2/75	1	1		127	Y	
1	7/2/75	2	1		126	N	
1	7/2/75	3	1		104	N	
1	7/2/75	4	1		100	N	
1	7/2/75	5	1		100	N	
1	7/2/75	6	1		100	N	
1	7/2/75	7	1		100	N	
1	7/2/75	8	1		100	N	
1	7/2/75	9	1		100	N	
1	7/2/75	10	1		100	N	
1	7/2/75	11	1		100	N	
1	7/9/75	1	1		117	Y	
1	7/9/75	2	1		117	N	
1	7/9/75	3	1		93	N	
1	7/9/75	4	1		91	N	
1	7/9/75	5	1		91	N	
1	7/9/75	6	1		91	N	
1	7/9/75	7	1		91	N	
1	7/9/75	8	1		91	N	
1	7/9/75	9	1		91	N	
1	7/9/75	10	1		91	N	
1	7/9/75	11	1		91	N	
1	7/16/75	1	1		120	Y	
1	7/16/75	2	1		120	N	
1	7/16/75	3	1		99	N	
1	7/16/75	4	1		95	N	
1	7/16/75	5	1		95	N	
1	7/16/75	6	1		95	N	
1	7/16/75	7	1		95	N	
1	7/16/75	8	1		95	N	
1	7/16/75	9	1		95	N	
1	7/16/75	10	1		95	N	
1	7/16/75	11	1		95	N	
1	7/16/75	12	1		95	N	
1	7/16/75	13	1		95	N	
1	7/16/75	14	1		95	N	
1	7/31/75	1	1		112	Y	old
1	7/31/75	2	1		111	N	
1	7/31/75	3	1		102	N	
1	7/31/75	4	1		101	N	
1	7/31/75	5	1		101	N	
1	7/31/75	6	1		101	N	
1	7/31/75	7	1		107	N	
1	7/31/75	8	1		101	N	
1	7/31/75	9	1		101	N	
1	7/31/75	10	1		100	N	
1	7/31/75	11	1		100	N	
1	7/31/75	12	1		99	N	
1	7/31/75	1	2		125	Y	new
1	7/31/75	2	2		125	N	
1	7/31/75	3	2		104	N	
1	7/31/75	4	2		101	N	
1	7/31/75	5	2		101	N	
1	7/31/75	6	2		101	N	
1	7/31/75	7	2		100	N	
1	7/31/75	8	2		101	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/31/75	9	2		100	N	
1	7/31/75	10	2		100	N	
1	7/31/75	11	2		100	N	
1	7/31/75	12	2		100	N	
1	7/31/75	1	3		126	Y	
1	7/31/75	2	3		126	N	
1	7/31/75	3	3		104	N	
1	7/31/75	4	3		100	N	
1	7/31/75	5	3		100	N	
1	7/31/75	6	3		100	N	
1	7/31/75	7	3		100	N	
1	7/31/75	8	3		100	N	
1	7/31/75	9	3		100	N	
1	7/31/75	10	3		100	N	
1	7/31/75	11	3		100	N	
1	8/14/75	1	1		120	N	
1	8/14/75	2	1		121	Y	
1	8/14/75	3	1		99	N	
1	8/14/75	4	1		96	N	
1	8/14/75	5	1		96	N	
1	8/14/75	6	1		96	N	
1	8/14/75	7	1		96	N	
1	8/14/75	8	1		96	N	
1	8/14/75	9	1		96	N	
1	8/14/75	10	1		96	N	
1	8/14/75	11	1		96	N	
1	8/17/75	1	1		126	N	
1	8/17/75	2	1		127	Y	
1	8/17/75	3	1		105	N	
1	8/17/75	4	1		103	N	
1	8/17/75	5	1		102	N	
1	8/17/75	6	1		102	N	
1	8/17/75	7	1		102	N	
1	8/17/75	8	1		102	N	
1	8/17/75	9	1		101	N	
1	8/17/75	10	1		101	N	
1	8/17/75	11	1		101	N	
1	9/7/75	1	1		127	N	
1	9/7/75	2	1		128	Y	
1	9/7/75	3	1		106	N	
1	9/7/75	4	1		103	N	
1	9/7/75	5	1		103	N	
1	9/7/75	6	1		103	N	
1	9/7/75	7	1		103	N	
1	9/7/75	8	1		103	N	
1	9/7/75	9	1		103	N	
1	9/7/75	10	1		103	N	
1	9/7/75	11	1		103	N	
1	10/2/75	1	1		115	Y	old
1	10/2/75	2	1		113	N	
1	10/2/75	3	1		104	N	
1	10/2/75	4	1		103	N	
1	10/2/75	5	1		103	N	
1	10/2/75	6	1		103	N	
1	10/2/75	7	1		103	N	
1	10/2/75	8	1		103	N	
1	10/2/75	9	1		103	N	
1	10/2/75	10	1		103	N	
1	10/2/75	11	1		103	N	
1	10/2/75	12	1		101	N	
1	10/2/75	1	2		130	N	new
1	10/2/75	2	2		132	Y	
1	10/2/75	3	2		111	N	
1	10/2/75	4	2		110	N	
1	10/2/75	5	2		102	N	
1	10/2/75	6	2		102	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/2/75	7	2		110	N	
1	10/2/75	8	2		104	N	
1	10/2/75	9	2		103	N	
1	10/2/75	10	2		103	N	
1	10/8/75	1	1		127	N	
1	10/8/75	2	1		128	Y	
1	10/8/75	3	1		105	N	
1	10/8/75	4	1		103	N	
1	10/8/75	5	1		103	N	
1	10/8/75	6	1		103	N	
1	10/8/75	7	1		103	N	
1	10/8/75	8	1		103	N	
1	10/8/75	9	1		103	N	
1	10/8/75	10	1		103	N	
1	10/8/75	11	1		103	N	
1	1/7/76	1	1		128	Y	
1	1/7/76	2	1		124	N	
1	1/7/76	3	1		98	N	
1	1/7/76	4	1		95	N	
1	1/7/76	5	1		95	N	
1	1/7/76	6	1		95	N	
1	1/7/76	7	1		95	N	
1	1/7/76	8	1		95	N	
1	1/7/76	10	1		91	N	
1	1/7/76	11	1		95	N	
1	4/1/76	1	1		115	Y	
1	4/1/76	2	1		113	N	
1	4/1/76	3	1		89	N	
1	4/1/76	4	1		88	N	
1	4/1/76	5	1		88	N	
1	4/1/76	6	1		89	N	
1	4/1/76	7	1		89	N	
1	4/1/76	8	1		89	N	
1	4/1/76	9	1		89	N	
1	4/1/76	10	1		90	N	
1	4/1/76	11	1		90	N	
1	4/1/76	12	1		90	N	
1	6/21/76	1	1		114	Y	
1	6/21/76	2	1		113	N	
1	6/21/76	3	1		92	N	
1	6/21/76	4	1		90	N	
1	6/21/76	5	1		90	N	
1	6/21/76	6	1		90	N	
1	6/21/76	7	1		90	N	
1	6/21/76	8	1		90	N	
1	6/21/76	9	1		90	N	
1	6/21/76	10	1		89	N	
1	8/14/76	1	1		111	Y	
1	8/14/76	2	1		109	N	
1	8/14/76	3	1		90	N	
1	8/14/76	4	1		88	N	
1	8/14/76	5	1		88	N	
1	8/14/76	6	1		88	N	
1	8/14/76	7	1		87	N	
1	8/14/76	8	1		87	N	
1	8/14/76	9	1		87	N	
1	8/14/76	10	1		87	N	
1	8/14/76	11	1		87	N	
1	9/15/76	1	1		132	Y	
1	9/15/76	2	1		131	N	
1	9/15/76	3	1		111	N	
1	9/15/76	4	1		110	N	
1	9/15/76	5	1		108	N	
1	9/15/76	6	1		108	N	
1	9/15/76	7	1		110	N	
1	9/15/76	8	1		111	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/15/76	9	1		108	N	
1	9/15/76	10	1		111	N	
1	9/15/76	11	1		112	N	
1	11/7/76	1	1		126	Y	
1	11/7/76	2	1		121	N	
1	11/7/76	3	1		102	N	
1	11/7/76	4	1		100	N	
1	11/7/76	5	1		100	N	
1	11/7/76	6	1		99	N	
1	11/7/76	7	1		99	N	
1	11/7/76	8	1		99	N	
1	11/7/76	9	1		99	N	
1	11/7/76	10	1		99	N	
1	11/7/76	11	1		99	N	
1	1/3/77	1	1		137	Y	
1	1/3/77	2	1		135	N	
1	1/3/77	3	1		112	N	
1	1/3/77	4	1		110	N	
1	1/3/77	5	1		110	N	
1	1/3/77	6	1		110	N	
1	1/3/77	7	1		110	N	
1	1/3/77	8	1		110	N	
1	1/3/77	9	1		110	N	
1	1/3/77	10	1		110	N	
1	1/3/77	11	1		110	N	
1	2/26/77	1	1		123	Y	
1	2/26/77	2	1		119	N	
1	2/26/77	3	1		108	N	
1	2/26/77	4	1		107	N	
1	2/26/77	5	1		107	N	
1	2/26/77	6	1		107	N	
1	2/26/77	7	1		105	N	
1	2/26/77	8	1		105	N	
1	2/26/77	9	1		105	N	
1	2/26/77	10	1		105	N	
1	2/26/77	11	1		105	N	
1	2/26/77	12	1		104	N	
1	2/26/77	13	1		94	N	
1	4/26/77	1	1		114	Y	
1	4/26/77	2	1		111	N	
1	4/26/77	3	1		89	N	
1	4/26/77	4	1		88	N	
1	4/26/77	5	1		87	N	
1	4/26/77	6	1		87	N	
1	4/26/77	7	1		87	N	
1	4/26/77	8	1		87	N	
1	4/26/77	9	1		86	N	
1	4/26/77	10	1		86	N	
1	4/26/77	11	1		86	N	
1	6/30/77	1	1		111	Y	
1	6/30/77	2	1		108	N	
1	6/30/77	3	1		100	N	
1	6/30/77	4	1		100	N	
1	6/30/77	5	1		100	N	
1	6/30/77	6	1		99	N	
1	6/30/77	7	1		99	N	
1	6/30/77	8	1		99	N	
1	6/30/77	9	1		99	N	
1	6/30/77	10	1		99	N	
1	6/30/77	11	1		99	N	
1	6/30/77	12	1		99	N	
1	6/30/77	13	1		90	N	
1	7/28/77	1	1		117	Y	
1	7/28/77	2	1		117	N	
1	7/28/77	3	1		98	N	
1	7/28/77	4	1		97	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/28/77	5	1		97	N	
1	7/28/77	6	1		97	N	
1	7/28/77	7	1		97	N	
1	7/28/77	8	1		97	N	
1	7/28/77	9	1		97	N	
1	7/28/77	10	1		97	N	
1	7/28/77	11	1		97	N	
1	8/15/77	1	1		101	Y	
1	8/15/77	2	1		100	N	
1	8/15/77	3	1		93	N	
1	8/15/77	4	1		92	N	
1	8/15/77	5	1		92	N	
1	8/15/77	6	1		92	N	
1	8/15/77	7	1		92	N	
1	8/15/77	8	1		92	N	
1	8/15/77	9	1		92	N	
1	8/15/77	10	1		92	N	
1	8/15/77	11	1		92	N	
1	9/7/77	1	1		103	Y	
1	9/7/77	2	1		99	N	
1	9/7/77	3	1		92	N	
1	9/7/77	4	1		90	N	
1	9/7/77	5	1		90	N	
1	9/7/77	6	1		90	N	
1	9/7/77	7	1		90	N	
1	9/7/77	8	1		90	N	
1	9/7/77	9	1		90	N	
1	9/7/77	10	1		90	N	
1	9/7/77	11	1		90	N	
1	9/7/77	1	2		108	Y	
1	9/7/77	2	2		99	N	
1	9/7/77	3	2		91	N	
1	9/7/77	4	2		88	N	
1	9/7/77	5	2		88	N	
1	9/7/77	6	2		88	N	
1	9/7/77	7	2		88	N	
1	9/7/77	8	2		88	N	
1	9/7/77	9	2		88	N	
1	9/7/77	10	2		88	N	
1	9/7/77	11	2		88	N	
1	9/7/77	12	2		88	N	
1	9/12/77	1	1		115	Y	
1	9/12/77	2	1		115	N	
1	9/12/77	3	1		94	N	
1	9/12/77	4	1		92	N	
1	9/12/77	5	1		92	N	
1	9/12/77	6	1		92	N	
1	9/12/77	7	1		92	N	
1	9/12/77	8	1		91	N	
1	9/12/77	9	1		91	N	
1	9/12/77	10	1		91	N	
1	9/12/77	11	1		91	N	
1	10/7/77	1	1		122	Y	
1	10/7/77	2	1		120	N	
1	10/7/77	3	1		99	N	
1	10/7/77	4	1		98	N	
1	10/7/77	5	1		98	N	
1	10/7/77	6	1		97	N	
1	10/7/77	7	1		97	N	
1	10/7/77	8	1		97	N	
1	10/7/77	9	1		97	N	
1	10/7/77	10	1		97	N	
1	10/7/77	11	1		97	N	
1	12/7/77	1	1		124	Y	
1	12/7/77	2	1		121	N	
1	12/7/77	3	1		98	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	12/7/77	4	1		96	N	
1	12/7/77	5	1		96	N	
1	12/7/77	6	1		96	N	
1	12/7/77	7	1		96	N	
1	12/7/77	8	1		95	N	
1	12/7/77	9	1		95	N	
1	12/7/77	10	1		95	N	
1	12/7/77	11	1		95	N	
1	1/16/78	1	1		123	Y	
1	1/16/78	2	1		119	N	
1	1/16/78	3	1		96	N	
1	1/16/78	4	1		95	N	
1	1/16/78	5	1		95	N	
1	1/16/78	6	1		94	N	
1	1/16/78	7	1		94	N	
1	1/16/78	8	1		94	N	
1	1/16/78	10	1		95	N	
1	1/16/78	11	1		94	N	
1	3/26/78	1	1		125	Y	
1	3/26/78	2	1		121	N	
1	3/26/78	3	1		99	N	
1	3/26/78	4	1		98	N	
1	3/26/78	5	1		98	N	
1	3/26/78	6	1		97	N	
1	3/26/78	7	1		97	N	
1	3/26/78	8	1		97	N	
1	3/26/78	9	1		97	N	
1	3/26/78	10	1		97	N	
1	3/26/78	11	1		97	N	
1	3/26/78	12	1		97	N	
1	4/23/78	1	1		122	Y	
1	4/23/78	2	1		118	N	
1	4/23/78	3	1		104	N	
1	4/23/78	4	1		104	N	
1	4/23/78	5	1		103	N	
6	4/23/78	5	1		103	N	
6	4/23/78	7	1		102	N	
6	4/23/78	8	1		103	N	
6	4/23/78	9	1		102	N	
6	4/23/78	10	1		102	N	
6	4/23/78	11	1		103	N	
6	4/23/78	12	1		99	N	
6	4/23/78	13	1		94	N	
1	5/19/78	1	1		121	Y	
1	5/19/78	2	1		118	N	
1	5/19/78	3	1		96	N	
1	5/19/78	4	1		95	N	
1	5/19/78	5	1		95	N	
1	5/19/78	6	1		95	N	
1	5/19/78	7	1		95	N	
1	5/19/78	8	1		95	N	
1	5/19/78	9	1		95	N	
1	5/19/78	10	1		95	N	
1	5/19/78	11	1		95	N	
1	5/19/78	12	1		95	N	
1	5/19/78	13	1		95	N	
1	5/19/78	14	1		95	N	
1	6/17/78	1	1		118	Y	
1	6/17/78	2	1		115	N	
1	6/17/78	3	1		95	N	
1	6/17/78	4	1		94	N	
1	6/17/78	5	1		93	N	
1	6/17/78	6	1		93	N	
1	6/17/78	7	1		93	N	
1	6/17/78	8	1		93	N	
1	6/17/78	9	1		93	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/17/78	10	1		93	N	
1	6/17/78	11	1		93	N	
1	6/17/78	12	1		93	N	
1	6/17/78	13	1		93	N	
1	6/17/78	14	1		93	N	
1	7/16/78	1	1		124	Y	
1	7/16/78	2	1		122	N	
1	7/16/78	3	1		103	N	
1	7/16/78	4	1		102	N	
1	7/16/78	5	1		102	N	
1	7/16/78	6	1		102	N	
1	7/16/78	7	1		102	N	
1	7/16/78	8	1		102	N	
1	7/16/78	9	1		102	N	
1	7/16/78	10	1		102	N	
1	7/16/78	11	1		102	N	
1	8/13/78	1	1		117	Y	
1	8/13/78	2	1		116	N	
1	8/13/78	3	1		98	N	
1	8/13/78	4	1		96	N	
1	8/13/78	5	1		96	N	
1	8/13/78	6	1		96	N	
1	8/13/78	7	1		96	N	
1	8/13/78	8	1		96	N	
1	8/13/78	9	1		96	N	
1	8/13/78	10	1		96	N	
1	8/13/78	11	1		96	N	
1	9/11/78	1	1		121	Y	
1	9/11/78	2	1		119	N	
1	9/11/78	3	1		100	N	
1	9/11/78	4	1		99	N	
1	9/11/78	5	1		99	N	
1	9/11/78	6	1		99	N	
1	9/11/78	7	1		100	N	
1	9/11/78	8	1		100	N	
1	9/11/78	9	1		100	N	
1	9/11/78	10	1		100	N	
1	9/11/78	11	1		100	N	
1	1/9/79	1	1		126	N	
1	1/9/79	2	1		128	Y	
1	1/9/79	3	1		106	N	
1	1/9/79	4	1		103	N	
1	1/9/79	5	1		102	N	
1	1/9/79	6	1		102	N	
1	1/9/79	7	1		102	N	
1	1/9/79	8	1		102	N	
1	1/9/79	9	1		102	N	
1	1/9/79	10	1		101	N	
1	1/9/79	11	1		101	N	
1	1/9/79	12	1		101	N	
1	7/12/79	1	1		116	Y	
1	7/12/79	2	1		114	N	
1	7/12/79	3	1		96	N	
1	7/12/79	4	1		95	N	
1	7/12/79	5	1		95	N	
1	7/12/79	6	1		95	N	
1	7/12/79	7	1		94	N	
1	7/12/79	8	1		94	N	
1	7/12/79	9	1		94	N	
1	7/12/79	10	1		93	N	
1	7/12/79	11	1		93	N	
1	7/23/79	1	1		111	Y	
1	7/23/79	2	1		109	N	
1	7/23/79	3	1		92	N	
1	7/23/79	4	1		91	N	
1	7/23/79	5	1		91	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/23/79	6	1		91	N	
1	7/23/79	7	1		91	N	
1	7/23/79	8	1		91	N	
1	7/23/79	9	1		91	N	
1	7/23/79	10	1		91	N	
1	7/23/79	11	1		91	N	
1	8/11/79	1	1		108	Y	
1	8/11/79	2	1		107	N	
1	8/11/79	3	1		90	N	
1	8/11/79	4	1		88	N	
1	8/11/79	5	1		88	N	
1	8/11/79	6	1		88	N	
1	8/11/79	7	1		88	N	
1	8/11/79	8	1		87	N	
1	8/11/79	9	1		87	N	
1	8/11/79	10	1		87	N	
1	8/11/79	11	1		86	N	
1	3/12/80	1	1		109	Y	
1	3/12/80	2	1		107	N	
1	3/12/80	3	1		91	N	
1	3/12/80	4	1		91	N	
1	3/12/80	5	1		91	N	
1	3/12/80	6	1		91	N	
1	3/12/80	7	1		92	N	
1	3/12/80	8	1		91	N	
1	3/12/80	9	1		91	N	
1	3/12/80	10	1		90	N	
1	3/12/80	11	1		90	N	
1	5/14/80	1	1		115	Y	
1	5/14/80	2	1		112	N	
1	5/14/80	3	1		94	N	
1	5/14/80	4	1		93	N	
1	5/14/80	5	1		93	N	
1	5/14/80	6	1		93	N	
1	5/14/80	7	1		93	N	
1	5/14/80	8	1		93	N	
1	5/14/80	9	1		93	N	
1	5/14/80	10	1		93	N	
1	5/14/80	11	1		93	N	
1	12/6/81	1	1		118	Y	
1	12/6/81	2	1		110	N	
1	12/6/81	3	1		99	N	
1	12/6/81	4	1		96	N	
1	12/6/81	5	1		96	N	
1	12/6/81	6	1		96	N	
1	12/6/81	7	1		96	N	
1	12/6/81	8	1		86	N	
1	12/6/81	9	1		86	N	
1	12/6/81	10	1		86	N	
1	12/6/81	11	1		90	N	
1	1/14/82	1	1		131	Y	
1	1/14/82	2	1		127	N	
1	1/14/82	3	1		109	N	
1	1/14/82	4	1		108	N	
1	1/14/82	5	1		107	N	
1	1/14/82	6	1		107	N	
1	1/14/82	7	1		107	N	
1	1/14/82	8	1		107	N	
1	1/14/82	9	1		107	N	
1	1/14/82	10	1		107	N	
1	1/14/82	11	1		107	N	
1	4/16/82	1	1			N	O/S
1	6/9/83	1	1		105	Y	
1	6/9/83	2	1		104	N	
1	6/9/83	3	1		91	N	
1	6/9/83	4	1		89	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/9/83	5	1		89	N	
1	6/9/83	6	1		86	N	
1	6/9/83	7	1		90	N	
1	6/9/83	8	1		90	N	
1	6/9/83	9	1		90	N	
1	6/9/83	10	1		90	N	
1	6/9/83	11	1		90	N	
1	6/9/83	12	1		89	N	
1	11/8/83	1	1		124	Y	
1	11/8/83	2	1		122	N	
1	11/8/83	3	1		108	N	
1	11/8/83	4	1		107	N	
1	11/8/83	5	1		107	N	
1	11/8/83	6	1		106	N	
1	11/8/83	7	1		106	N	
1	11/8/83	8	1		106	N	
1	11/8/83	9	1		106	N	
1	11/8/83	10	1		106	N	
1	11/8/83	11	1		106	N	
1	12/6/83	1	1		129	N	
1	12/6/83	2	1		130	Y	
1	12/6/83	3	1		113	N	
1	12/6/83	4	1		112	N	
1	12/6/83	5	1		112	N	
1	12/6/83	6	1		112	N	
1	12/6/83	7	1		112	N	
1	12/6/83	8	1		112	N	
1	12/6/83	9	1		112	N	
1	12/6/83	10	1		112	N	
1	12/6/83	11	1		112	N	
1	2/14/84	1	1		122	Y	
1	2/14/84	2	1		118	N	
1	2/14/84	3	1		102	N	
1	2/14/84	4	1		100	N	
1	2/14/84	5	1		100	N	
1	2/14/84	6	1		100	N	
1	2/14/84	7	1		100	N	
1	2/14/84	8	1		100	N	
1	2/14/84	9	1		99	N	
1	2/14/84	10	1		99	N	
1	2/14/84	11	1		99	N	
1	2/14/84	12	1		99	N	
1	3/26/84	1	1		110	Y	
1	3/26/84	2	1		105	N	
1	3/26/84	3	1		95	N	
1	3/26/84	4	1		90	N	
1	3/26/84	5	1		89	N	
1	3/26/84	6	1		88	N	
1	3/26/84	7	1		88	N	
1	3/26/84	8	1		86	N	
1	3/26/84	9	1		88	N	
1	3/26/84	10	1		88	N	
1	3/26/84	11	1		86	N	
1	4/7/84	1	1		99	Y	
1	4/7/84	2	1		95	N	
1	4/7/84	3	1		79	N	
1	4/7/84	4	1		79	N	
1	4/7/84	5	1		79	N	
1	4/7/84	6	1		79	N	
1	4/7/84	7	1		80	N	
1	4/7/84	8	1		80	N	
1	4/7/84	9	1		80	N	
1	4/7/84	10	1		80	N	
1	4/7/84	11	1		80	N	
1	6/19/84	1	1		120	Y	type J
1	6/19/84	2	1		118	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/19/84	3	1		103	N	
1	6/19/84	4	1		103	N	
1	6/19/84	5	1		103	N	
1	6/19/84	6	1		103	N	
1	6/19/84	7	1		103	N	
1	6/19/84	8	1		103	N	
1	6/19/84	9	1		103	N	
1	6/19/84	10	1		103	N	
1	6/19/84	11	1		103	N	
1	6/19/84	12	1		103	N	
1	6/19/84	13	1		103	N	
1	6/19/84	14	1		103	N	
1	6/19/84	15	1		103	N	
1	6/19/84	16	1		103	N	
1	9/3/84	1	1		89	N	
1	9/3/84	2	1		96	Y	
1	9/3/84	3	1		80	N	
1	9/3/84	4	1		79	N	
1	9/3/84	5	1		79	N	
1	9/3/84	6	1		80	N	
1	9/3/84	7	1		80	N	
1	9/3/84	8	1		80	N	
1	9/3/84	9	1		81	N	
1	9/3/84	10	1		80	N	
1	9/3/84	11	1		80	N	
1	3/3/85	1	1		113	Y	
1	3/3/85	2	1		107	N	
1	3/3/85	3	1		90	N	
1	3/3/85	4	1		89	N	
1	3/3/85	5	1		89	N	
1	3/3/85	6	1		89	N	
1	3/3/85	7	1		89	N	
1	3/3/85	8	1		89	N	
1	3/3/85	9	1		88	N	
1	3/3/85	10	1		88	N	
1	3/3/85	11	1		88	N	
1	3/3/85	12	1		88	N	
1	3/3/85	13	1		88	N	
1	3/3/85	14	1		85	N	
1	3/3/85	15	1		84	N	
1	3/3/85	16	1		82	N	
1	3/5/85	1	1		114	Y	
1	3/5/85	2	1		109	N	
1	3/5/85	3	1		92	N	
1	3/5/85	4	1		91	N	
1	3/5/85	5	1		91	N	
1	3/5/85	6	1		91	N	
1	3/5/85	7	1		91	N	
1	3/5/85	8	1		91	N	
1	3/5/85	9	1		91	N	
1	3/5/85	10	1		90	N	
1	3/5/85	11	1		91	N	
1	4/18/85	1	1		117	Y	
1	4/18/85	2	1		112	N	
1	4/18/85	3	1		96	N	
1	4/18/85	4	1		95	N	
1	4/18/85	5	1		95	N	
1	4/18/85	6	1		95	N	
1	4/18/85	7	1		94	N	
1	4/18/85	8	1		94	N	
1	4/18/85	9	1		94	N	
1	4/18/85	10	1		94	N	
1	4/18/85	11	1		94	N	
1	5/7/85	1	1		115	Y	
1	5/7/85	2	1		111	N	
1	6/4/85	1	1		116	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/4/85	2	1		113	N	
1	6/4/85	3	1		98	N	
1	6/4/85	4	1		98	N	
1	6/4/85	5	1		98	N	
1	6/4/85	6	1		98	N	
1	6/4/85	7	1		97	N	
1	6/4/85	8	1		96	N	
1	6/4/85	9	1		97	N	
1	6/4/85	10	1		97	N	
1	6/4/85	11	1		97	N	
1	6/4/85	12	1		93	N	
1	7/2/85	1	1			N	O/S WORK ORDER ISSUED
1	8/5/85	1	1			N	O/S
1	9/1/85	1	1			N	O/S
1	1/6/86	1	1		116.8	Y	
1	1/6/86	2	1		112.6	N	
1	1/6/86	3	1		96	N	
1	1/6/86	4	1		95	N	
1	1/6/86	5	1		95	N	
1	1/6/86	6	1		95	N	
1	1/6/86	7	1		95	N	
1	1/6/86	8	1		95	N	
1	1/6/86	9	1		95	N	
1	1/6/86	10	1		95	N	
1	1/6/86	11	1		94	N	
1	4/7/86	1	1			N	O/S
1	5/11/86	1	1		115.6	Y	type J
1	5/11/86	2	1		111.3	N	
1	5/11/86	3	1		96	N	
1	5/11/86	4	1		95	N	
1	5/11/86	5	1		94.8	N	
1	5/11/86	6	1		94.6	N	
1	5/11/86	7	1		94.4	N	
1	5/11/86	8	1		94.4	N	
1	5/11/86	9	1		94.2	N	
1	5/11/86	10	1		94	N	
1	5/11/86	11	1		94	N	
1	6/3/86	1	1		116	Y	
1	6/3/86	2	1		112	N	
1	6/3/86	3	1		96	N	
1	6/3/86	4	1		95	N	
1	6/3/86	5	1		95	N	
1	6/3/86	6	1		95	N	
1	6/3/86	7	1		95	N	
1	6/3/86	8	1		95	N	
1	6/3/86	9	1		94	N	
1	6/3/86	10	1		94	N	
1	6/3/86	11	1		94	N	
1	7/7/86	1	1			N	72.8 - suspect data (low)
1	7/7/86	2	1			N	75.5 - suspect data (low)
1	7/7/86	3	1		89.4	N	
1	7/7/86	4	1		90.4	N	
1	7/7/86	5	1		90.7	N	
1	7/7/86	6	1		91.1	N	
1	7/7/86	7	1		91.5	N	
1	7/7/86	8	1		92.3	N	
1	7/7/86	9	1		92.5	N	
1	7/7/86	10	1		92.9	N	
1	7/7/86	11	1		93.3	Y	
1	7/7/86	12	1		93.3	N	
1	7/7/86	13	1		93.3	N	
1	7/7/86	14	1		93.3	N	
1	7/7/86	15	1		93.3	N	
1	7/7/86	16	1		93.3	N	
1	8/4/86	1	1		114	N	
1	8/4/86	2	1		115	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	8/4/86	3	1		103	N	
1	8/4/86	4	1		102	N	
1	8/4/86	5	1		101	N	
1	8/4/86	6	1		102	N	
1	8/4/86	7	1		102	N	
1	8/4/86	8	1		102	N	
1	8/4/86	9	1		102	N	
1	8/4/86	10	1		101	N	
1	8/4/86	11	1		102	N	
1	8/4/86	12	1		101	N	
1	9/1/86	1	1		120	Y	
1	9/1/86	2	1		118	N	
1	9/1/86	3	1		106	N	
1	9/1/86	4	1		106	N	
1	9/1/86	5	1		106	N	
1	9/1/86	6	1		106	N	
1	9/1/86	7	1		105	N	
1	9/1/86	8	1		105	N	
1	9/1/86	9	1		105	N	
1	9/1/86	10	1		105	N	
1	9/1/86	11	1		105	N	
1	9/1/86	12	1		105	N	
1	9/1/86	13	1		105	N	
1	9/1/86	14	1		105	N	
1	9/1/86	15	1		105	N	
1	9/1/86	16	1		105	N	
1	9/1/86	17	1		105	N	
1	10/6/86	1	1		119.8	Y	
1	10/6/86	2	1		118.2	N	
1	10/6/86	3	1		104.5	N	
1	10/6/86	4	1		103.7	N	
1	10/6/86	5	1		103.5	N	
1	10/6/86	6	1		103.4	N	
1	10/6/86	7	1		103.3	N	
1	10/6/86	8	1		104.5	N	
1	10/6/86	9	1		103.1	N	
1	10/6/86	10	1		103	N	
1	10/6/86	11	1		102.9	N	
1	11/1/86	1	1		109	Y	type E
1	11/1/86	2	1		106	N	
1	11/1/86	3	1		95	N	
1	11/1/86	4	1		94	N	
1	11/1/86	5	1		94	N	
1	11/1/86	6	1		94	N	
1	11/1/86	7	1		94	N	
1	11/1/86	8	1		94	N	
1	11/1/86	9	1		94	N	
1	11/1/86	10	1		94	N	
1	11/1/86	11	1		94	N	
1	12/2/86	1	1		120.4	Y	
1	12/2/86	2	1		117	N	
1	12/2/86	3	1		102	N	
1	12/2/86	4	1		101	N	
1	12/2/86	5	1		101	N	
1	12/2/86	6	1		101	N	
1	12/2/86	7	1		101	N	
1	12/2/86	8	1		101	N	
1	12/2/86	9	1		101	N	
1	12/2/86	10	1		101	N	
1	12/2/86	11	1		101	N	
1	2/3/87	1	1		118	Y	
1	2/3/87	2	1		114	N	
1	2/3/87	3	1		99	N	
1	2/3/87	4	1		98	N	
1	2/3/87	5	1		98	N	
1	2/3/87	6	1		98	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	2/3/87	7	1		97	N	
1	2/3/87	8	1		97	N	
1	2/3/87	9	1		97	N	
1	2/3/87	10	1		96	N	
1	2/3/87	11	1		96	N	
1	4/13/87	1	1		114	Y	
1	4/13/87	2	1		110	N	
1	4/13/87	3	1		95	N	
1	4/13/87	4	1		95	N	
1	4/13/87	5	1		95	N	
1	4/13/87	6	1		94	N	
1	4/13/87	7	1		94	N	
1	4/13/87	8	1		94	N	
1	4/13/87	9	1		94	N	
1	4/13/87	10	1		94	N	
1	4/13/87	11	1		94	N	
1	5/3/87	1	1		114	Y	
1	5/3/87	2	1		111	N	
1	5/3/87	3	1		95	N	
1	5/3/87	4	1		96	N	
1	5/3/87	5	1		95	N	
1	5/3/87	6	1		94	N	
1	5/3/87	7	1		94	N	
1	5/3/87	8	1		94	N	
1	5/3/87	9	1		94	N	
1	5/3/87	10	1		94	N	
1	5/3/87	11	1		94	N	
1	5/3/87	12	1		94	N	
1	6/1/87	1	1		109	Y	
1	6/1/87	2	1		107	N	
1	6/1/87	3	1		93	N	
1	6/1/87	4	1		93	N	
1	6/1/87	5	1		93	N	
1	6/1/87	6	1		93	N	
1	6/1/87	7	1		92	N	
1	6/1/87	8	1		92	N	
1	6/1/87	9	1		92	N	
1	6/1/87	10	1		92	N	
1	6/1/87	11	1		92	N	
1	7/6/87	1	1		115.1	Y	
1	7/6/87	2	1		112.4	N	
1	7/6/87	3	1		90.9	N	
1	7/6/87	4	1		98.1	N	
1	7/6/87	5	1		98	N	
1	7/6/87	6	1		98	N	
1	7/6/87	7	1		98.2	N	
1	7/6/87	8	1		98.1	N	
1	7/6/87	9	1		98.1	N	
1	7/6/87	10	1		98.2	N	
1	7/6/87	11	1		98.4	N	
1	9/7/87	1	1		116.8	Y	
1	9/7/87	2	1		115.4	N	
1	9/7/87	3	1		102.4	N	
1	9/7/87	4	1		101.6	N	
1	9/7/87	5	1		101.5	N	
1	9/7/87	6	1		101.2	N	
1	9/7/87	7	1		100.8	N	
1	9/7/87	8	1		100.4	N	
1	9/7/87	9	1		100	N	
1	9/7/87	10	1		99.6	N	
1	9/7/87	11	1		99.3	N	
1	10/5/87	1	1		120	Y	
1	10/5/87	2	1		118	N	
1	10/5/87	3	1		105	N	
1	10/5/87	4	1		105	N	
1	10/5/87	5	1		104	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/5/87	6	1		104	N	
1	10/5/87	7	1		103	N	
1	10/5/87	8	1		103	N	
1	10/5/87	9	1		103	N	
1	10/5/87	10	1		103	N	
1	10/5/87	11	1		103	N	
1	11/3/87	1	1		135	Y	
1	11/3/87	2	1		133	N	
1	11/3/87	3	1		121	N	
1	11/3/87	4	1		119	N	
1	11/3/87	5	1		119	N	
1	11/3/87	6	1		119	N	
1	11/3/87	7	1		119	N	
1	11/3/87	8	1		119	N	
1	11/3/87	9	1		119	N	
1	11/3/87	10	1		119	N	
1	11/3/87	11	1		119	N	
1	12/8/87	1	1		118	Y	
1	12/8/87	2	1		114	N	
1	12/8/87	3	1		102	N	
1	12/8/87	4	1		101	N	
1	12/8/87	5	1		100	N	
1	12/8/87	6	1		97	N	
1	12/8/87	7	1		101	N	
1	12/8/87	8	1		101	N	
1	12/8/87	9	1		103	N	
1	12/8/87	10	1		101	N	
1	12/8/87	11	1		107	N	
1	2/1/88	1	1		134	Y	
1	2/1/88	2	1		132	N	
1	2/1/88	3	1		121	N	
1	2/1/88	4	1		119	N	
1	2/1/88	5	1		119	N	
1	2/1/88	6	1		119	N	
1	2/1/88	7	1		119	N	
1	2/1/88	8	1		119	N	
1	2/1/88	9	1		119	N	
1	2/1/88	10	1		119	N	
1	2/1/88	11	1		119	N	
1	3/7/88	1	1		118	Y	
1	3/7/88	2	1		113	N	
1	3/7/88	3	1		97	N	
1	3/7/88	4	1		96	N	
1	3/7/88	5	1		96	N	
1	3/7/88	6	1		96	N	
1	3/7/88	7	1		96	N	
1	3/7/88	8	1		96	N	
1	3/7/88	9	1		96	N	
1	3/7/88	10	1		95	N	
1	3/7/88	11	1		95	N	
1	5/3/88	1	1			N	O/S
1	6/7/88	1	1		118	Y	
1	6/7/88	2	1		113	N	
1	6/7/88	3	1		97	N	
1	6/7/88	4	1		96	N	
1	6/7/88	5	1		96	N	
1	6/7/88	6	1		96	N	
1	6/7/88	7	1		96	N	
1	6/7/88	8	1		96	N	
1	6/7/88	9	1		96	N	
1	6/7/88	10	1		95	N	
1	6/7/88	11	1		95	N	
1	9/5/88	1	1			N	O/S
1	2/6/89	1	1			N	O/S
1	3/6/89	1	1		115	Y	
1	3/6/89	2	1		110	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	3/6/89	3	1		95	N	
1	3/6/89	4	1		94	N	
1	3/6/89	5	1		94	N	
1	3/6/89	6	1		94	N	
1	3/6/89	7	1		94	N	
1	3/6/89	8	1		94	N	
1	3/6/89	9	1			N	OUT OF SERVICE
1	3/6/89	10	1		94	N	
1	3/6/89	11	1		93	N	
1	4/5/89	1	1		118	Y	
1	4/5/89	2	1		111	N	
1	4/5/89	3	1		99	N	
1	4/5/89	4	1		93	N	
1	4/5/89	5	1		93	N	
1	4/5/89	6	1		93	N	
1	4/5/89	7	1		93	N	
1	4/5/89	8	1		92	N	
1	4/5/89	9	1		92	N	
1	4/5/89	10	1		92	N	
1	4/5/89	11	1		91	N	
1	7/5/89	1	1			N	74.8 - suspect data (low)
1	7/5/89	2	1			N	78 - suspect data (low)
1	7/5/89	3	1		89.3	N	
1	7/5/89	4	1			N	40.2 - suspect data (low)
1	7/5/89	5	1		90.8	N	
1	7/5/89	6	1		91.2	N	
1	7/5/89	7	1		91.5	Y	
1	7/5/89	8	1		88.7	N	
1	7/5/89	9	1		88.4	N	
1	7/5/89	10	1		88.5	N	
1	7/5/89	11	1		88.3	N	
1	1/1/90	1	1		116.8	Y	
1	1/1/90	2	1		112	N	
1	1/1/90	3	1		97	N	
1	1/1/90	4	1		96	N	
1	1/1/90	5	1		96	N	
1	1/1/90	6	1		95.9	N	
1	1/1/90	7	1		95.7	N	
1	1/1/90	8	1		95.7	N	
1	1/1/90	9	1		95.7	N	
1	1/1/90	10	1		95.5	N	
1	1/1/90	11	1		95.3	N	
1	11/12/91	1	1		112	Y	J-TI-023
1	11/12/91	2	1		109	N	
1	11/12/91	3	1		97	N	
1	11/12/91	4	1		97	N	
1	11/12/91	5	1		97	N	
1	11/12/91	6	1		96	N	
1	11/12/91	7	1		96	N	
1	11/12/91	8	1		97	N	
1	11/12/91	9	1		96	N	
1	11/12/91	10	1		96	N	
1	11/12/91	11	1		96	N	
1	1/4/92	1	1		111.3	Y	J-910126143-50 TC #8,10,12 O/S
1	1/4/92	2	1		106.5	N	
1	1/4/92	3	1		93	N	
1	1/4/92	4	1		92.2	N	
1	1/4/92	5	1		92.1	N	
1	1/4/92	6	1		92	N	
1	1/4/92	7	1		91.9	N	
1	1/4/92	9	1		91.7	N	
1	1/4/92	11	1		91.4	N	
1	7/2/92	1	1		106.5	Y	J TI-041
1	7/2/92	2	1		103.4	N	
1	7/2/92	3	1		91.9	N	
1	7/2/92	4	1		91.3	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-101							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y = MAX TEMP	COMMENTS
1	7/2/92	5	1		91.3	N	
1	7/2/92	6	1		91.3	N	
1	7/2/92	7	1		91.4	N	
1	7/2/92	8	1		90.6	N	
1	7/2/92	9	1		91.8	N	
1	7/2/92	11	1		91.5	N	
1	1/3/93	1	1		109.6	Y	J 890523512-47
1	1/3/93	2	1		104.9	N	
1	1/3/93	3	1		91.8	N	
1	1/3/93	4	1		90.8	N	
1	1/3/93	6	1		90.8	N	
1	1/3/93	7	1		90.9	N	
1	1/3/93	8	1		90.4	N	
1	1/3/93	9	1		90.4	N	
1	1/3/93	10	1		90.2	N	
1	1/3/93	11	1		90.2	N	
1	7/1/93	1	1		107.7	Y	J 91012614366
1	7/1/93	2	1		104.5	N	
1	7/1/93	3	1		92.9	N	
1	7/1/93	4	1		92.3	N	
1	7/1/93	5	1		92.1	N	
1	7/1/93	6	1		92.1	N	
1	7/1/93	7	1		92	N	
1	7/1/93	8	1		91.8	N	
1	7/1/93	9	1		91.8	N	
1	7/1/93	10	1		91.9	N	
1	7/1/93	11	1		91.7	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-102							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/18/74	1	1		72	Y	
1	9/18/74	2	1		72	N	
1	9/18/74	3	1		72	N	
1	9/18/74	4	1		72	N	
1	9/18/74	5	1		72	N	
1	9/18/74	6	1		72	N	
1	9/18/74	7	1		72	N	
1	9/18/74	8	1		72	N	
1	9/18/74	9	1		72	N	
1	9/18/74	10	1		72	N	
1	9/18/74	11	1		72	N	
1	9/18/74	12	1		72	N	
1	12/11/74	1	1		73	N	
1	12/11/74	2	1		73	N	
1	12/11/74	3	1		73	N	
1	12/11/74	4	1		73	N	
1	12/11/74	5	1		75	Y	
1	12/11/74	6	1		75	N	
1	12/11/74	7	1		70	N	
1	12/11/74	8	1		66	N	
1	12/11/74	9	1		66	N	
1	12/11/74	10	1		66	N	
1	12/11/74	11	1		61	N	
1	12/11/74	12	1		66	N	
1	4/9/75	1	1		75	N	
1	4/9/75	2	1		77	Y	
1	4/9/75	3	1		77	N	
1	4/9/75	4	1		77	N	
1	4/9/75	5	1		77	N	
1	4/9/75	6	1		75	N	
1	4/9/75	7	1		68	N	
1	4/9/75	8	1		64	N	
1	4/9/75	9	1		63	N	
1	4/9/75	10	1		63	N	
1	4/9/75	11	1		61	N	
1	4/9/75	12	1		64	N	
1	7/31/75	1	1		75	Y	
1	7/31/75	2	1		74	N	
1	7/31/75	3	1		74	N	
1	7/31/75	4	1		73	N	
1	7/31/75	5	1		74	N	
1	7/31/75	6	1		72	N	
1	7/31/75	7	1		72	N	
1	7/31/75	8	1		74	N	
1	7/31/75	9	1		74	N	
1	7/31/75	10	1		74	N	
1	7/31/75	11	1		71	N	
1	7/31/75	12	1		75	N	
1	1/7/76	1	1		90	Y	
1	1/7/76	2	1		89	N	
1	1/7/76	3	1		86	N	
1	1/7/76	4	1		78	N	
1	1/7/76	5	1		79	N	
1	1/7/76	6	1		77	N	
1	1/7/76	7	1		78	N	
1	1/7/76	8	1		78	N	
1	1/7/76	9	1		78	N	
1	1/7/76	10	1		78	N	
1	1/7/76	11	1		70	N	
1	1/7/76	12	1		76	N	
1	4/1/76	1	1		105	Y	
1	4/1/76	2	1		103	N	
1	4/1/76	3	1		92	N	
1	4/1/76	4	1		92	N	
1	4/1/76	5	1		92	N	
1	4/1/76	6	1		91	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-102							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/1/76	7	1		92	N	
1	4/1/76	8	1		92	N	
1	4/1/76	9	1		91	N	
1	4/1/76	10	1		90	N	
1	4/1/76	11	1		90	N	
1	11/7/76	1	1		69	N	
1	11/7/76	2	1		68	N	
1	11/7/76	3	1		68	N	
1	11/7/76	4	1		68	N	
1	11/7/76	5	1		67	N	
1	11/7/76	6	1		68	N	
1	11/7/76	7	1		69	N	
1	11/7/76	9	1		69	N	
1	11/7/76	10	1		69	N	
1	11/7/76	11	1		68	N	
1	11/7/76	12	1		69	N	
1	1/3/77	1	1		79	Y	
1	1/3/77	2	1		76	N	
1	1/3/77	3	1		75	N	
1	1/3/77	4	1		75	N	
1	1/3/77	5	1		76	N	
1	1/3/77	6	1		76	N	
1	1/3/77	7	1		75	N	
1	1/3/77	8	1		76	N	
1	1/3/77	9	1		76	N	
1	1/3/77	10	1		75	N	
1	1/3/77	11	1		70	N	
1	1/3/77	12	1		75	N	
1	4/26/77	1	1			Y	54 - suspect data (low)
1	4/26/77	2	1			N	52 - suspect data (low)
1	4/26/77	3	1			N	52 - suspect data (low)
1	4/26/77	4	1			N	52 - suspect data (low)
1	4/26/77	5	1			N	52 - suspect data (low)
1	4/26/77	6	1			N	52 - suspect data (low)
1	4/26/77	7	1			N	52 - suspect data (low)
1	4/26/77	8	1			N	52 - suspect data (low)
1	4/26/77	9	1			N	52 - suspect data (low)
1	4/26/77	10	1			N	52 - suspect data (low)
1	4/26/77	11	1			N	52 - suspect data (low)
1	4/26/77	12	1			N	53 - suspect data (low)
1	7/28/77	1	1			N	54 - suspect data (low)
1	7/28/77	2	1		64	N	
1	7/28/77	3	1		64	N	
1	7/28/77	4	1		64	N	
1	7/28/77	5	1		64	N	
1	7/28/77	6	1		64	N	
1	7/28/77	7	1		64	N	
1	7/28/77	8	1		64	N	
1	7/28/77	9	1		64	N	
1	7/28/77	10	1		64	N	
1	7/28/77	11	1		64	N	
1	7/28/77	12	1		67	Y	
1	10/7/77	1	1		69	N	
1	10/7/77	2	1		69	N	
1	10/7/77	3	1		68	N	
1	10/7/77	4	1		69	N	
1	10/7/77	5	1		69	N	
1	10/7/77	6	1		69	N	
1	10/7/77	7	1		70	Y	
1	10/7/77	8	1		69	N	
1	10/7/77	9	1		69	N	
1	10/7/77	10	1		69	N	
1	10/7/77	11	1		69	N	
1	10/7/77	12	1		69	N	
1	1/16/78	1	1		57	N	
1	1/16/78	2	1		56	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-102							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/16/78	3	1		57	N	
1	1/16/78	4	1		57	N	
1	1/16/78	5	1		58	Y	
1	1/16/78	6	1		57	N	
1	1/16/78	7	1		57	N	
1	1/16/78	8	1		58	N	
1	1/16/78	9	1		58	N	
1	1/16/78	10	1		58	N	
1	1/16/78	11	1		50	N	
1	1/16/78	12	1		57	N	
1	4/23/78	1	1		68	Y	
1	4/23/78	2	1		68	N	
1	4/23/78	3	1		68	N	
1	4/23/78	4	1		68	N	
1	4/23/78	5	1		68	N	
1	4/23/78	6	1		68	N	
1	4/23/78	7	1		68	N	
1	4/23/78	8	1		68	N	
1	4/23/78	9	1		68	N	
1	4/23/78	10	1		68	N	
1	4/23/78	11	1		68	N	
1	4/23/78	12	1		68	N	
1	6/17/78	1	1		106	Y	
1	6/17/78	2	1		102	N	
1	6/17/78	3	1		93	N	
1	6/17/78	4	1		92	N	
1	6/17/78	5	1		92	N	
1	6/17/78	6	1		92	N	
1	6/17/78	7	1		92	N	
1	6/17/78	8	1		92	N	
1	6/17/78	9	1		92	N	
1	6/17/78	10	1		92	N	
1	6/17/78	11	1		92	N	
1	6/17/78	12	1		92	N	
1	7/16/78	1	1		68	N	
1	7/16/78	2	1		67	N	
1	7/16/78	3	1		67	N	
1	7/16/78	4	1		67	N	
1	7/16/78	5	1		67	N	
1	7/16/78	6	1		67	N	
1	7/16/78	7	1		67	N	
1	7/16/78	8	1		67	N	
1	7/16/78	9	1		68	N	
1	7/16/78	10	1		68	N	
1	7/16/78	11	1		70	Y	
1	7/16/78	12	1		69	N	
1	1/9/79	1	1		65	Y	
1	1/9/79	2	1		64	N	
1	1/9/79	3	1		64	N	
1	1/9/79	4	1		64	N	
1	1/9/79	5	1		64	N	
1	1/9/79	6	1		64	N	
1	1/9/79	7	1		64	N	
1	1/9/79	8	1		64	N	
1	1/9/79	9	1		64	N	
1	1/9/79	10	1		64	N	
1	1/9/79	11	1		63	N	
1	1/9/79	12	1		63	N	
1	4/8/79	1	1		75	N	
1	4/8/79	2	1		75	N	
1	4/8/79	3	1		80	N	
1	4/8/79	4	1		81	Y	
1	4/8/79	5	1		81	N	
1	4/8/79	6	1		81	N	
1	4/8/79	7	1		81	N	
1	4/8/79	8	1		75	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-102 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/8/79	9	1		80	N	
1	4/8/79	10	1		76	N	
1	4/8/79	11	1		75	N	
1	4/8/79	12	1		77	N	
1	7/23/79	1	1		60	N	
1	7/23/79	2	1		59	N	
1	7/23/79	3	1		58	N	
1	7/23/79	4	1		58	N	
1	7/23/79	5	1		58	N	
1	7/23/79	6	1		58	N	
1	7/23/79	7	1		83	Y	
1	7/23/79	8	1		81	N	
1	7/23/79	9	1		59	N	
1	7/23/79	10	1		56	N	
1	7/23/79	11	1		60	N	
1	7/23/79	12	1		59	N	
1	3/12/80	1	1		56	N	
1	3/12/80	2	1		58	N	
1	3/12/80	3	1		58	N	
1	3/12/80	4	1		58	N	
1	3/12/80	5	1		58	N	
1	3/12/80	6	1		58	N	
1	3/12/80	7	1		82	Y	
1	3/12/80	8	1		80	N	
1	3/12/80	9	1		58	N	
1	3/12/80	10	1		58	N	
1	3/12/80	11	1		59	N	
1	3/12/80	12	1		58	N	
1	1/1/82	1	1		82	N	
1	1/1/82	2	1		79	N	
1	1/1/82	3	1		78	N	
1	1/1/82	4	1		78	N	
1	1/1/82	6	1		79	N	
1	1/1/82	7	1		81	N	
1	1/1/82	8	1		78	N	
1	1/1/82	9	1		79	N	
1	1/1/82	10	1		78	N	
1	1/1/82	11	1		74	N	
1	1/1/82	12	1		78	N	
1	4/16/82	1	1			Y	54 - suspect data (low)
1	4/16/82	2	1			N	52 - suspect data (low)
1	4/16/82	3	1			N	52 - suspect data (low)
1	4/16/82	4	1			N	52 - suspect data (low)
1	4/16/82	6	1			N	51 - suspect data (low)
1	4/16/82	7	1			N	54 - suspect data (low)
1	4/16/82	8	1			N	52 - suspect data (low)
1	4/16/82	9	1			N	52 - suspect data (low)
1	4/16/82	10	1			N	52 - suspect data (low)
1	4/16/82	11	1			N	51 - suspect data (low)
1	4/16/82	12	1			N	51 - suspect data (low)
1	2/11/84	1	1		62	Y	
1	2/11/84	2	1		60	N	
1	2/11/84	3	1		59	N	
1	2/11/84	4	1		59	N	
1	2/11/84	6	1		59	N	
1	2/11/84	7	1		58	N	
1	2/11/84	8	1		58	N	
1	2/11/84	9	1		59	N	
1	2/11/84	10	1		59	N	
1	2/11/84	11	1		57	N	
1	2/11/84	12	1		58	N	
1	7/5/89	2	1		107.2	Y	
1	7/5/89	3	1		106.9	N	
1	7/5/89	4	1		106.8	N	
1	7/5/89	6	1		107	N	
1	7/5/89	7	1		107.1	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-102							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/5/89	8	1		106.8	N	
1	7/5/89	9	1		106.4	N	
1	7/5/89	10	1		106	N	
1	7/5/89	11	1		103.5	N	
1	7/5/89	12	1		105	N	
1	1/1/90	2	1		65.8	N	
1	1/1/90	3	1		65.8	Y	
1	1/1/90	4	1		65.7	N	
1	1/1/90	6	1		65.6	N	
1	1/1/90	7	1		65.6	N	
1	1/1/90	8	1		65.6	N	
1	1/1/90	9	1		65.5	N	
1	1/1/90	10	1		65.4	N	
1	1/1/90	11	1		61.9	N	
1	1/1/90	12	1		64.4	N	
1	11/12/91	2	1		68	Y	J-TI-023 TC #1 O/S TC#5 BAD
1	11/12/91	3	1		68	N	
1	11/12/91	4	1		68	N	
1	11/12/91	6	1		68	N	
1	11/12/91	7	1		68	N	
1	11/12/91	8	1		68	N	
1	11/12/91	9	1		68	N	
1	11/12/91	10	1		68	N	
1	11/12/91	11	1		66	N	
1	11/12/91	12	1		67	N	
1	1/4/92	1	1		75.6	Y	J-910126143-50 TC #5 O/S
1	1/4/92	2	1		62.6	N	
1	1/4/92	3	1		62.6	N	
1	1/4/92	4	1		62.6	N	
1	1/4/92	6	1		62.8	N	
1	1/4/92	7	1		62.8	N	
1	1/4/92	8	1		62.8	N	
1	1/4/92	9	1		62.9	N	
1	1/4/92	10	1		62.7	N	
1	1/4/92	11	1		60	N	
1	1/4/92	12	1		62.3	N	
1	7/2/92	2	1		62.2	N	J TI-041 TC#1 O/S TC#5 BAD
1	7/2/92	3	1		62.1	N	
1	7/2/92	4	1		62	N	
1	7/2/92	6	1		62.1	N	
1	7/2/92	7	1		62.1	N	
1	7/2/92	8	1		62.7	N	
1	7/2/92	9	1		63.3	N	
1	7/2/92	10	1		63.6	N	
1	7/2/92	11	1		65.9	Y	
1	7/2/92	12	1		64	N	
1	1/3/93	2	1		62	N	J 890523512-47
1	1/3/93	3	1		62	N	
1	1/3/93	4	1		62	N	
1	1/3/93	5	1		65	Y	
1	1/3/93	6	1		61.9	N	
1	1/3/93	7	1		62	N	
1	1/3/93	8	1		62	N	
1	1/3/93	9	1		62	N	
1	1/3/93	10	1		61.7	N	
1	1/3/93	11	1		58.3	N	
1	1/3/93	12	1		61.3	N	
1	7/1/93	2	1		62.8	N	J 91012614366 TC 1 O/S
1	7/1/93	3	1		62.9	N	
1	7/1/93	4	1		62.8	N	
1	7/1/93	5	1		78	N	
1	7/1/93	6	1		62.5	N	
1	7/1/93	7	1		62.5	N	
1	7/1/93	8	1		62.7	N	
1	7/1/93	9	1		62.7	N	
1	7/1/93	10	1		62.8	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-102							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/1/93	11	1		65.4	N	
1	7/1/93	12	1		63.5	N	
332 Records selected.							

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/12/73	1		22.1	71.78	N	
1	10/12/73	2		22.9	73.22	N	
1	10/12/73	3		23.6	74.48	N	
1	10/12/73	4		24.9	76.82	N	
1	10/12/73	5		26.3	79.34	Y	
1	10/12/73	6		25.3	77.54	N	
1	10/12/73	7		25.3	77.54	N	
1	10/12/73	8		25.7	78.26	N	
1	10/12/73	9		26.3	79.34	Y	
1	10/12/73	10		25.7	78.26	N	
1	10/12/73	11		25.3	77.54	N	
1	10/12/73	12		23.6	74.48	N	
1	9/18/74	1	1		64	N	
1	9/18/74	2	1		64	N	
1	9/18/74	3	1		64	N	
1	9/18/74	4	1		64	N	
1	9/18/74	5	1		66	N	
1	9/18/74	6	1		63	N	
1	9/18/74	7	1		63	N	
1	9/18/74	8	1		63	N	
1	9/18/74	9	1		68	Y	
1	9/18/74	10	1		68	N	
1	9/18/74	11	1		68	N	
1	9/18/74	12	1		68	N	
1	12/11/74	1	1		68	Y	
1	12/11/74	2	1		59	N	
1	12/11/74	3	1		59	N	
1	12/11/74	4	1		59	N	
1	12/11/74	5	1		66	N	
1	12/11/74	6	1		57	N	
1	12/11/74	7	1		57	N	
1	12/11/74	8	1		57	N	
1	12/11/74	9	1		59	N	
1	4/9/75	1	1		61	Y	
1	4/9/75	2	1		61	N	
1	4/9/75	3	1		59	N	
1	4/9/75	4	1		59	N	
1	4/9/75	5	1		57	N	
1	4/9/75	6	1		59	N	
1	4/9/75	7	1		61	N	
1	4/9/75	8	1		57	N	
1	4/9/75	9	1		61	N	
1	4/9/75	10	1		57	N	
1	4/9/75	11	1		59	N	
1	4/9/75	12	1		61	N	
1	7/31/75	1	1		66	N	
1	7/31/75	2	1		64	N	
1	7/31/75	3	1		63	N	
1	7/31/75	4	1		63	N	
1	7/31/75	5	1		66	N	
1	7/31/75	6	1		63	N	
1	7/31/75	7	1		63	N	
1	7/31/75	8	1		65	N	
1	7/31/75	9	1		69	N	
1	7/31/75	10	1		67	N	
1	7/31/75	11	1		71	N	
1	1/7/76	1	1		83	Y	
1	1/7/76	2	1		82	N	
1	1/7/76	3	1		82	N	
1	1/7/76	4	1		81	N	
1	1/7/76	5	1		81	N	
1	1/7/76	6	1		75	N	
1	1/7/76	7	1		76	N	
1	1/7/76	8	1		75	N	
1	1/7/76	9	1		74	N	
1	1/7/76	10	1		76	N	
1	1/7/76	11	1		74	N	
1	1/7/76	12	1		69	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/1/76	1	1		74	N	
1	4/1/76	2	1		81	Y	
1	4/1/76	3	1		73	N	
1	4/1/76	4	1		72	N	
1	4/1/76	5	1		72	N	
1	4/1/76	6	1		70	N	
1	4/1/76	7	1		69	N	
1	4/1/76	8	1		64	N	
1	4/1/76	9	1		56	N	
1	4/1/76	10	1		53	N	
1	4/1/76	11	1		62	N	
1	4/1/76	12	1		60	N	
1	11/7/76	1	1		71	Y	
1	11/7/76	2	1		70	N	
1	11/7/76	3	1		70	N	
1	11/7/76	4	1		70	N	
1	11/7/76	5	1		70	N	
1	11/7/76	6	1		70	N	
1	11/7/76	7	1		70	N	
1	11/7/76	8	1		71	N	
1	11/7/76	9	1		70	N	
1	11/7/76	10	1		70	N	
1	11/7/76	11	1		69	N	
1	11/7/76	12	1		68	N	
1	1/3/77	1	1		80	Y	
1	1/3/77	2	1		77	N	
1	1/3/77	3	1		75	N	
1	1/3/77	4	1		75	N	
1	1/3/77	5	1		77	N	
1	1/3/77	6	1		76	N	
1	1/3/77	7	1		76	N	
1	1/3/77	8	1		76	N	
1	1/3/77	9	1		76	N	
1	1/3/77	10	1		76	N	
1	1/3/77	11	1		71	N	
1	1/3/77	12	1		65	N	
1	4/26/77	1	1		56	N	
1	4/26/77	2	1		74	Y	
1	4/26/77	3	1		53	N	
1	4/26/77	4	1		53	N	
1	4/26/77	5	1		56	N	
1	4/26/77	6	1		53	N	
1	4/26/77	7	1		54	N	
1	4/26/77	8	1		53	N	
1	4/26/77	9	1		56	N	
1	4/26/77	10	1		54	N	
1	4/26/77	11	1		54	N	
1	4/26/77	12	1		54	N	
1	7/28/77	1	1		59	N	
1	7/28/77	2	1		60	N	
1	7/28/77	3	1		60	N	
1	7/28/77	4	1		60	N	
1	7/28/77	5	1		64	Y	
1	7/28/77	6	1		61	N	
1	7/28/77	7	1		62	N	
1	7/28/77	8	1		60	N	
1	7/28/77	9	1		63	N	
1	7/28/77	10	1		61	N	
1	7/28/77	11	1		61	N	
1	7/28/77	12	1		62	N	
1	10/18/77	1	1		68	Y	
1	10/18/77	2	1		68	N	
1	10/18/77	3	1		68	N	
1	10/18/77	4	1		68	N	
1	10/18/77	5	1		68	N	
1	10/18/77	6	1		68	N	
1	10/18/77	7	1		68	N	
1	10/18/77	8	1		68	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/18/77	9	1		68	N	
1	10/18/77	10	1		68	N	
1	10/18/77	11	1		68	N	
1	10/18/77	12	1		67	N	
1	12/13/77	1	1		55	N	
1	12/13/77	2	1		57	N	
1	12/13/77	3	1		58	N	
1	12/13/77	4	1		57	N	
1	12/13/77	5	1		57	N	
1	12/13/77	6	1		57	N	
1	12/13/77	7	1		58	N	
1	12/13/77	8	1		56	N	
1	12/13/77	9	1		56	N	
1	12/13/77	10	1		56	N	
1	12/13/77	11	1		58	N	
1	12/13/77	12	1		61	Y	
1	1/16/78	1	1		64	N	
1	1/16/78	2	1		59	N	
1	1/16/78	3	1		60	N	
1	1/16/78	4	1		60	N	
1	1/16/78	5	1		61	N	
1	1/16/78	6	1		64	N	
1	1/16/78	7	1		64	N	
1	1/16/78	8	1		63	N	
1	1/16/78	9	1		63	N	
1	1/16/78	10	1		65	Y	
1	1/16/78	11	1		63	N	
1	1/16/78	12	1		59	N	
1	4/23/78	1	1		71	Y	
1	4/23/78	2	1		71	N	
1	4/23/78	3	1		71	N	
1	4/23/78	4	1		70	N	
1	4/23/78	5	1		70	N	
1	4/23/78	6	1		70	N	
1	4/23/78	7	1		70	N	
1	4/23/78	8	1		70	N	
1	4/23/78	9	1		70	N	
1	4/23/78	10	1		70	N	
1	4/23/78	11	1		70	N	
1	4/23/78	12	1		70	N	
1	7/16/78	1	1		66	N	
1	7/16/78	2	1		67	N	
1	7/16/78	3	1		67	N	
1	7/16/78	4	1		67	N	
1	7/16/78	5	1		67	N	
1	7/16/78	6	1		67	N	
1	7/16/78	7	1		67	N	
1	7/16/78	8	1		67	N	
1	7/16/78	9	1		67	N	
1	7/16/78	10	1		68	Y	
1	7/16/78	11	1		68	N	
1	7/16/78	12	1		68	N	
1	7/16/78	13	1		68	N	
1	1/9/79	1	1		66	Y	
1	1/9/79	2	1		63	N	
1	1/9/79	3	1		63	N	
1	1/9/79	4	1		63	N	
1	1/9/79	5	1		62	N	
1	1/9/79	6	1		62	N	
1	1/9/79	7	1		62	N	
1	1/9/79	8	1		62	N	
1	1/9/79	9	1		61	N	
1	1/9/79	10	1		61	N	
1	1/9/79	11	1		61	N	
1	1/9/79	12	1		61	N	
1	4/8/79	1	1		79	Y	
1	4/8/79	2	1		79	N	
1	4/8/79	3	1		77	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/8/79	4	1		76	N	
1	4/8/79	5	1		76	N	
1	4/8/79	6	1		76	N	
1	4/8/79	7	1		76	N	
1	4/8/79	8	1		76	N	
1	4/8/79	9	1		76	N	
1	4/8/79	10	1		76	N	
1	4/8/79	11	1		76	N	
1	4/8/79	12	1		75	N	
1	7/23/79	1	1		59	N	
1	7/23/79	2	1		73	N	
1	7/23/79	3	1		55	N	
1	7/23/79	4	1		75	Y	
1	7/23/79	5	1		54	N	
1	7/23/79	6	1		56	N	
1	7/23/79	7	1		56	N	
1	7/23/79	8	1		56	N	
1	7/23/79	9	1		55	N	
1	7/23/79	10	1		56	N	
1	7/23/79	11	1		57	N	
1	7/23/79	12	1		58	N	
1	3/12/80	1	1		60	N	
1	3/12/80	2	1		71	N	
1	3/12/80	3	1		53	N	
1	3/12/80	4	1		74	Y	
1	3/12/80	5	1		53	N	
1	3/12/80	6	1		53	N	
1	3/12/80	7	1		53	N	
1	3/12/80	8	1		53	N	
1	3/12/80	9	1		53	N	
1	3/12/80	10	1		55	N	
1	3/12/80	11	1		55	N	
1	1/1/82	1	1		78	Y	
1	1/1/82	2	1		78	N	
1	1/1/82	3	1		76	N	
1	1/1/82	4	1		76	N	
1	1/1/82	5	1		76	N	
1	1/1/82	6	1		76	N	
1	1/1/82	7	1		76	N	
1	1/1/82	8	1		76	N	
1	1/1/82	9	1		78	N	
1	1/1/82	10	1		76	N	
1	1/1/82	11	1		75	N	
1	1/1/82	12	1		74	N	
1	4/16/82	1	1		54	Y	
1	4/16/82	2	1		52	N	
1	4/16/82	3	1		52	N	
1	4/16/82	4	1		52	N	
1	4/16/82	5	1		52	N	
1	4/16/82	6	1		52	N	
1	4/16/82	7	1		52	N	
1	4/16/82	8	1		52	N	
1	4/16/82	9	1		54	N	
1	4/16/82	10	1		52	N	
1	4/16/82	11	1		52	N	
1	4/16/82	12	1		51	N	
1	2/11/84	1	1		61	Y	
1	2/11/84	3	1		57	N	
1	2/11/84	4	1		57	N	
1	2/11/84	5	1		57	N	
1	2/11/84	6	1		57	N	
1	2/11/84	7	1		57	N	
1	2/11/84	8	1		57	N	
1	2/11/84	9	1		57	N	
1	2/11/84	10	1		57	N	
1	2/11/84	11	1		57	N	
1	2/11/84	12	1		57	N	
1	1/1/90	2	1		63	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/90	3	1		63.1	Y	
1	1/1/90	4	1		63.1	N	
1	1/1/90	5	1		63	N	
1	1/1/90	6	1		63	N	
1	1/1/90	7	1		62.9	N	
1	1/1/90	8	1		62.9	N	
1	1/1/90	9	1		62.8	N	
1	1/1/90	10	1		62.8	N	
1	1/1/90	11	1		62.4	N	
1	1/1/90	12	1		60.5	N	
1	2/5/90	1	1		61.8	N	J
1	2/5/90	3	1		60.6	N	
1	2/5/90	4	1		60.5	N	
1	2/5/90	5	1		60.5	N	
1	2/5/90	6	1		64.4	Y	
1	2/5/90	7	1		60.9	N	
1	2/5/90	8	1		60.3	N	
1	2/5/90	9	1		60.3	N	
1	2/5/90	10	1		60.3	N	
1	2/5/90	11	1		59.9	N	
1	2/5/90	12	1		58	N	
1	10/29/90	1	1		66.7	N	J-89023512-20
1	10/29/90	2	1		61.3	N	
1	10/29/90	3	1		66.9	N	
1	10/29/90	4	1		66.9	N	
1	10/29/90	5	1		67	N	
1	10/29/90	6	1		67.1	N	
1	10/29/90	7	1		67.3	N	
1	10/29/90	8	1		67.5	Y	
1	10/29/90	9	1		67.1	N	
1	10/29/90	10	1		67.1	N	
1	10/29/90	11	1		67	N	
1	10/29/90	12	1		67.3	N	
1	11/12/90	1	1		67	Y	2E-OP-021
1	11/12/90	3	1		66	N	
1	11/12/90	4	1		66	N	
1	11/12/90	5	1		66	N	
1	11/12/90	6	1		65	N	
1	11/12/90	7	1		65	N	
1	11/12/90	8	1		65	N	
1	11/12/90	9	1		65	N	
1	11/12/90	10	1		65	N	
1	11/12/90	11	1		65	N	
1	11/12/90	12	1		65	N	
1	11/18/90	1	1		65.1	N	J 890523512-20
1	11/18/90	3	1		65.4	N	
1	11/18/90	4	1		65.4	N	
1	11/18/90	5	1		65.4	N	
1	11/18/90	6	1		65.4	N	
1	11/18/90	7	1		65.7	Y	
1	11/18/90	8	1		65.5	N	
1	11/18/90	9	1		65.5	N	
1	11/18/90	10	1		65.4	N	
1	11/18/90	11	1		65.4	N	
1	11/18/90	12	1		65.4	N	
1	11/25/90	1	1		65	N	J-2E-OP-021
1	11/25/90	2	1		60.2	N	
1	11/25/90	3	1		65.1	N	
1	11/25/90	4	1		65.2	N	
1	11/25/90	5	1		65.2	N	
1	11/25/90	6	1		65.3	N	
1	11/25/90	7	1		65.3	N	
1	11/25/90	8	1		65.3	N	
1	11/25/90	9	1		65.3	N	
1	11/25/90	10	1		65.2	N	
1	11/25/90	11	1		65.1	N	
1	11/25/90	12	1		64.6	N	
1	12/5/90	1	1		64.7	N	J 890523512-20

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	12/5/90	3	1		64.8	Y	
1	12/5/90	4	1		64.8	N	
1	12/5/90	5	1		64.7	N	
1	12/5/90	6	1		64.7	N	
1	12/5/90	7	1		63.2	N	
1	12/5/90	8	1		64.8	N	
1	12/5/90	9	1		64.7	N	
1	12/5/90	10	1		64.7	N	
1	12/5/90	11	1		64.7	N	
1	12/11/90	1	1		62.6	Y	J 890423320-11
1	12/11/90	3	1		62.2	N	
1	12/11/90	4	1		62.1	N	
1	12/11/90	5	1		62.2	N	
1	12/11/90	6	1		62.2	N	
1	12/11/90	7	1		62.2	N	
1	12/11/90	8	1		62.6	N	
1	12/11/90	9	1		62.6	N	
1	12/11/90	10	1		62.6	N	
1	12/11/90	11	1		62.3	N	
1	12/11/90	12	1		61.2	N	
1	12/16/90	1	1		63.5	Y	HH-99A-J
1	12/16/90	3	1		63.1	N	
1	12/16/90	4	1		63.1	N	
1	12/16/90	5	1		63.1	N	
1	12/16/90	6	1		63.1	N	
1	12/16/90	7	1		63.2	N	
1	12/16/90	8	1		63.2	N	
1	12/16/90	9	1		63.2	N	
1	12/16/90	10	1		63.3	N	
1	12/16/90	11	1		63	N	
1	12/16/90	12	1		61.5	N	
1	12/22/90	1	1		64	Y	J 890423320-11
1	12/22/90	2	1		62	N	
1	12/22/90	3	1		64	N	
1	12/22/90	4	1		64	N	
1	12/22/90	5	1		64	N	
1	12/22/90	6	1		64	N	
1	12/22/90	7	1		64	N	
1	12/22/90	8	1		64	N	
1	12/22/90	9	1		64	N	
1	12/22/90	10	1		64	N	
1	12/22/90	11	1		63	N	
1	12/22/90	12	1		61	N	
1	12/24/90	1	1		65.6	Y	J 2E-OP-021
1	12/24/90	3	1		64.9	N	
1	12/24/90	4	1		64.9	N	
1	12/24/90	5	1		64.7	N	
1	12/24/90	6	1		64.8	N	
1	12/24/90	7	1		64.8	N	
1	12/24/90	8	1		64.8	N	
1	12/24/90	9	1		64.7	N	
1	12/24/90	10	1		64.8	N	
1	12/24/90	11	1		64.3	N	
1	12/24/90	12	1		61.6	N	
1	12/24/90	1	2		64	Y	J 890423320-11
1	12/24/90	2	2		62	N	
1	12/24/90	3	2		64	N	
1	12/24/90	4	2		64	N	
1	12/24/90	5	2		64	N	
1	12/24/90	6	2		64	N	
1	12/24/90	7	2		64	N	
1	12/24/90	8	2		64	N	
1	12/24/90	9	2		64	N	
1	12/24/90	10	2		64	N	
1	12/24/90	11	2		63	N	
1	12/24/90	12	2		61	N	
1	12/31/90	1	1		64.1	N	J
1	12/31/90	3	1		63.2	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	12/31/90	4	1		63.2	N	
1	12/31/90	5	1		63.2	N	
1	12/31/90	6	1		63.2	N	
1	12/31/90	7	1		63.2	N	
1	12/31/90	8	1		63.2	N	
1	12/31/90	9	1		63.2	N	
1	12/31/90	10	1		63.1	N	
1	12/31/90	11	1		62.7	N	
1	12/31/90	12	1		59.6	N	
1	1/6/91	1	1		65	Y	J
1	1/6/91	2	1		59	N	
1	1/6/91	3	1		63	N	
1	1/6/91	4	1		63	N	
1	1/6/91	5	1		63	N	
1	1/6/91	6	1		63	N	
1	1/6/91	7	1		63	N	
1	1/6/91	8	1		63	N	
1	1/6/91	9	1		63	N	
1	1/6/91	10	1		63	N	
1	1/6/91	11	1		63	N	
1	1/6/91	12	1		59	N	
1	1/13/91	1	1		62.1	N	J 890423320-11
1	1/13/91	2	1		63	Y	
1	1/13/91	3	1		60.5	N	
1	1/13/91	4	1		60.5	N	
1	1/13/91	5	1		60.5	N	
1	1/13/91	6	1		60.6	N	
1	1/13/91	7	1		60.6	N	
1	1/13/91	8	1		60.6	N	
1	1/13/91	9	1		60.7	N	
1	1/13/91	10	1		60.8	N	
1	1/13/91	11	1		60.3	N	
1	1/13/91	12	1		57.2	N	
1	1/19/91	1	1		63.6	Y	HH-99A-J
1	1/19/91	2	1		61.9	N	
1	1/19/91	3	1		62.2	N	
1	1/19/91	4	1		62.2	N	
1	1/19/91	5	1		62.2	N	
1	1/19/91	6	1		62.2	N	
1	1/19/91	7	1		62.2	N	
1	1/19/91	8	1		62.1	N	
1	1/19/91	9	1		62	N	
1	1/19/91	10	1		61.9	N	
1	1/19/91	11	1		61.5	N	
1	1/19/91	12	1		58.5	N	
1	1/27/91	1	1		61.4	Y	J HH-99A 890523512-20
1	1/27/91	2	1		59.8	N	
1	1/27/91	3	1		60	N	
1	1/27/91	4	1		60	N	
1	1/27/91	5	1		60	N	
1	1/27/91	6	1		60	N	
1	1/27/91	7	1		60	N	
1	1/27/91	8	1			N	39.9 - suspect data (low)
1	1/27/91	9	1		60	N	
1	1/27/91	10	1		60	N	
1	1/27/91	11	1		59.5	N	
1	1/27/91	12	1		56.6	N	
1	2/3/91	1	1		59	Y	J Ser#89052312-47
1	2/3/91	2	1		57	N	
1	2/3/91	3	1		58	N	
1	2/3/91	4	1		58	N	
1	2/3/91	5	1		58	N	
1	2/3/91	6	1		58	N	
1	2/3/91	7	1		58	N	
1	2/3/91	8	1		58	N	
1	2/3/91	9	1		58	N	
1	2/3/91	10	1		57	N	
1	2/3/91	11	1		57	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	2/3/91	12	1		54	N	
1	2/9/91	1	1		59.6	Y	J-890523512-47
1	2/9/91	2	1		57.7	N	
1	2/9/91	3	1		58.1	N	
1	2/9/91	4	1		58.1	N	
1	2/9/91	5	1		58.1	N	
1	2/9/91	6	1		58.1	N	
1	2/9/91	7	1		58.1	N	
1	2/9/91	8	1		58.2	N	
1	2/9/91	9	1		58.1	N	
1	2/9/91	10	1		58	N	
1	2/9/91	11	1		57.5	N	
1	2/9/91	12	1		55	N	
1	2/16/91	1	1		57.5	Y	890523512-47
1	2/16/91	2	1		55	N	
1	2/16/91	3	1		56.1	N	
1	2/16/91	4	1		56.1	N	
1	2/16/91	5	1		56.2	N	
1	2/16/91	6	1		56.2	N	
1	2/16/91	7	1		56.1	N	
1	2/16/91	8	1		56.1	N	
1	2/16/91	9	1		56	N	
1	2/16/91	10	1		55.9	N	
1	2/16/91	11	1		55.4	N	
1	2/16/91	12	1		53	N	
1	2/23/91	1	1		57.6	Y	J 890523512-47
1	2/23/91	2	1		55.2	N	
1	2/23/91	3	1		55.9	N	
1	2/23/91	4	1		55.9	N	
1	2/23/91	5	1		55.9	N	
1	2/23/91	6	1		55.9	N	
1	2/23/91	7	1		55.9	N	
1	2/23/91	8	1		55.8	N	
1	2/23/91	9	1		55.8	N	
1	2/23/91	10	1		55.7	N	
1	2/23/91	11	1		55.3	N	
1	2/23/91	12	1		53.4	N	
1	3/3/91	1	1		56.2	Y	890523512-47
1	3/3/91	2	1		54.2	N	
1	3/3/91	3	1		54.7	N	
1	3/3/91	4	1		54.6	N	
1	3/3/91	5	1		54.6	N	
1	3/3/91	6	1		54.5	N	
1	3/3/91	7	1		54.5	N	
1	3/3/91	8	1		54.5	N	
1	3/3/91	9	1		54.5	N	
1	3/3/91	10	1		54.5	N	
1	3/3/91	11	1		54.4	N	
1	3/3/91	12	1		52.9	N	
1	3/10/91	1	1		56.7	Y	2D-OP-020
1	3/10/91	2	1		54.3	N	
1	3/10/91	3	1		55.5	N	
1	3/10/91	4	1		55.4	N	
1	3/10/91	5	1		55.4	N	
1	3/10/91	6	1		55.4	N	
1	3/10/91	7	1		55.3	N	
1	3/10/91	8	1		55.3	N	
1	3/10/91	9	1		55.2	N	
1	3/10/91	10	1		55.1	N	
1	3/10/91	11	1		54.8	N	
1	3/10/91	12	1		53	N	
1	3/17/91	1	1		59.7	Y	J 2E-OP-021 TC #2 Bad Data
1	3/17/91	3	1		58.5	N	
1	3/17/91	4	1		58.5	N	
1	3/17/91	5	1		58.5	N	
1	3/17/91	6	1		58.5	N	
1	3/17/91	7	1		58.5	N	
1	3/17/91	8	1		58.4	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	3/17/91	9	1		58.3	N	
1	3/17/91	10	1		58.2	N	
1	3/17/91	11	1		58	N	
1	3/17/91	12	1		56.7	N	
1	3/27/91	1	1		59.5	Y	J 890523512-20 TC #2 Bad Data
1	3/30/91	1	1		58.8	Y	J 890523512-20
1	3/30/91	2	1		56.9	N	
1	3/30/91	3	1		57.7	N	
1	3/30/91	4	1		57.6	N	
1	3/30/91	5	1		57.6	N	
1	3/30/91	6	1		57.5	N	
1	3/30/91	7	1		57.3	N	
1	3/30/91	8	1		57.2	N	
1	3/30/91	9	1		57.1	N	
1	3/30/91	10	1		57	N	
1	3/30/91	11	1		56.8	N	
1	3/30/91	12	1		55.7	N	
1	4/7/91	1	1		60	Y	J 890423320-11
1	4/7/91	2	1		58.2	N	
1	4/7/91	3	1		59.1	N	
1	4/7/91	4	1		59.1	N	
1	4/7/91	5	1		59.2	N	
1	4/7/91	6	1		59.1	N	
1	4/7/91	7	1		59.1	N	
1	4/7/91	8	1		59	N	
1	4/7/91	9	1		58.9	N	
1	4/7/91	10	1		58.8	N	
1	4/7/91	11	1		58.6	N	
1	4/7/91	12	1		57.5	N	
1	4/14/91	1	1		59.4	Y	J 890523512-20
1	4/14/91	2	1		57.3	N	
1	4/14/91	3	1		58.1	N	
1	4/14/91	4	1		58	N	
1	4/14/91	5	1		58	N	
1	4/14/91	6	1		58	N	
1	4/14/91	7	1		58	N	
1	4/14/91	8	1		58.1	N	
1	4/14/91	9	1		58.1	N	
1	4/14/91	10	1		58.1	N	
1	4/14/91	11	1		58.1	N	
1	4/14/91	12	1		57.4	N	
1	4/20/91	1	1		58.6	Y	J 890523512-20
1	4/20/91	2	1		54.7	N	
1	4/20/91	3	1		57.5	N	
1	4/20/91	4	1		57.5	N	
1	4/20/91	5	1		57.5	N	
1	4/20/91	6	1		57.5	N	
1	4/20/91	7	1		57.5	N	
1	4/20/91	8	1		57.5	N	
1	4/20/91	9	1		57.4	N	
1	4/20/91	10	1		57.5	N	
1	4/20/91	11	1		57.4	N	
1	4/20/91	12	1		56.9	N	
1	4/28/91	1	1		60	Y	J 890523512-20
1	4/28/91	2	1		56.8	N	
1	4/28/91	3	1		59.1	N	
1	4/28/91	4	1		59	N	
1	4/28/91	5	1		59	N	
1	4/28/91	6	1		58.9	N	
1	4/28/91	7	1		58.9	N	
1	4/28/91	8	1		58.9	N	
1	4/28/91	9	1		58.9	N	
1	4/28/91	10	1		58.9	N	
1	4/28/91	11	1		58.9	N	
1	4/28/91	12	1		58.5	N	
1	5/5/91	1	1		59.4	Y	J 890523512-20
1	5/5/91	2	1		56.4	N	
1	5/5/91	3	1		58.7	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/5/91	4	1		58.6	N	
1	5/5/91	5	1		58.6	N	
1	5/5/91	6	1		58.6	N	
1	5/5/91	7	1		58.5	N	
1	5/5/91	8	1		58.5	N	
1	5/5/91	9	1		58.6	N	
1	5/5/91	10	1		58.6	N	
1	5/5/91	11	1		58.6	N	
1	5/5/91	12	1		58.3	N	
1	5/12/91	1	1		59.3	Y	J 890523512-20
1	5/12/91	3	1		58	N	
1	5/12/91	4	1		58	N	
1	5/12/91	5	1		57.9	N	
1	5/12/91	6	1		57.9	N	
1	5/12/91	7	1		57.9	N	
1	5/12/91	8	1		57.9	N	
1	5/12/91	9	1		58.1	N	
1	5/12/91	10	1		58.2	N	
1	5/12/91	11	1		58.4	N	
1	5/12/91	12	1		58.1	N	
1	5/18/91	1	1		60.6	Y	J Kiethley 872 2E-OP-020 TC #2 Bad Data
1	5/18/91	3	1		59.6	N	
1	5/18/91	4	1		59.5	N	
1	5/18/91	5	1		59.5	N	
1	5/18/91	6	1		59.5	N	
1	5/18/91	7	1		59.5	N	
1	5/18/91	8	1		59.6	N	
1	5/18/91	9	1		59.7	N	
1	5/18/91	10	1		59.8	N	
1	5/18/91	11	1		59.9	N	
1	5/18/91	12	1		59.8	N	
1	5/26/91	1	1		59.7	Y	J 910126143-42
1	5/26/91	2	1		58.9	N	
1	5/26/91	3	1		58.5	N	
1	5/26/91	4	1		58.2	N	
1	5/26/91	5	1		58	N	
1	5/26/91	6	1		58	N	
1	5/26/91	7	1		58.1	N	
1	5/26/91	8	1		58.4	N	
1	5/26/91	9	1		58.6	N	
1	5/26/91	10	1		59	N	
1	5/26/91	11	1		59.4	N	
1	5/26/91	12	1		59.4	N	
1	6/2/91	1	1		59	Y	J 890423320-42
1	6/2/91	2	1		54.9	N	
1	6/2/91	3	1		57.7	N	
1	6/2/91	4	1		57.6	N	
1	6/2/91	5	1		57.7	N	
1	6/2/91	6	1		57.9	N	
1	6/2/91	7	1		57.9	N	
1	6/2/91	8	1		58.2	N	
1	6/2/91	9	1		58.4	N	
1	6/2/91	10	1		58.7	N	
1	6/2/91	11	1		59	N	
1	6/2/91	12	1		58.9	N	
1	6/9/91	1	1		60.3	Y	J
1	6/9/91	2	1		59.3	N	
1	6/9/91	3	1		59.3	N	
1	6/9/91	4	1		59.1	N	
1	6/9/91	5	1		58.8	N	
1	6/9/91	6	1		58.7	N	
1	6/9/91	7	1		58.7	N	
1	6/9/91	8	1		58.9	N	
1	6/9/91	9	1		59.1	N	
1	6/9/91	10	1		59.4	N	
1	6/9/91	11	1		59.1	N	
1	6/9/91	12	1		59.1	N	
1	6/15/91	1	1		61.1	Y	J 2E-OP-021

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/15/91	3	1		60.6	N	
1	6/15/91	4	1		60.5	N	
1	6/15/91	5	1		60.4	N	
1	6/15/91	6	1		60.4	N	
1	6/15/91	7	1		60.4	N	
1	6/15/91	8	1		60.4	N	
1	6/15/91	9	1		60.5	N	
1	6/15/91	10	1		60.7	N	
1	6/15/91	11	1		60.8	N	
1	6/15/91	12	1		60.5	N	
1	6/23/91	1	1		60	Y	J 2E-OP-021
1	6/23/91	3	1		59	N	
1	6/23/91	4	1		59	N	
1	6/23/91	5	1		59	N	
1	6/23/91	6	1		59	N	
1	6/23/91	7	1		59	N	
1	6/23/91	8	1		59	N	
1	6/23/91	9	1		60	N	
1	6/23/91	10	1		60	N	
1	6/23/91	11	1		60	N	
1	6/23/91	12	1		60	N	
1	6/29/91	1	1		60.2	N	J 890423320-42
1	6/29/91	2	1		55.1	N	
1	6/29/91	3	1		60	N	
1	6/29/91	4	1		60	N	
1	6/29/91	5	1		60	N	
1	6/29/91	6	1		60	N	
1	6/29/91	7	1		60.1	N	
1	6/29/91	8	1		60.1	N	
1	6/29/91	9	1		60.1	N	
1	6/29/91	10	1		60.2	N	
1	6/29/91	11	1		60.3	N	
1	6/29/91	12	1		60.5	Y	
1	7/6/91	1	1		61.3	N	J 910126143-42
1	7/6/91	2	1		60.8	N	
1	7/6/91	3	1		60.4	N	
1	7/6/91	4	1		60.1	N	
1	7/6/91	5	1		59.8	N	
1	7/6/91	6	1		59.8	N	
1	7/6/91	7	1		59.9	N	
1	7/6/91	8	1		60	N	
1	7/6/91	9	1		60.3	N	
1	7/6/91	10	1		60.8	N	
1	7/6/91	11	1		61.2	N	
1	7/6/91	12	1		61.5	Y	
1	7/14/91	1	1		62	Y	J 910126143-12
1	7/14/91	2	1		62	N	
1	7/14/91	3	1		61	N	
1	7/14/91	4	1		61	N	
1	7/14/91	5	1		60	N	
1	7/14/91	6	1		61	N	
1	7/14/91	7	1		61	N	
1	7/14/91	8	1		61	N	
1	7/14/91	9	1		61	N	
1	7/14/91	10	1		62	N	
1	7/14/91	11	1		62	N	
1	7/14/91	12	1		62	N	
1	7/20/91	1	1		61.1	N	J 910126143-64
1	7/20/91	2	1		60.9	N	
1	7/20/91	3	1		60.6	N	
1	7/20/91	4	1		60.3	N	
1	7/20/91	5	1		60.1	N	
1	7/20/91	6	1		60.2	N	
1	7/20/91	7	1		60.3	N	
1	7/20/91	8	1		60.6	N	
1	7/20/91	9	1		60.8	N	
1	7/20/91	10	1		61.3	N	
1	7/20/91	11	1		61.7	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/20/91	12	1		62	Y	
1	7/28/91	1	1		61.2	N	J 910126143-14
1	7/28/91	2	1		61.3	N	
1	7/28/91	3	1		60.9	N	
1	7/28/91	4	1		60.7	N	
1	7/28/91	5	1		60.5	N	
1	7/28/91	6	1		60.6	N	
1	7/28/91	7	1		60.7	N	
1	7/28/91	8	1		61.1	N	
1	7/28/91	9	1		61.4	N	
1	7/28/91	10	1		61.8	N	
1	7/28/91	11	1		62.1	N	
1	7/28/91	12	1		62.4	Y	
1	8/3/91	1	1		62.5	N	J 910126143-14
1	8/3/91	2	1		62.5	N	
1	8/3/91	3	1		62.5	N	
1	8/3/91	4	1		62.5	N	
1	8/3/91	5	1		62.5	N	
1	8/3/91	6	1		62.6	Y	
1	8/3/91	7	1		62.6	N	
1	8/3/91	8	1		62.6	N	
1	8/3/91	9	1		62.6	N	
1	8/3/91	10	1		62.6	N	
1	8/3/91	11	1		62.6	N	
1	8/3/91	12	1		62.6	N	
1	8/11/91	1	1		62.2	N	J 910126143-14
1	8/11/91	2	1		62.6	N	
1	8/11/91	3	1		62.4	N	
1	8/11/91	4	1		62.4	N	
1	8/11/91	5	1		62.4	N	
1	8/11/91	6	1		62.5	N	
1	8/11/91	7	1		62.5	N	
1	8/11/91	8	1		62.7	N	
1	8/11/91	9	1		62.8	N	
1	8/11/91	10	1		63.2	N	
1	8/11/91	11	1		63.5	N	
1	8/11/91	12	1		64	Y	
1	8/17/91	1	1		62.4	N	J 910126143-14
1	8/17/91	2	1		62.9	N	
1	8/17/91	3	1		62.8	N	
1	8/17/91	4	1		62.7	N	
1	8/17/91	5	1		62.7	N	
1	8/17/91	6	1		62.8	N	
1	8/17/91	7	1		62.8	N	
1	8/17/91	8	1		63	N	
1	8/17/91	9	1		63.1	N	
1	8/17/91	10	1		63.2	N	
1	8/17/91	11	1		63.3	N	
1	8/17/91	12	1		63.5	Y	
1	8/24/91	1	1		63.1	N	J 910126143-14
1	8/24/91	2	1		63.6	N	
1	8/24/91	3	1		63.5	N	
1	8/24/91	4	1		63.5	N	
1	8/24/91	5	1		63.5	N	
1	8/24/91	6	1		63.6	N	
1	8/24/91	7	1		63.7	N	
1	8/24/91	8	1		63.9	N	
1	8/24/91	9	1		64	N	
1	8/24/91	10	1		64.2	N	
1	8/24/91	11	1		64.5	N	
1	8/24/91	12	1		65	Y	
1	8/31/91	1	1		63.2	N	J-890423320-42
1	8/31/91	2	1		64.4	N	
1	8/31/91	3	1		64.4	N	
1	8/31/91	4	1		64.4	N	
1	8/31/91	5	1		64.4	N	
1	8/31/91	6	1		64.6	N	
1	8/31/91	7	1		64.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	8/31/91	8	1		64.8	N	
1	8/31/91	9	1		64.9	N	
1	8/31/91	10	1		65	N	
1	8/31/91	11	1		65.2	N	
1	8/31/91	12	1		65.8	Y	
1	9/8/91	1	1		63.2	N	J-890243320-42
1	9/8/91	2	1		64.4	N	
1	9/8/91	3	1		64.4	N	
1	9/8/91	4	1		64.3	N	
1	9/8/91	5	1		64.4	N	
1	9/8/91	6	1		64.6	N	
1	9/8/91	7	1		64.5	N	
1	9/8/91	8	1		64.8	N	
1	9/8/91	9	1		64.9	N	
1	9/8/91	10	1		65	N	
1	9/8/91	11	1		65.2	N	
1	9/8/91	12	1		65.8	Y	
1	9/15/91	1	1		64.6	N	J-910126143-75
1	9/15/91	2	1		65.3	N	
1	9/15/91	3	1		65.4	N	
1	9/15/91	4	1		65.5	N	
1	9/15/91	5	1		65.6	N	
1	9/15/91	6	1		65.6	N	
1	9/15/91	7	1		65.7	Y	
1	9/15/91	8	1		65.7	N	
1	9/15/91	9	1		65.6	N	
1	9/15/91	10	1		65.6	N	
1	9/15/91	11	1		65.7	N	
1	9/15/91	12	1		66.7	N	
1	9/22/91	1	1		64.9	N	J-910126143-75
1	9/22/91	2	1		65.7	N	
1	9/22/91	3	1		65.8	N	
1	9/22/91	4	1		65.9	N	
1	9/22/91	5	1		65.9	N	
1	9/22/91	6	1		66	N	
1	9/22/91	7	1		66.1	N	
1	9/22/91	8	1		66.1	N	
1	9/22/91	9	1		66.1	N	
1	9/22/91	10	1		66.1	N	
1	9/22/91	11	1		66.2	N	
1	9/22/91	12	1		66.7	Y	
1	9/28/91	1	1		65.7	N	J-KEITHLEY 872 #T1-059
1	9/28/91	2	1		67.6	Y	
1	9/28/91	3	1		66.5	N	
1	9/28/91	4	1		66.6	N	
1	9/28/91	5	1		66.7	N	
1	9/28/91	6	1		66.8	N	
1	9/28/91	7	1		66.9	N	
1	9/28/91	8	1		66.9	N	
1	9/28/91	9	1		66.9	N	
1	9/28/91	10	1		66.9	N	
1	9/28/91	11	1		67	N	
1	9/28/91	12	1		67.7	N	
1	10/5/91	1	1		65.3	N	J-910128143-42
1	10/5/91	2	1		66	N	
1	10/5/91	3	1		66.2	N	
1	10/5/91	4	1		66.3	N	
1	10/5/91	5	1		66.4	N	
1	10/5/91	6	1		66.5	N	
1	10/5/91	7	1		66.5	N	
1	10/5/91	8	1		66.6	N	
1	10/5/91	9	1		66.6	N	
1	10/5/91	10	1		66.6	N	
1	10/5/91	11	1		66.7	N	
1	10/5/91	12	1		67.1	Y	
1	10/15/91	1	1		66	N	J-HH-99A-J
1	10/15/91	2	1		66	N	
1	10/15/91	3	1		66.1	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/15/91	4	1		66.3	N	
1	10/15/91	5	1		66.3	N	
1	10/15/91	6	1		67	Y	
1	10/15/91	7	1		67	N	
1	10/15/91	8	1		66.7	N	
1	10/15/91	9	1		66.7	N	
1	10/15/91	10	1		66.7	N	
1	10/15/91	12	1		67.2	N	
1	10/19/91	1	1		65.1	N	J-910126143-75
1	10/19/91	2	1		65.7	N	
1	10/19/91	3	1		65.7	N	
1	10/19/91	4	1		65.8	N	
1	10/19/91	5	1		65.8	N	
1	10/19/91	6	1		65.9	N	
1	10/19/91	7	1		66	N	
1	10/19/91	8	1		66	N	
1	10/19/91	9	1		66	N	
1	10/19/91	10	1		66	N	
1	10/19/91	11	1		66	N	
1	10/19/91	12	1		66.2	Y	
1	10/27/91	1	1		66.9	N	J-910126143-42
1	10/27/91	2	1		67.7	N	
1	10/27/91	3	1		67.6	N	
1	10/27/91	4	1		67.6	N	
1	10/27/91	5	1		67.6	N	
1	10/27/91	6	1		67.6	N	
1	10/27/91	7	1		67.6	N	
1	10/27/91	8	1		67.6	N	
1	10/27/91	9	1		67.6	N	
1	10/27/91	10	1		67.6	N	
1	10/27/91	11	1		67.6	N	
1	10/27/91	12	1		68.1	Y	
1	11/3/91	1	1		65.4	N	J-910126143-75
1	11/3/91	2	1		65.9	N	
1	11/3/91	3	1		66	N	
1	11/3/91	4	1		66	N	
1	11/3/91	5	1		66.1	N	
1	11/3/91	6	1		66.2	N	
1	11/3/91	7	1		66.2	N	
1	11/3/91	8	1		66.3	N	
1	11/3/91	9	1		66.3	N	
1	11/3/91	10	1		66.3	N	
1	11/3/91	11	1		66.4	N	
1	11/3/91	12	1		66.5	Y	
1	11/12/91	1	1		64.9	N	J-910126143-75
1	11/12/91	2	1		64.8	N	
1	11/12/91	3	1		65	N	
1	11/12/91	4	1		65	N	
1	11/12/91	5	1		65.1	N	
1	11/12/91	6	1		65.1	N	
1	11/12/91	7	1		65.2	N	
1	11/12/91	8	1		65.2	N	
1	11/12/91	9	1		65.2	N	
1	11/12/91	10	1		65.2	N	
1	11/12/91	11	1		65.2	N	
1	11/12/91	12	1		65.4	Y	
1	11/12/91	1	2		65	Y	J-TI023
1	11/12/91	2	2		65	N	
1	11/12/91	3	2		65	N	
1	11/12/91	4	2		65	N	
1	11/12/91	5	2		65	N	
1	11/12/91	6	2		65	N	
1	11/12/91	7	2		65	N	
1	11/12/91	8	2		65	N	
1	11/12/91	9	2		65	N	
1	11/12/91	10	2		65	N	
1	11/12/91	11	2		65	N	
1	11/12/91	12	2		65	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	11/16/91	1	1		63.4	N	J-890523512-47
1	11/16/91	2	1		61.5	N	
1	11/16/91	3	1		64.3	N	
1	11/16/91	4	1		64.4	N	
1	11/16/91	5	1		64.4	N	
1	11/16/91	6	1		64.4	N	
1	11/16/91	7	1		64.5	N	
1	11/16/91	8	1		64.5	N	
1	11/16/91	9	1		64.6	Y	
1	11/16/91	10	1		64.6	N	
1	11/16/91	11	1		64.6	N	
1	11/16/91	12	1		64.3	N	
1	11/24/91	1	1		66.1	Y	J-910126143-42
1	11/24/91	2	1		61.2	N	
1	11/24/91	3	1		65.7	N	
1	11/24/91	4	1		65.7	N	
1	11/24/91	5	1		65.7	N	
1	11/24/91	6	1		65.8	N	
1	11/24/91	7	1		65.8	N	
1	11/24/91	8	1		65.8	N	
1	11/24/91	9	1		65.8	N	
1	11/24/91	10	1		65.8	N	
1	11/24/91	11	1		65.8	N	
1	11/24/91	12	1		65.7	N	
1	12/1/91	1	1		64.2	N	J-910126143-42
1	12/1/91	2	1		64.3	N	
1	12/1/91	3	1		63.7	N	
1	12/1/91	4	1		63.6	N	
1	12/1/91	5	1		65.4	Y	
1	12/1/91	6	1		63.7	N	
1	12/1/91	7	1		63.7	N	
1	12/1/91	8	1		63.7	N	
1	12/1/91	9	1		63.7	N	
1	12/1/91	10	1		63.7	N	
1	12/1/91	11	1		63.7	N	
1	12/1/91	12	1		62.8	N	
1	12/7/91	1	1		64.5	Y	J-910126143-48
1	12/7/91	2	1		64.5	N	
1	12/7/91	3	1		64.2	N	
1	12/7/91	4	1		64.2	N	
1	12/7/91	5	1		64.2	N	
1	12/7/91	6	1		64.2	N	
1	12/7/91	7	1		64.2	N	
1	12/7/91	8	1		64.2	N	
1	12/7/91	9	1		64.2	N	
1	12/7/91	10	1		64.2	N	
1	12/7/91	11	1		63.8	N	
1	12/7/91	12	1		62.5	N	
1	12/14/91	1	1		64.4	Y	J-910126143-29
1	12/14/91	2	1		63.8	N	
1	12/14/91	3	1		63.9	N	
1	12/14/91	4	1		63.9	N	
1	12/14/91	5	1		64	N	
1	12/14/91	6	1		64	N	
1	12/14/91	7	1		64	N	
1	12/14/91	8	1		64	N	
1	12/14/91	9	1		63.9	N	
1	12/14/91	10	1		63.9	N	
1	12/14/91	11	1		63.9	N	
1	12/14/91	12	1		63.3	N	
1	12/21/91	1	1		62.4	Y	J-910126143-14 TC #2 BAD DATA
1	12/21/91	3	1		61.7	N	
1	12/21/91	4	1		61.8	N	
1	12/21/91	5	1		61.8	N	
1	12/21/91	6	1		61.8	N	
1	12/21/91	7	1		61.8	N	
1	12/21/91	8	1		61.8	N	
1	12/21/91	9	1		61.8	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	12/21/91	10	1		61.8	N	
1	12/21/91	11	1		61.4	N	
1	12/21/91	12	1		59.8	N	
1	12/29/91	1	1		62.6	Y	J-910126143-29 TC #2 BAD DATA
1	12/29/91	3	1		62	N	
1	12/29/91	4	1		62	N	
1	12/29/91	5	1		62	N	
1	12/29/91	6	1		62.1	N	
1	12/29/91	7	1		62.1	N	
1	12/29/91	8	1		62.1	N	
1	12/29/91	9	1		62.1	N	
1	12/29/91	10	1		62.1	N	
1	12/29/91	11	1		61.7	N	
1	12/29/91	12	1		60	N	
1	1/4/92	1	1		61.7	Y	J-910126143-50
1	1/4/92	2	1		57.9	N	
1	1/4/92	3	1		60.6	N	
1	1/4/92	4	1		60.6	N	
1	1/4/92	5	1		60.6	N	
1	1/4/92	6	1		60.6	N	
1	1/4/92	7	1		60.7	N	
1	1/4/92	8	1		60.7	N	
1	1/4/92	9	1		60.6	N	
1	1/4/92	10	1		60.7	N	
1	1/4/92	11	1		60.3	N	
1	1/11/92	1	1		61.3	Y	J 910126143-14
1	1/11/92	2	1		57.5	N	
1	1/11/92	3	1		60.1	N	
1	1/11/92	4	1		60.1	N	
1	1/11/92	5	1		60.1	N	
1	1/11/92	6	1		60.1	N	
1	1/11/92	7	1		60.2	N	
1	1/11/92	8	1		60.1	N	
1	1/11/92	9	1		60.1	N	
1	1/11/92	10	1		60.1	N	
1	1/11/92	11	1		59.8	N	
1	1/11/92	12	1		57.7	N	
1	1/16/92	1	1		61.3	Y	J 910126143-32
1	1/16/92	2	1		57	N	
1	1/16/92	3	1		59.6	N	
1	1/16/92	4	1		59.7	N	
1	1/16/92	5	1		59.9	N	
1	1/16/92	6	1		60.1	N	
1	1/16/92	7	1		60.1	N	
1	1/16/92	8	1		60.1	N	
1	1/16/92	9	1		60.1	N	
1	1/16/92	10	1		60.3	N	
1	1/16/92	11	1		59.7	N	
1	1/16/92	12	1		58.1	N	
1	1/26/92	1	1		60.6	Y	J-919126143-14
1	1/26/92	2	1		59.3	N	
1	1/26/92	3	1		59.5	N	
1	1/26/92	4	1		59.4	N	
1	1/26/92	5	1		59.4	N	
1	1/26/92	6	1		59.4	N	
1	1/26/92	7	1		59.4	N	
1	1/26/92	8	1		59.4	N	
1	1/26/92	9	1		59.4	N	
1	1/26/92	10	1		59.4	N	
1	1/26/92	11	1		59	N	
1	1/26/92	12	1		57	N	
1	1/28/92	1	1			N	ACCESS RESTRICTED 1/28 - 2/22 DUE TO BATTERY FUME INCIDENT
1	2/24/92	1	1		60.8	Y	
1	2/24/92	2	1		59.8	N	
1	2/24/92	3	1		59.8	N	
1	2/24/92	4	1		59.8	N	
1	2/24/92	5	1		59.8	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	2/24/92	6	1		59.7	N	
1	2/24/92	7	1		59.6	N	
1	2/24/92	8	1		59.6	N	
1	2/24/92	9	1		59.6	N	
1	2/24/92	10	1		59.6	N	
1	2/24/92	11	1		59.3	N	
1	2/24/92	12	1		57.6	N	
1	2/29/92	1	1		60	Y	J+I-038/91012614332
1	2/29/92	2	1		56.8	N	
1	2/29/92	3	1		58.7	N	
1	2/29/92	4	1		58.7	N	
1	2/29/92	5	1		58.7	N	
1	2/29/92	6	1		58.7	N	
1	2/29/92	7	1		58.6	N	
1	2/29/92	8	1		58.6	N	
1	2/29/92	9	1		58.6	N	
1	2/29/92	10	1		58.6	N	
1	2/29/92	11	1		58.4	N	
1	2/29/92	12	1		56.9	N	
1	3/6/92	34	1			N	198.6 - suspect data (high), wrong TC#
1	3/7/92	1	1		59.3	Y	K 910476539-80
1	3/7/92	2	1		58.2	N	
1	3/7/92	3	1		58.2	N	
1	3/7/92	4	1		58.3	N	
1	3/7/92	5	1		58.3	N	
1	3/7/92	6	1		58.2	N	
1	3/7/92	7	1		58.2	N	
1	3/7/92	8	1		58.2	N	
1	3/7/92	9	1		58.1	N	
1	3/7/92	10	1		58.1	N	
1	3/7/92	11	1		57.9	N	
1	3/7/92	12	1		56.5	N	
1	3/14/92	1	1		58.8	Y	J 910126143-32
1	3/14/92	2	1		57.8	N	
1	3/14/92	3	1		57.7	N	
1	3/14/92	4	1		57.7	N	
1	3/14/92	5	1		57.7	N	
1	3/14/92	6	1		57.7	N	
1	3/14/92	7	1		57.7	N	
1	3/14/92	8	1		57.6	N	
1	3/14/92	9	1		57.6	N	
1	3/14/92	10	1		57.6	N	
1	3/14/92	11	1		57.5	N	
1	3/14/92	12	1		56.5	N	
1	3/21/92	1	1		59.3	Y	J 910126143-48
1	3/21/92	2	1		58.7	N	
1	3/21/92	3	1		58.2	N	
1	3/21/92	4	1		58.2	N	
1	3/21/92	5	1		58.2	N	
1	3/21/92	6	1		58.2	N	
1	3/21/92	7	1		58.2	N	
1	3/21/92	8	1		58.1	N	
1	3/21/92	9	1		58	N	
1	3/21/92	10	1		58	N	
1	3/21/92	11	1		57.9	N	
1	3/21/92	12	1		57.1	N	
1	3/27/92	1	1		59.7	Y	J 910126143-66
1	3/27/92	2	1		58.9	N	
1	3/27/92	3	1		58.8	N	
1	3/27/92	4	1		58.8	N	
1	3/27/92	5	1		58.8	N	
1	3/27/92	6	1		58.8	N	
1	3/27/92	7	1		58.7	N	
1	3/27/92	8	1		58.7	N	
1	3/27/92	9	1		58.6	N	
1	3/27/92	10	1		58.6	N	
1	3/27/92	11	1		58.4	N	
1	3/27/92	12	1		57.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/5/92	1	1		58.6	Y	J 910126143-14
1	4/5/92.	2	1		57.8	N	
1	4/5/92	3	1		57.8	N	
1	4/5/92	4	1		57.8	N	
1	4/5/92	5	1		57.8	N	
1	4/5/92	6	1		57.8	N	
1	4/5/92	7	1		57.8	N	
1	4/5/92	8	1		57.8	N	
1	4/5/92	9	1		57.8	N	
1	4/5/92	10	1		57.7	N	
1	4/5/92	11	1		57.7	N	
1	4/5/92	12	1		57.1	N	
1	4/11/92	1	1		59.4	N	J 910126143-64
1	4/11/92	2	1		57.2	N	
1	4/11/92	3	1		58.5	N	
1	4/11/92	4	1		58.5	N	
1	4/11/92	5	1		58.5	N	
1	4/11/92	6	1		58.5	N	
1	4/11/92	7	1		58.5	N	
1	4/11/92	8	1		58.5	N	
1	4/11/92	9	1		58.4	N	
1	4/11/92	10	1		58.5	N	
1	4/11/92	11	1		58.4	N	
1	4/11/92	12	1		58	N	
1	4/17/92	1	1		59.6	Y	J 0126143 64
1	4/17/92	2	1		58.9	N	
1	4/17/92	3	1		58.7	N	
1	4/17/92	4	1		58.6	N	
1	4/17/92	5	1		58.6	N	
1	4/17/92	6	1		58.6	N	
1	4/17/92	7	1		58.6	N	
1	4/17/92	8	1		58.7	N	
1	4/17/92	9	1		58.7	N	
1	4/17/92	10	1		58.7	N	
1	4/17/92	11	1		58.7	N	
1	4/17/92	12	1		58.3	N	
1	4/25/92	1	1		60.2	Y	J 89052351220
1	4/25/92	2	1		59.5	N	
1	4/25/92	3	1		59.2	N	
1	4/25/92	4	1		59.1	N	
1	4/25/92	5	1		59.1	N	
1	4/25/92	6	1		59	N	
1	4/25/92	7	1		59.1	N	
1	4/25/92	8	1		59.2	N	
1	4/25/92	9	1		59.3	N	
1	4/25/92	10	1		59.3	N	
1	4/25/92	11	1		59.6	N	
1	4/25/92	12	1		59.3	N	
1	5/1/92	1	1		57.1	Y	J 890523512-47
1	5/1/92	2	1		56.1	N	
1	5/1/92	3	1		56	N	
1	5/1/92	4	1		55.9	N	
1	5/1/92	5	1		55.8	N	
1	5/1/92	6	1		55.8	N	
1	5/1/92	7	1		55.8	N	
1	5/1/92	8	1		56	N	
1	5/1/92	9	1		56.1	N	
1	5/1/92	10	1		56.3	N	
1	5/1/92	11	1		56.5	N	
1	5/1/92	12	1		56.4	N	
1	5/8/92	1	1		59.7	Y	J 910126143-48
1	5/8/92	2	1		59.1	N	
1	5/8/92	3	1		59.2	N	
1	5/8/92	4	1		59.2	N	
1	5/8/92	5	1		59.1	N	
1	5/8/92	6	1		59.1	N	
1	5/8/92	7	1		59.1	N	
1	5/8/92	8	1		59.1	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/8/92	9	1		59	N	
1	5/8/92	10	1		59	N	
1	5/8/92	11	1		59	N	
1	5/8/92	12	1		58.7	N	
1	5/16/92	1	1		59.5	Y	J 910126143-32
1	5/16/92	2	1		58.7	N	
1	5/16/92	3	1		58.5	N	
1	5/16/92	4	1		58.3	N	
1	5/16/92	5	1		58.1	N	
1	5/16/92	6	1		58.1	N	
1	5/16/92	7	1		58.2	N	
1	5/16/92	8	1		58.4	N	
1	5/16/92	9	1		58.6	N	
1	5/16/92	10	1		58.9	N	
1	5/16/92	11	1		59.2	N	
1	5/16/92	12	1		59.3	N	
1	5/20/92	1	1		57.8	N	J 890523512-47
1	5/20/92	2	1		57.1	N	
1	5/20/92	3	1		57	N	
1	5/20/92	4	1		56.9	N	
1	5/20/92	5	1		57	N	
1	5/20/92	6	1		57.1	N	
1	5/20/92	7	1		57.3	N	
1	5/20/92	8	1		57.6	N	
1	5/20/92	9	1		57.7	N	
1	5/20/92	10	1		58	N	
1	5/20/92	11	1		58.1	Y	
1	5/30/92	1	1		57.7	N	J 890523512-47
1	5/30/92	2	1		57	N	
1	5/30/92	3	1		56.9	N	
1	5/30/92	4	1		56.8	N	
1	5/30/92	5	1		56.8	N	
1	5/30/92	6	1		57.1	N	
1	5/30/92	7	1		57.1	N	
1	5/30/92	8	1		57.3	N	
1	5/30/92	9	1		57.4	N	
1	5/30/92	10	1		57.6	N	
1	5/30/92	11	1		57.9	N	
1	5/30/92	12	1		58.1	Y	
1	6/5/92	1	1		59.2	N	J 910126143-50
1	6/5/92	2	1		58.6	N	
1	6/5/92	3	1		58.3	N	
1	6/5/92	4	1		58.1	N	
1	6/5/92	5	1		57.9	N	
1	6/5/92	6	1		58	N	
1	6/5/92	7	1		58.1	N	
1	6/5/92	8	1		58.5	N	
1	6/5/92	9	1		58.7	N	
1	6/5/92	10	1		59.2	N	
1	6/5/92	11	1		59.8	N	
1	6/5/92	12	1		60	Y	
1	6/14/92	1	1		59.7	N	J 890523512-47
1	6/14/92	2	1		59.4	N	
1	6/14/92	3	1		59.4	N	
1	6/14/92	4	1		59.2	N	
1	6/14/92	5	1		59.1	N	
1	6/14/92	6	1		59.1	N	
1	6/14/92	7	1		59.2	N	
1	6/14/92	8	1		59.4	N	
1	6/14/92	9	1		59.6	N	
1	6/14/92	10	1		59.8	N	
1	6/14/92	11	1		59.9	Y	
1	6/14/92	12	1		59.9	N	
1	6/20/92	1	1		60.7	N	J 910126143-48
1	6/20/92	2	1		60.5	N	
1	6/20/92	3	1		60.2	N	
1	6/20/92	4	1		60.1	N	
1	6/20/92	5	1		60	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/20/92	6	1		60	N	
1	6/20/92	7	1		60.2	N	
1	6/20/92	8	1		60.6	N	
1	6/20/92	9	1		60.9	N	
1	6/20/92	10	1		61.2	N	
1	6/20/92	11	1		61.5	N	
1	6/20/92	12	1		62	N	
1	6/28/92	1	1		62.9	Y	J TI-042 9101261466
1	6/28/92	2	1		61.9	N	
1	6/28/92	3	1		61.9	N	
1	6/28/92	4	1		61.7	N	
1	6/28/92	5	1		61.6	N	
1	6/28/92	6	1		61.7	N	
1	6/28/92	7	1		61.7	N	
1	6/28/92	8	1		61.9	N	
1	6/28/92	9	1		62	N	
1	6/28/92	10	1		62.2	N	
1	6/28/92	11	1		62.4	N	
1	6/28/92	12	1		62.4	N	
1	6/28/92	13	1		62.7	N	
1	7/2/92	1	1		60.1	N	J TI-041
1	7/2/92	2	1		59.9	N	
1	7/2/92	3	1		59.7	N	
1	7/2/92	4	1		59.6	N	
1	7/2/92	5	1		59.5	N	
1	7/2/92	6	1		59.9	N	
1	7/2/92	7	1		60	N	
1	7/2/92	8	1		60.4	N	
1	7/2/92	9	1		60.7	N	
1	7/2/92	10	1		61.2	N	
1	7/2/92	11	1		61.6	N	
1	7/10/92	1	1		61.8	Y	J 910126143-42
1	7/10/92	2	1		61.8	N	
1	7/10/92	3	1		61.8	N	
1	7/10/92	4	1		61.7	N	
1	7/10/92	5	1		61.7	N	
1	7/10/92	6	1		61.8	N	
1	7/10/92	7	1		61.7	N	
1	7/10/92	8	1		61.7	N	
1	7/10/92	9	1		61.8	N	
1	7/10/92	10	1		61.7	N	
1	7/10/92	11	1		61.7	N	
1	7/10/92	12	1		61.7	N	
1	7/18/92	1	1		62	N	J 910126143-42
1	7/18/92	2	1		62.2	N	
1	7/18/92	3	1		62.1	N	
1	7/18/92	4	1		62	N	
1	7/18/92	5	1		61.9	N	
1	7/18/92	6	1		61.9	N	
1	7/18/92	7	1		62	N	
1	7/18/92	8	1		62.2	N	
1	7/18/92	9	1		62.3	N	
1	7/18/92	10	1		62.7	N	
1	7/18/92	11	1		62.9	N	
1	7/18/92	12	1		63.4	Y	
1	7/25/92	1	1		63.2	N	J 910126143-29
1	7/25/92	2	1		63.3	N	
1	7/25/92	3	1		63.1	N	
1	7/25/92	4	1		63.1	N	
1	7/25/92	5	1		62.9	N	
1	7/25/92	6	1		62.9	N	
1	7/25/92	7	1		63.1	N	
1	7/25/92	8	1		63.4	N	
1	7/25/92	9	1		63.7	N	
1	7/25/92	10	1		64.2	N	
1	7/25/92	11	1		64.6	N	
1	7/25/92	12	1		65.1	Y	
1	8/1/92	1	1		62.6	N	J TI-04

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	8/1/92	2	1		62.8	N	
1	8/1/92	3	1		62.6	N	
1	8/1/92	4	1		62.6	N	
1	8/1/92	5	1		62.6	N	
1	8/1/92	6	1		62.8	N	
1	8/1/92	7	1		62.9	N	
1	8/1/92	8	1		63.2	N	
1	8/1/92	9	1		63.5	N	
1	8/1/92	10	1		63.9	N	
1	8/1/92	11	1		64.4	N	
1	8/1/92	12	1		65.2	Y	
1	8/6/92	1	1		62.6	N	J 890423320-42
1	8/6/92	2	1		63.2	N	
1	8/6/92	3	1		63.2	N	
1	8/6/92	4	1		63.2	N	
1	8/6/92	5	1		63.2	N	
1	8/6/92	6	1		63.2	N	
1	8/6/92	7	1		63.4	N	
1	8/6/92	8	1		63.5	N	
1	8/6/92	9	1		63.6	N	
1	8/6/92	10	1		63.7	N	
1	8/6/92	11	1		63.8	N	
1	8/6/92	12	1		64.3	Y	
1	8/16/92	1	1		62.9	N	J 890423320
1	8/16/92	2	1		63.1	N	
1	8/16/92	3	1		63.1	N	
1	8/16/92	4	1		63.2	N	
1	8/16/92	5	1		63.2	N	
1	8/16/92	6	1		63.5	N	
1	8/16/92	7	1		63.7	N	
1	8/16/92	8	1		64.1	N	
1	8/16/92	9	1		64.3	N	
1	8/16/92	10	1		64.5	N	
1	8/16/92	11	1		64.9	N	
1	8/16/92	12	1		65.8	Y	
1	8/20/92	1	1		63.7	N	J 910126143-42
1	8/20/92	2	1		64.2	N	
1	8/20/92	3	1		64.2	N	
1	8/20/92	4	1		64.3	N	
1	8/20/92	5	1		64.3	N	
1	8/20/92	6	1		64.6	N	
1	8/20/92	7	1		64.7	N	
1	8/20/92	8	1		64.9	N	
1	8/20/92	9	1		65	N	
1	8/20/92	10	1		65.3	N	
1	8/20/92	11	1		65.6	N	
1	8/20/92	12	1		66.4	Y	
1	8/30/92	1	1		62	N	J 890423320-42
1	8/30/92	2	1		62.1	N	
1	8/30/92	3	1		62	N	
1	8/30/92	4	1		62	N	
1	8/30/92	5	1		61.8	N	
1	8/30/92	6	1		61.9	N	
1	8/30/92	7	1		62	N	
1	8/30/92	8	1		62.2	N	
1	8/30/92	9	1		62.2	N	
1	8/30/92	10	1		62.5	N	
1	8/30/92	11	1		62.7	N	
1	8/30/92	12	1		63	Y	
1	9/6/92	1	1		66.3	N	J TI-022
1	9/6/92	2	1		67.2	N	
1	9/6/92	3	1		67.4	N	
1	9/6/92	4	1		67.4	N	
1	9/6/92	5	1		67.5	N	
1	9/6/92	6	1		67.5	N	
1	9/6/92	7	1		67.6	N	
1	9/6/92	8	1		67.6	N	
1	9/6/92	9	1		67.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/6/92	10	1		67.7	N	
1	9/6/92	11	1		67.9	N	
1	9/6/92	12	1		68.6	Y	
1	9/14/92	1	1		66.2	N	J 910126143-64
1	9/14/92	2	1		67	N	
1	9/14/92	3	1		66.9	N	
1	9/14/92	4	1		66.8	N	
1	9/14/92	5	1		66.9	N	
1	9/14/92	6	1		67	N	
1	9/14/92	7	1		67.1	N	
1	9/14/92	8	1		67.2	N	
1	9/14/92	9	1		67.3	N	
1	9/14/92	10	1		67.5	N	
1	9/14/92	11	1		67.6	N	
1	9/14/92	12	1		68	Y	
1	9/20/92	1	1		66.1	N	J 910126143-64
1	9/20/92	2	1		66.7	N	
1	9/20/92	3	1		66.8	N	
1	9/20/92	4	1		66.8	N	
1	9/20/92	5	1		66.9	N	
1	9/20/92	6	1		67.1	N	
1	9/20/92	7	1		67	N	
1	9/20/92	8	1		67.2	N	
1	9/20/92	9	1		67.2	N	
1	9/20/92	10	1		67.3	N	
1	9/20/92	11	1		67.5	N	
1	9/20/92	12	1		68	N	
1	9/29/92	1	1		65.4	N	j 890423320-42
1	9/29/92	2	1		65.9	N	
1	9/29/92	3	1		66.2	N	
1	9/29/92	4	1		66.2	N	
1	9/29/92	5	1		66.3	N	
1	9/29/92	6	1		66.3	N	
1	9/29/92	7	1		66.1	N	
1	9/29/92	8	1		66.2	N	
1	9/29/92	9	1		66.3	N	
1	9/29/92	10	1		66.3	N	
1	9/29/92	11	1		66.4	N	
1	9/29/92	12	1		66.8	Y	
1	10/1/92	1	1		64.9	N	J 890423320-42
1	10/1/92	2	1		65.4	N	
1	10/1/92	3	1		65.6	N	
1	10/1/92	4	1		65.6	N	
1	10/1/92	5	1		65.8	N	
1	10/1/92	6	1		65.9	N	
1	10/1/92	7	1		65.9	N	
1	10/1/92	8	1		66	N	
1	10/1/92	9	1		65.9	N	
1	10/1/92	10	1		66	N	
1	10/1/92	11	1		66	N	
1	10/1/92	12	1		66.1	Y	
1	10/11/92	1	1		65.9	N	J 910126143-48
1	10/11/92	2	1		66.4	N	
1	10/11/92	3	1		66.4	N	
1	10/11/92	4	1		66.5	N	
1	10/11/92	5	1		66.6	N	
1	10/11/92	6	1		66.6	N	
1	10/11/92	7	1		66.7	N	
1	10/11/92	8	1		66.7	N	
1	10/11/92	9	1		66.7	N	
1	10/11/92	10	1		66.7	N	
1	10/11/92	11	1		66.9	N	
1	10/11/92	12	1		67.6	Y	
1	10/18/92	1	1		66.2	N	J 910125143-40
1	10/18/92	2	1		66.6	N	
1	10/18/92	3	1		66.6	N	
1	10/18/92	4	1		66.8	N	
1	10/18/92	5	1		66.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/18/92	6	1		66.6	N	
1	10/18/92	7	1		66.7	N	
1	10/18/92	8	1		66.7	N	
1	10/18/92	9	1		66.7	N	
1	10/18/92	10	1		66.8	N	
1	10/18/92	11	1		67	N	
1	10/18/92	12	1		67.3	Y	
1	10/23/92	1	1		66.8	N	J 910126143-66
1	10/23/92	2	1		67.3	N	
1	10/23/92	3	1		67.3	N	
1	10/23/92	4	1		67.4	N	
1	10/23/92	5	1		67.5	N	
1	10/23/92	6	1		67.5	N	
1	10/23/92	7	1		67.6	Y	
1	10/23/92	8	1		67.6	N	
1	10/23/92	9	1		67.5	N	
1	10/23/92	10	1		67.6	N	
1	10/23/92	11	1		67.5	N	
1	10/23/92	12	1		67.4	N	
1	10/28/92	1	1		66.6	N	J 91012614366
1	10/28/92	2	1		66.6	N	
1	10/28/92	3	1		67.1	N	
1	10/28/92	4	1		67.1	N	
1	10/28/92	5	1		67.1	N	
1	10/28/92	6	1		67.2	N	
1	10/28/92	7	1		67.3	N	
1	10/28/92	8	1		67.3	N	
1	10/28/92	9	1		67.4	N	
1	10/28/92	10	1		67.5	N	
1	10/28/92	11	1		67.6	N	
1	10/28/92	12	1		67.8	Y	
1	11/7/92	1	1		65.5	N	J 910126143-48
1	11/7/92	2	1		65.9	N	
1	11/7/92	3	1		65.9	N	
1	11/7/92	4	1		66	N	
1	11/7/92	5	1		66	N	
1	11/7/92	6	1		66	N	
1	11/7/92	7	1		66	N	
1	11/7/92	8	1		66.1	Y	
1	11/7/92	9	1		66	N	
1	11/7/92	10	1		66	N	
1	11/7/92	11	1		66.1	N	
1	11/7/92	12	1		66	N	
1	11/15/92	1	1		64.4	N	J 890423320-42
1	11/15/92	2	1		63	N	
1	11/15/92	3	1		64.3	N	
1	11/15/92	4	1		64.4	N	
1	11/15/92	5	1		64.4	N	
1	11/15/92	6	1		64.4	N	
1	11/15/92	7	1		64.4	N	
1	11/15/92	8	1		64.5	Y	
1	11/15/92	9	1		64.5	N	
1	11/15/92	10	1		64.5	N	
1	11/15/92	11	1		64.3	N	
1	11/15/92	12	1		64	N	
1	11/20/92	1	1		65	N	J 910126143-14
1	11/20/92	2	1		65	N	
1	11/20/92	3	1		65.1	Y	
1	11/20/92	4	1		65.1	N	
1	11/20/92	5	1		65	N	
1	11/20/92	6	1		65	N	
1	11/20/92	7	1		65	N	
1	11/20/92	8	1		65	N	
1	11/20/92	9	1		65	N	
1	11/20/92	10	1		65	N	
1	11/20/92	11	1		64.9	N	
1	11/20/92	12	1		64.3	N	
1	11/28/92	1	1		66.2	Y	J 8905235120-2

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	11/28/92	2	1		65.4	N	
1	11/28/92	3	1		66.1	N	
1	11/28/92	4	1		66.1	N	
1	11/28/92	5	1		66.1	N	
1	11/28/92	6	1		66.1	N	
1	11/28/92	7	1		66.1	N	
1	11/28/92	8	1		66.1	N	
1	11/28/92	9	1		66.1	N	
1	11/28/92	10	1		66.1	N	
1	11/28/92	11	1		66	N	
1	11/28/92	12	1		66	N	
1	12/6/92	1	1		62.7	Y	J 890423320-42
1	12/6/92	2	1		62.2	N	
1	12/6/92	3	1		62.3	N	
1	12/6/92	4	1		62.3	N	
1	12/6/92	5	1		62.3	N	
1	12/6/92	6	1		62.3	N	
1	12/6/92	7	1		62.4	N	
1	12/6/92	8	1		62.3	N	
1	12/6/92	9	1		62.3	N	
1	12/6/92	10	1		62.4	N	
1	12/6/92	11	1		62.2	N	
1	12/6/92	12	1		62.1	N	
1	12/12/92	1	1		64.9	Y	J 910126143-40
1	12/12/92	2	1		63.8	N	
1	12/12/92	3	1		64.3	N	
1	12/12/92	4	1		64.3	N	
1	12/12/92	5	1		64.4	N	
1	12/12/92	6	1		64.4	N	
1	12/12/92	7	1		64.4	N	
1	12/12/92	8	1		64.4	N	
1	12/12/92	9	1		64.4	N	
1	12/12/92	10	1		64.3	N	
1	12/12/92	11	1		63.7	N	
1	12/12/92	12	1		61.9	N	
1	12/18/92	1	1		64.1	Y	J 910126143-14
1	12/18/92	2	1		63.3	N	
1	12/18/92	3	1		63.2	N	
1	12/18/92	4	1		63.1	N	
1	12/18/92	5	1		63.2	N	
1	12/18/92	6	1		63.2	N	
1	12/18/92	7	1		63.2	N	
1	12/18/92	8	1		63.2	N	
1	12/18/92	9	1		63.3	N	
1	12/18/92	10	1		63.3	N	
1	12/18/92	11	1		62.8	N	
1	12/18/92	12	1		60.6	N	
1	12/25/92	1	1		65.2	Y	J 890523512-20
1	12/25/92	2	1		62.2	N	
1	12/25/92	3	1		64.3	N	
1	12/25/92	4	1		64.3	N	
1	12/25/92	5	1		64.3	N	
1	12/25/92	6	1		64.4	N	
1	12/25/92	7	1		64.4	N	
1	12/25/92	8	1		64.5	N	
1	12/25/92	9	1		64.4	N	
1	12/25/92	10	1		64.4	N	
1	12/25/92	11	1		64.1	N	
1	12/25/92	12	1		62	N	
1	1/3/93	1	1		60.7	Y	J 890523512-47
1	1/3/93	2	1		59.5	N	
1	1/3/93	3	1		59.6	N	
1	1/3/93	4	1		59.6	N	
1	1/3/93	5	1		59.6	N	
1	1/3/93	6	1		59.6	N	
1	1/3/93	7	1		59.6	N	
1	1/3/93	8	1		59.6	N	
1	1/3/93	9	1		59.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/3/93	10	1		59.5	N	
1	1/3/93	11	1		59.1	N	
1	1/3/93	12	1		56.4	N	
1	1/7/93	1	1		62	Y	J 910126143-14
1	1/7/93	2	1		60.9	N	
1	1/7/93	3	1		60.8	N	
1	1/7/93	4	1		60.8	N	
1	1/7/93	5	1		60.8	N	
1	1/7/93	6	1		60.7	N	
1	1/7/93	7	1		60.7	N	
1	1/7/93	8	1		60.8	N	
1	1/7/93	9	1		60.8	N	
1	1/7/93	10	1		60.7	N	
1	1/7/93	11	1		60.4	N	
1	1/7/93	12	1		57.9	N	
1	1/16/93	1	1		61.9	Y	J 890523512-47
1	1/16/93	2	1		60.2	N	
1	1/16/93	3	1		60.5	N	
1	1/16/93	4	1		60.4	N	
1	1/16/93	5	1		60.4	N	
1	1/16/93	6	1		60.4	N	
1	1/16/93	7	1		60.3	N	
1	1/16/93	8	1		60.3	N	
1	1/16/93	9	1		60.3	N	
1	1/16/93	10	1		60.3	N	
1	1/16/93	11	1		59.6	N	
1	1/16/93	12	1		59.6	N	
1	1/24/93	1	1		63.1	Y	J 890523512-20
1	1/24/93	2	1		61.2	N	
1	1/24/93	3	1		61.7	N	
1	1/24/93	4	1		61.8	N	
1	1/24/93	5	1		61.8	N	
1	1/24/93	6	1		61.8	N	
1	1/24/93	7	1		61.8	N	
1	1/24/93	8	1		61.8	N	
1	1/24/93	9	1		61.7	N	
1	1/24/93	10	1		61.6	N	
1	1/24/93	11	1		60.8	N	
1	1/24/93	12	1		57.9	N	
1	1/31/93	1	1		61	Y	J 910126143-40
1	1/31/93	2	1		58.7	N	
1	1/31/93	3	1		59.5	N	
1	1/31/93	4	1		57.5	N	
1	1/31/93	5	1		59.4	N	
1	1/31/93	6	1		59.4	N	
1	1/31/93	7	1		59.4	N	
1	1/31/93	8	1		59.4	N	
1	1/31/93	9	1		59.3	N	
1	1/31/93	10	1		59.3	N	
1	1/31/93	11	1		58.6	N	
1	1/31/93	12	1		55.9	N	
1	2/6/93	1	1		60	Y	J 910126143-50
1	2/6/93	2	1		58.3	N	
1	2/6/93	3	1		58.4	N	
1	2/6/93	4	1		58.4	N	
1	2/6/93	5	1		58.4	N	
1	2/6/93	6	1		58.4	N	
1	2/6/93	7	1		58.4	N	
1	2/6/93	8	1		68.5	N	
1	2/6/93	9	1		58.4	N	
1	2/6/93	10	1		58.3	N	
1	2/6/93	11	1		57.8	N	
1	2/6/93	12	1		55	N	
1	2/12/93	1	1		58	Y	J 890423320-42
1	2/12/93	2	1		56.4	N	
1	2/12/93	3	1		56.5	N	
1	2/12/93	4	1		56.4	N	
1	2/12/93	5	1		56.3	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	2/12/93	6	1		56.3	N	
1	2/12/93	7	1		56.2	N	
1	2/12/93	8	1		56.2	N	
1	2/12/93	9	1		56.3	N	
1	2/12/93	10	1		56.3	N	
1	2/12/93	11	1		55.9	N	
1	2/12/93	12	1		53.4	N	
1	2/18/93	1	1		59.7	Y	J TI-040 910126143-48
1	2/18/93	2	1		58.3	N	
1	2/18/93	3	1		58.1	N	
1	2/18/93	4	1		58	N	
1	2/18/93	5	1		58	N	
1	2/18/93	6	1		58	N	
1	2/18/93	7	1		58	N	
1	2/18/93	8	1		58	N	
1	2/18/93	9	1		57.9	N	
1	2/18/93	10	1		58.9	N	
1	2/18/93	11	1		57.6	N	
1	2/18/93	12	1		55.2	N	
1	2/28/93	1	1		59.6	Y	J 910126143-48
1	2/28/93	2	1		57.8	N	
1	2/28/93	3	1		58.1	N	
1	2/28/93	4	1		57.4	N	
1	2/28/93	5	1		58	N	
1	2/28/93	6	1		58	N	
1	2/28/93	7	1		58	N	
1	2/28/93	8	1		58	N	
1	2/28/93	9	1		58.6	N	
1	2/28/93	10	1		57.9	N	
1	2/28/93	11	1		57.4	N	
1	2/28/93	12	1		54.7	N	
1	3/6/93	1	1		56.3	Y	J 890423320-42
1	3/6/93	2	1		54.1	N	
1	3/6/93	3	1		54.5	N	
1	3/6/93	4	1		54.4	N	
1	3/6/93	5	1		54.5	N	
1	3/6/93	6	1		54.5	N	
1	3/6/93	7	1		54.5	N	
1	3/6/93	8	1		54.6	N	
1	3/6/93	9	1		54.7	N	
1	3/6/93	10	1		54.8	N	
1	3/6/93	11	1		54.4	N	
1	3/6/93	12	1		62	N	
1	3/11/93	1	1		56.8	Y	J 890423320-42
1	3/11/93	2	1		55.3	N	
1	3/11/93	3	1		55.4	N	
1	3/11/93	4	1		55.4	N	
1	3/11/93	5	1		55.4	N	
1	3/11/93	6	1		55.3	N	
1	3/11/93	7	1		55.3	N	
1	3/11/93	8	1		55.3	N	
1	3/11/93	9	1		55.1	N	
1	3/11/93	10	1		55	N	
1	3/11/93	11	1		54.6	N	
1	3/11/93	12	1		52.2	N	
1	3/19/93	1	1		57.5	Y	J 910126143-14
1	3/19/93	2	1		56	N	
1	3/19/93	3	1		55.9	N	
1	3/19/93	4	1		55.9	N	
1	3/19/93	5	1		56	N	
1	3/19/93	6	1		56	N	
1	3/19/93	7	1		55.9	N	
1	3/19/93	8	1		55.9	N	
1	3/19/93	9	1		55.8	N	
1	3/19/93	10	1		55.8	N	
1	3/19/93	11	1		55.9	N	
1	3/19/93	12	1		53.4	N	
1	3/28/93	1	1		57.9	Y	J 910126143-32

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	3/28/93	2	1		56.4	N	
1	3/28/93	3	1		56.2	N	
1	3/28/93	4	1		56.3	N	
1	3/28/93	5	1		56.3	N	
1	3/28/93	6	1		56.3	N	
1	3/28/93	7	1		56.1	N	
1	3/28/93	8	1		56.2	N	
1	3/28/93	9	1		56.1	N	
1	3/28/93	10	1		56	N	
1	3/28/93	11	1		55.8	N	
1	3/28/93	12	1		54	N	
1	4/2/93	1	1		57.8	Y	J 910126143-32
1	4/2/93	2	1		56.3	N	
1	4/2/93	3	1		56.1	N	
1	4/2/93	4	1		56.1	N	
1	4/2/93	5	1		56	N	
1	4/2/93	6	1		56	N	
1	4/2/93	7	1		55.9	N	
1	4/2/93	8	1		56	N	
1	4/2/93	9	1		55.9	N	
1	4/2/93	10	1		56	N	
1	4/2/93	11	1		55.8	N	
1	4/2/93	12	1		54.5	N	
1	4/9/93	1	1		57.7	Y	J 910126143-48
1	4/9/93	2	1		56.5	N	
1	4/9/93	3	1		56.5	N	
1	4/9/93	4	1		56.5	N	
1	4/9/93	5	1		56.5	N	
1	4/9/93	6	1		56.4	N	
1	4/9/93	7	1		56.3	N	
1	4/9/93	8	1		56.3	N	
1	4/9/93	9	1		56.3	N	
1	4/9/93	10	1		56.1	N	
1	4/9/93	11	1		56	N	
1	4/9/93	12	1		54	N	
1	4/17/93	1	1		57.9	Y	TYPE J 910126143-64
1	4/17/93	2	1		56.6	N	
1	4/17/93	3	1		56.5	N	
1	4/17/93	4	1		56.4	N	
1	4/17/93	5	1		56.3	N	
1	4/17/93	6	1		56.4	N	
1	4/17/93	7	1		56.4	N	
1	4/17/93	8	1		56.4	N	
1	4/17/93	9	1		56.4	N	
1	4/17/93	10	1		56.5	N	
1	4/17/93	11	1		56.5	N	
1	4/17/93	12	1		55.7	N	
1	4/24/93	1	1		57.8	Y	J 910126143-50
1	4/24/93	2	1		56.6	N	
1	4/24/93	3	1		56.4	N	
1	4/24/93	4	1		56.5	N	
1	4/24/93	5	1		56.3	N	
1	4/24/93	6	1		56.3	N	
1	4/24/93	7	1		56.3	N	
1	4/24/93	8	1		56.3	N	
1	4/24/93	9	1		56.3	N	
1	4/24/93	10	1		56.3	N	
1	4/24/93	11	1		56.4	N	
1	4/24/93	12	1		55.6	N	
1	5/1/93	1	1		57.5	Y	J 910126143-50
1	5/1/93	2	1		56.4	N	
1	5/1/93	3	1		56.3	N	
1	5/1/93	4	1		56.3	N	
1	5/1/93	5	1		56.2	N	
1	5/1/93	6	1		56.2	N	
1	5/1/93	7	1		56.2	N	
1	5/1/93	8	1		56.1	N	
1	5/1/93	9	1		56.2	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/1/93	10	1		56.3	N	
1	5/1/93	11	1		56.3	N	
1	5/1/93	12	1		55.9	N	
1	5/8/93	1	1		57.8	Y	J 910126143-50
1	5/8/93	2	1		56.7	N	
1	5/8/93	3	1		56.6	N	
1	5/8/93	4	1		56.5	N	
1	5/8/93	5	1		56.5	N	
1	5/8/93	6	1		56.4	N	
1	5/8/93	7	1		56.5	N	
1	5/8/93	8	1		56.4	N	
1	5/8/93	9	1		56.5	N	
1	5/8/93	10	1		56.5	N	
1	5/8/93	11	1		56.4	N	
1	5/8/93	12	1		56.1	N	
1	5/15/93	1	1		56.4	Y	J910126143-50
1	5/15/93	2	1		55.1	N	
1	5/15/93	3	1		54.8	N	
1	5/15/93	4	1		54.5	N	
1	5/15/93	5	1		54.3	N	
1	5/15/93	6	1		54.3	N	
1	5/15/93	7	1		54.3	N	
1	5/15/93	8	1		54.5	N	
1	5/15/93	9	1		54.8	N	
1	5/15/93	10	1		55	N	
1	5/15/93	11	1		55.2	N	
1	5/15/93	12	1		55.1	N	
1	5/23/93	1	1		57.1	Y	J 910126143-42
1	5/23/93	2	1		56.1	N	
1	5/23/93	3	1		55.9	N	
1	5/23/93	4	1		55.9	N	
1	5/23/93	5	1		55.8	N	
1	5/23/93	6	1		56	N	
1	5/23/93	7	1		56.2	N	
1	5/23/93	8	1		56.3	N	
1	5/23/93	9	1		56.5	N	
1	5/23/93	10	1		56.6	N	
1	5/23/93	11	1		56.9	N	
1	5/23/93	12	1		56.8	N	
1	6/3/93	1	1		58.3	Y	J 910126143-40
1	6/3/93	2	1		57.7	N	
1	6/3/93	3	1		57.6	N	
1	6/3/93	4	1		57.5	N	
1	6/3/93	5	1		57.4	N	
1	6/3/93	6	1		57.5	N	
1	6/3/93	7	1		57.6	N	
1	6/3/93	8	1		57.8	N	
1	6/3/93	9	1		57.9	N	
1	6/3/93	10	1		58	N	
1	6/3/93	11	1		58.2	N	
1	6/3/93	12	1		58.2	N	
1	6/13/93	1	1		58.3	N	J 890523512-20
1	6/13/93	2	1		57.6	N	
1	6/13/93	3	1		57.5	N	
1	6/13/93	4	1		57.4	N	
1	6/13/93	5	1		57.4	N	
1	6/13/93	6	1		57.6	N	
1	6/13/93	7	1		57.8	N	
1	6/13/93	8	1		58.1	N	
1	6/13/93	9	1		58.3	N	
1	6/13/93	10	1		58.6	N	
1	6/13/93	11	1		59	N	
1	6/13/93	12	1		59.2	Y	
1	6/19/93	1	1		59.4	Y	J 890523512-20
1	6/19/93	2	1		58.6	N	
1	6/19/93	3	1		58.4	N	
1	6/19/93	4	1		58.3	N	
1	6/19/93	5	1		58.2	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/19/93	6	1		58.4	N	
1	6/19/93	7	1		58.6	N	
1	6/19/93	8	1		58.8	N	
1	6/19/93	9	1		59	N	
1	6/19/93	10	1		59.3	N	
1	6/19/93	11	1		59.6	N	
1	6/19/93	12	1		59.8	N	
1	6/24/93	1	1		59.3	Y	J 910126143-14
1	6/24/93	2	1		58.7	N	
1	6/24/93	3	1		58.5	N	
1	6/24/93	4	1		58.2	N	
1	6/24/93	5	1		58.1	N	
1	6/24/93	6	1		58.2	N	
1	6/24/93	7	1		58.3	N	
1	6/24/93	8	1		58.6	N	
1	6/24/93	9	1		59	N	
1	6/24/93	10	1		59.4	N	
1	6/24/93	11	1		59.7	N	
1	6/24/93	12	1		60.1	N	
1	7/1/93	1	1		61.2	Y	J 91012614366
1	7/1/93	2	1		61	N	
1	7/1/93	3	1		60.9	N	
1	7/1/93	4	1		60.8	N	
1	7/1/93	5	1		60.8	N	
1	7/1/93	6	1		60.8	N	
1	7/1/93	7	1		60.8	N	
1	7/1/93	8	1		60.8	N	
1	7/1/93	9	1		60.9	N	
1	7/1/93	10	1		61.1	N	
1	7/1/93	11	1		61.1	N	
1	7/1/93	12	1		60.8	N	
1	7/8/93	1	1		61.1	Y	J 910126143-66
1	7/8/93	2	1		60.6	N	
1	7/8/93	3	1		60.3	N	
1	7/8/93	4	1		60.5	N	
1	7/8/93	5	1		60.4	N	
1	7/8/93	6	1		60.7	N	
1	7/8/93	7	1		60.9	N	
1	7/8/93	8	1		61.3	N	
1	7/8/93	9	1		61.6	N	
1	7/8/93	10	1		61.9	N	
1	7/8/93	11	1		62.2	N	
1	7/8/93	12	1		62.7	N	
1	7/18/93	1	1		60	N	J 910125143-48
1	7/18/93	2	1		59.8	N	
1	7/18/93	3	1		59.6	N	
1	7/18/93	4	1		59.5	N	
1	7/18/93	5	1		59.6	N	
1	7/18/93	6	1		59.9	N	
1	7/18/93	7	1		60.1	N	
1	7/18/93	8	1		60.4	N	
1	7/18/93	9	1		60.7	N	
1	7/18/93	10	1		61	N	
1	7/18/93	11	1		61.6	N	
1	7/18/93	12	1		62.4	Y	
1	7/24/93	1	1		60	N	J 910126143-42
1	7/24/93	2	1		59.7	N	
1	7/24/93	3	1		59.6	N	
1	7/24/93	4	1		59.5	N	
1	7/24/93	5	1		59.5	N	
1	7/24/93	6	1		59.7	N	
1	7/24/93	7	1		59.8	N	
1	7/24/93	8	1		60	N	
1	7/24/93	9	1		60.4	N	
1	7/24/93	10	1		60.7	N	
1	7/24/93	11	1		61.2	N	
1	7/24/93	12	1		61.6	N	
1	7/31/93	1	1		60.3	N	J TI-039 910126143-50

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/31/93	2	1		59.9	N	
1	7/31/93	3	1		59.7	N	
1	7/31/93	4	1		59.5	N	
1	7/31/93	5	1		59.7	N	
1	7/31/93	6	1		59.9	N	
1	7/31/93	7	1		59.9	N	
1	7/31/93	8	1		60.1	N	
1	7/31/93	9	1		60.4	N	
1	7/31/93	10	1		60.7	N	
1	7/31/93	11	1		61.4	Y	
1	7/31/93	12	1		60.9	N	
1	8/5/93	1	1		60.9	N	J 910126143-39
1	8/5/93	2	1		60.8	N	
1	8/5/93	3	1		60.6	N	
1	8/5/93	4	1		60.5	N	
1	8/5/93	5	1		60.4	N	
1	8/5/93	6	1		60.5	N	
1	8/5/93	7	1		60.6	N	
1	8/5/93	8	1		60.8	N	
1	8/5/93	9	1		61.2	N	
1	8/5/93	10	1		61.5	N	
1	8/5/93	11	1		61.8	N	
1	8/5/93	12	1		62.4	Y	
1	8/13/93	1	1		65.2	Y	
1	8/13/93	2	1		62.6	N	
1	8/13/93	3	1		62.5	N	
1	8/13/93	4	1		62.6	N	
1	8/13/93	5	1		62.3	N	
1	8/13/93	6	1		62.3	N	
1	8/13/93	7	1		62.4	N	
1	8/13/93	8	1		62.6	N	
1	8/13/93	9	1		62.7	N	
1	8/13/93	10	1		62.9	N	
1	8/13/93	11	1		63	N	
1	8/13/93	12	1		62.6	N	
1	8/20/93	1	1		62.1	N	J 910126143-48
1	8/20/93	2	1		62.5	N	
1	8/20/93	3	1		62.5	N	
1	8/20/93	4	1		62.5	N	
1	8/20/93	5	1		62.4	N	
1	8/20/93	6	1		62.6	N	
1	8/20/93	7	1		63.1	N	
1	8/20/93	8	1		63.2	N	
1	8/20/93	9	1		62.8	N	
1	8/20/93	10	1		62.8	N	
1	8/20/93	11	1		63.2	N	
1	8/20/93	12	1		63.6	Y	
1	8/26/93	1	1		61.7	N	J TI 040
1	8/26/93	2	1		62.1	N	
1	8/26/93	3	1		62.2	N	
1	8/26/93	4	1		62.3	N	
1	8/26/93	5	1		62.4	N	
1	8/26/93	6	1		62.5	N	
1	8/26/93	7	1		62.5	N	
1	8/26/93	8	1		62.6	N	
1	8/26/93	9	1		62.6	N	
1	8/26/93	10	1		62.7	Y	
1	8/26/93	11	1		62.6	N	
1	8/26/93	12	1		62.6	N	
1	9/3/93	1	1		63	N	J 900925741-79
1	9/3/93	2	1		64	Y	
1	9/3/93	3	1		64	N	
1	9/3/93	4	1		64	N	
1	9/3/93	5	1		64	N	
1	9/3/93	6	1		64	N	
1	9/3/93	7	1		64	N	
1	9/3/93	8	1		64	N	
1	9/3/93	9	1		64	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/3/93	10	1		64	N	
1	9/3/93	11	1		64	N	
1	9/3/93	12	1		64	N	
1	9/9/93	1	1		63.2	N	J 910126143-39
1	9/9/93	2	1		63.8	N	
1	9/9/93	3	1		64	N	
1	9/9/93	4	1		64.1	N	
1	9/9/93	5	1		64.2	N	
1	9/9/93	6	1		64.3	N	
1	9/9/93	7	1		64.3	N	
1	9/9/93	8	1		64.4	N	
1	9/9/93	9	1		64.3	N	
1	9/9/93	10	1		64.4	N	
1	9/9/93	11	1		64.4	N	
1	9/9/93	12	1		64.8	Y	
1	9/16/93	1	1		64	N	J 900925741-79
1	9/16/93	2	1		65	N	
1	9/16/93	3	1		65	N	
1	9/16/93	4	1		65	N	
1	9/16/93	5	1		65	N	
1	9/16/93	6	1		65	N	
1	9/16/93	7	1		65	N	
1	9/16/93	8	1		65	N	
1	9/16/93	9	1		65	N	
1	9/16/93	10	1		65	N	
1	9/16/93	11	1		65	N	
1	9/16/93	12	1		66	Y	
1	9/25/93	1	1		63.8	N	J TI-040
1	9/25/93	2	1		64.4	N	
1	9/25/93	3	1		64.6	N	
1	9/25/93	4	1		64.7	N	
1	9/25/93	5	1		64.7	N	
1	9/25/93	6	1		64.8	N	
1	9/25/93	7	1		64.8	N	
1	9/25/93	8	1		64.8	N	
1	9/25/93	9	1		64.8	N	
1	9/25/93	10	1		64.9	N	
1	9/25/93	11	1		65	N	
1	9/25/93	12	1		65.7	Y	
1	9/30/93	1	1		65.1	N	J 910426540-36
1	9/30/93	2	1		65.8	N	
1	9/30/93	3	1		66	N	
1	9/30/93	4	1		66	N	
1	9/30/93	5	1		66	N	
1	9/30/93	6	1		66	N	
1	9/30/93	7	1		66	N	
1	9/30/93	8	1		66	N	
1	9/30/93	9	1		66.1	N	
1	9/30/93	10	1		66.1	N	
1	9/30/93	11	1		66.2	N	
1	9/30/93	12	1		66.7	Y	
1	10/14/93	1	1		63.7	N	J 89042380-42
1	10/14/93	2	1		64.2	N	
1	10/14/93	3	1		64.3	N	
1	10/14/93	4	1		64.3	N	
1	10/14/93	5	1		64.3	N	
1	10/14/93	6	1		64.3	N	
1	10/14/93	7	1		64.4	N	
1	10/14/93	8	1		64.4	N	
1	10/14/93	9	1		64.5	N	
1	10/14/93	10	1		64.5	N	
1	10/14/93	11	1		64.6	N	
1	10/14/93	12	1		64.9	Y	
1	10/20/93	1	1		65.1	N	J 910126143-29
1	10/20/93	2	1		65.7	N	
1	10/20/93	3	1		65.8	N	
1	10/20/93	4	1		65.8	N	
1	10/20/93	5	1		65.8	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-103							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/20/93	6	1		65.8	N	
1	10/20/93	7	1		65.8	N	
1	10/20/93	8	1		65.9	N	
1	10/20/93	9	1		65.9	N	
1	10/20/93	10	1		65.9	N	
1	10/20/93	11	1		66	N	
1	10/20/93	12	1		66.5	Y	
1	10/26/93	1	1		65.2	N	J 910126143-50
1	10/26/93	2	1		65.7	N	
1	10/26/93	3	1		65.8	N	
1	10/26/93	4	1		65.8	N	
1	10/26/93	5	1		65.8	N	
1	10/26/93	6	1		65.7	N	
1	10/26/93	7	1		65.8	N	
1	10/26/93	8	1		65.8	N	
1	10/26/93	9	1		65.9	Y	
1	10/26/93	10	1		65.9	N	
1	10/26/93	11	1		65.9	N	
1	10/26/93	12	1		65.9	N	
1	11/7/93	1	1		64.9	N	J 910126143-50
1	11/7/93	2	1		65	N	
1	11/7/93	3	1		64.9	N	
1	11/7/93	4	1		64.9	N	
1	11/7/93	5	1		65	N	
1	11/7/93	6	1		65	N	
1	11/7/93	7	1		65.1	N	
1	11/7/93	8	1		65.2	N	
1	11/7/93	9	1		65.2	N	
1	11/7/93	10	1		65.3	N	
1	11/7/93	11	1		65.4	N	
1	11/7/93	12	1		65.6	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-104							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/9/75	1	1		73	Y	
1	4/9/75	2	1		73	N	
1	4/9/75	3	1		73	N	
1	4/9/75	4	1		73	N	
1	4/9/75	6	1		68	N	
1	4/9/75	7	1		68	N	
1	4/9/75	8	1		66	N	
1	4/9/75	9	1		66	N	
1	4/9/75	10	1		66	N	
1	4/23/75	11	1		64	N	
1	4/23/75	1	1		64	Y	
1	4/23/75	2	1		64	N	
1	4/23/75	3	1		64	N	
1	4/23/75	4	1		64	N	
1	4/23/75	5	1		61	N	
1	4/23/75	6	1		57	N	
1	4/23/75	7	1		57	N	
1	4/23/75	8	1		57	N	
1	4/23/75	9	1		57	N	
1	4/23/75	10	1		57	N	
1	4/30/75	11	1		57	N	
1	4/30/75	1	1		70	Y	
1	4/30/75	2	1		70	N	
1	4/30/75	3	1		70	N	
1	4/30/75	4	1		68	N	
1	4/30/75	5	1		59	N	
1	4/30/75	6	1		55	N	
1	4/30/75	7	1		55	N	
1	4/30/75	8	1		55	N	
1	4/30/75	9	1		55	N	
1	4/30/75	10	1		59	N	
1	4/7/75	11	1		57	N	
1	5/7/75	1	1		70	Y	
1	5/7/75	2	1		70	N	
1	5/7/75	3	1		70	N	
1	5/7/75	4	1		70	N	
1	5/7/75	5	1		66	N	
1	5/7/75	6	1		64	N	
1	5/7/75	7	1		64	N	
1	5/7/75	8	1		63	N	
1	5/7/75	9	1		63	N	
1	5/7/75	10	1		63	N	
1	5/14/75	11	1		63	N	
1	5/14/75	1	1		75	Y	
1	5/14/75	2	1		75	N	
1	5/14/75	3	1		75	N	
1	5/14/75	4	1		73	N	
1	5/14/75	5	1		73	N	
1	5/14/75	6	1		70	N	
1	5/14/75	7	1		70	N	
1	5/14/75	8	1		70	N	
1	5/14/75	9	1		70	N	
1	5/14/75	10	1		68	N	
1	5/21/75	11	1		66	N	
1	5/21/75	1	1		64	Y	
1	5/21/75	2	1		64	N	
1	5/21/75	3	1		64	N	
1	5/21/75	4	1		61	N	
1	5/21/75	5	1		61	N	
1	5/21/75	6	1		57	N	
1	5/21/75	7	1		57	N	
1	5/21/75	8	1		55	N	
1	5/21/75	9	1		55	N	
1	5/21/75	10	1		55	N	
1	5/28/75	11	1		54	N	
1	5/28/75	1	1		66	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-104 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/28/75	2	1		66	N	
1	5/28/75	3	1		64	N	
1	5/28/75	4	1		64	N	
1	5/28/75	5	1		63	N	
1	5/28/75	6	1		59	N	
1	5/28/75	7	1		59	N	
1	5/28/75	8	1		59	N	
1	5/28/75	9	1		59	N	
1	5/28/75	10	1		59	N	
1	5/4/75	11	1		57	N	
1	6/4/75	1	1		63	Y	
1	6/4/75	2	1		63	N	
1	6/4/75	3	1		61	N	
1	6/4/75	4	1		59	N	
1	6/4/75	5	1		57	N	
1	6/4/75	6	1		57	N	
1	6/4/75	7	1		55	N	
1	6/4/75	8	1		55	N	
1	6/4/75	9	1		55	N	
1	6/4/75	10	1		55	N	
1	7/1/75	11	1		55	N	
1	7/31/75	1	1		69	N	
1	7/31/75	2	1		69	N	
1	7/31/75	3	1		68	N	
1	7/31/75	4	1		68	N	
1	7/31/75	5	1		68	N	
1	7/31/75	6	1		68	N	
1	7/31/75	7	1		69	N	
1	7/31/75	8	1		69	N	
1	7/31/75	9	1		69	N	
1	7/31/75	10	1		69	N	
1	7/31/75	11	1		69	N	
1	7/7/75	12	1		70	Y	
1	1/7/76	1	1		84	Y	
1	1/7/76	2	1		84	N	
1	1/7/76	3	1		84	N	
1	1/7/76	4	1		84	N	
1	1/7/76	5	1		83	N	
1	1/7/76	6	1		82	N	
1	1/7/76	7	1		79	N	
1	1/7/76	8	1		79	N	
1	1/7/76	9	1		79	N	
1	1/7/76	10	1		79	N	
1	1/1/76	11	1		77	N	
1	4/1/76	1	1		73	Y	
1	4/1/76	2	1		73	N	
1	4/1/76	3	1		73	N	
1	4/1/76	4	1		73	N	
1	4/1/76	5	1		73	N	
1	4/1/76	6	1		69	N	
1	4/1/76	7	1		65	N	
1	4/1/76	8	1		66	N	
1	4/1/76	9	1		66	N	
1	4/1/76	10	1		64	N	
1	4/1/76	11	1		64	N	
1	4/7/76	12	1		65	N	
1	11/7/76	1	1		71	N	
1	11/7/76	2	1		70	N	
1	11/7/76	3	1		70	N	
1	11/7/76	4	1		70	N	
1	11/7/76	5	1		71	N	
1	11/7/76	6	1		72	N	
1	11/7/76	7	1		72	N	
1	11/7/76	8	1		72	N	
1	11/7/76	9	1		72	N	
1	11/7/76	10	1		72	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-104							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	11/3/76	11	1		73	Y	
1	1/3/77	1	1		88	Y	
1	1/3/77	2	1		87	N	
1	1/3/77	3	1		87	N	
1	1/3/77	4	1		87	N	
1	1/3/77	5	1		87	N	
1	1/3/77	6	1		85	N	
1	1/3/77	7	1		84	N	
1	1/3/77	8	1		83	N	
1	1/3/77	9	1		83	N	
1	1/3/77	10	1		83	N	
1	1/26/77	11	1		82	N	
1	4/26/77	1	1		62	Y	
1	4/26/77	2	1		61	N	
1	4/26/77	3	1		60	N	
1	4/26/77	4	1		59	N	
1	4/26/77	5	1		57	N	
1	4/26/77	6	1		55	N	
1	4/26/77	7	1		54	N	
1	4/26/77	8	1		54	N	
1	4/26/77	9	1		54	N	
1	4/26/77	10	1		54	N	
1	4/16/77	11	1		53	N	
1	7/16/77	1	1		72	Y	
1	7/16/77	2	1		71	N	
1	7/16/77	3	1		71	N	
1	7/16/77	4	1		70	N	
1	7/16/77	5	1		69	N	
1	7/16/77	6	1		69	N	
1	7/16/77	7	1		70	N	
1	7/16/77	8	1		70	N	
1	7/16/77	9	1		70	N	
1	7/16/77	10	1		69	N	
1	7/28/77	11	1		70	N	
1	7/28/77	1	1		62	N	
1	7/28/77	2	1		62	N	
1	7/28/77	3	1		62	N	
1	7/28/77	4	1		61	N	
1	7/28/77	5	1		61	N	
1	7/28/77	6	1		61	N	
1	7/28/77	7	1		62	N	
1	7/28/77	8	1		62	N	
1	7/28/77	9	1		62	N	
1	7/28/77	10	1		62	N	
1	7/7/77	11	1		63	Y	
1	10/7/77	1	1		64	N	
1	10/7/77	2	1		63	N	
1	10/7/77	3	1		63	N	
1	10/7/77	4	1		63	N	
1	10/7/77	5	1		64	N	
1	10/7/77	6	1		65	N	
1	10/7/77	7	1		66	N	
1	10/7/77	8	1		66	N	
1	10/7/77	9	1		67	N	
1	10/7/77	10	1		67	N	
1	10/16/77	11	1		68	Y	
1	1/16/78	1	1		80	Y	
1	1/16/78	2	1		75	N	
1	1/16/78	3	1		76	N	
1	1/16/78	4	1		76	N	
1	1/16/78	5	1		75	N	
1	1/16/78	6	1		75	N	
1	1/16/78	7	1		75	N	
1	1/16/78	8	1		70	N	
1	1/16/78	9	1		69	N	
1	1/16/78	10	1		70	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-104							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/23/78	11	1		71	N	
1	4/23/78	1	1		83	Y	
1	4/23/78	2	1		83	N	
1	4/23/78	3	1		82	N	
1	4/23/78	4	1		82	N	
1	4/23/78	5	1		81	N	
1	4/23/78	6	1		80	N	
1	4/23/78	7	1		79	N	
1	4/23/78	8	1		77	N	
1	4/23/78	9	1		75	N	
1	4/23/78	10	1		75	N	
1	4/25/78	11	1		74	N	
1	4/25/78	1	1		68	Y	
1	4/25/78	2	1		67	N	
1	4/25/78	3	1		65	N	
1	4/25/78	4	1		64	N	
1	4/25/78	5	1		64	N	
1	4/25/78	6	1		64	N	
1	4/25/78	7	1		64	N	
1	4/25/78	8	1		64	N	
1	4/25/78	9	1		64	N	
1	4/25/78	10	1		64	N	
1	4/9/78	11	1		62	N	
1	1/9/79	1	1		68	N	
1	1/9/79	2	1		72	N	
1	1/9/79	3	1		76	Y	
1	1/9/79	4	1		76	N	
1	1/9/79	5	1		71	N	
1	1/9/79	6	1		70	N	
1	1/9/79	7	1		70	N	
1	1/9/79	8	1		68	N	
1	1/9/79	9	1		68	N	
1	1/9/79	10	1		68	N	
1	1/9/79	11	1		68	N	
1	1/8/79	12	1		69	N	
1	4/8/79	1	1		87	Y	
1	4/8/79	2	1		87	N	
1	4/8/79	3	1		86	N	
1	4/8/79	4	1		85	N	
1	4/8/79	5	1		83	N	
1	4/8/79	6	1		81	N	
1	4/8/79	7	1		78	N	
1	4/8/79	8	1		78	N	
1	4/8/79	9	1		78	N	
1	4/8/79	10	1		78	N	
1	4/23/79	11	1		76	N	
1	7/23/79	1	1		54	N	
1	7/23/79	2	1		54	N	
1	7/23/79	3	1		55	N	
1	7/23/79	4	1		55	N	
1	7/23/79	5	1		56	N	
1	7/23/79	6	1		56	N	
1	7/23/79	7	1		56	N	
1	7/23/79	8	1		56	N	
1	7/23/79	9	1		56	N	
1	7/23/79	10	1		56	N	
1	7/12/79	11	1		57	Y	
1	3/12/80	1	1		52	N	
1	3/12/80	2	1		52	N	
1	3/12/80	3	1		54	Y	
1	3/12/80	4	1		54	N	
1	3/12/80	5	1		54	N	
1	3/12/80	6	1		54	N	
1	3/12/80	7	1		53	N	
1	3/12/80	8	1		53	N	
1	3/12/80	9	1		53	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-104							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	3/12/80	10	1		54	N	
1	3/1/80	11	1		54	N	
1	1/1/82	1	1		81	Y	
1	1/1/82	2	1		81	N	
1	1/1/82	3	1		81	N	
1	1/1/82	4	1		81	N	
1	1/1/82	5	1		81	N	
1	1/1/82	6	1		80	N	
1	1/1/82	7	1		78	N	
1	1/1/82	8	1		78	N	
1	1/1/82	9	1		78	N	
1	1/1/82	10	1		78	N	
1	1/16/82	11	1		76	N	
1	4/16/82	1	1		62	N	
1	4/16/82	2	1		62	N	
1	4/16/82	3	1		61	N	
1	4/16/82	4	1		61	N	
1	4/16/82	5	1		60	N	
1	4/16/82	6	1		58	N	
1	4/16/82	7	1		56	N	
1	4/16/82	8	1		56	N	
1	4/16/82	9	1		56	N	
1	4/16/82	10	1		56	N	
1	4/5/82	11	1		64	Y	
1	7/5/89	1	1		119.6	N	
1	7/5/89	2	1		119.5	N	
1	7/5/89	3	1		119.8	N	
1	7/5/89	4	1		120.3	N	
1	7/5/89	5	1		120.8	N	
1	7/5/89	6	1		120.9	N	
1	7/5/89	7	1		121	N	
1	7/5/89	8	1		121.3	N	
1	7/5/89	9	1		121.4	N	
1	7/5/89	10	1		121.6	N	
1	7/1/89	11	1		121.9	Y	
1	1/1/90	1	1		69.2	N	
1	1/1/90	2	1		69.3	N	
1	1/1/90	3	1		69.5	Y	
1	1/1/90	4	1		69.4	N	
1	1/1/90	5	1		68.7	N	
1	1/1/90	6	1		66.9	N	
1	1/1/90	7	1		65.9	N	
1	1/1/90	8	1		65.8	N	
1	1/1/90	9	1		65.7	N	
1	1/1/90	10	1		65.7	N	
1	1/12/90	11	1		63.8	N	
1	11/12/91	1	1		66	N	J-TI-023
1	11/12/91	2	1		66	N	
1	11/12/91	3	1		66	N	
1	11/12/91	4	1		66	N	
1	11/12/91	5	1		67	N	
1	11/12/91	6	1		68	N	
1	11/12/91	7	1		68	N	
1	11/12/91	8	1		68	N	
1	11/12/91	9	1		68	N	
1	11/12/91	10	1		68	N	
1	11/4/91	11	1		69	Y	
1	1/4/92	2	1		65.1	N	
1	1/4/92	3	1		65.4	N	
1	1/4/92	4	1		65.7	Y	
1	1/4/92	5	1		65.5	N	
1	1/4/92	6	1		64.4	N	
1	1/4/92	7	1		63.5	N	
1	1/4/92	8	1		63.4	N	
1	1/4/92	9	1		62.8	N	
1	1/4/92	10	1		63.2	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-104							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/2/92	11	1		60.8	N	
1	7/2/92	1	1		63	N	J TI-041
1	7/2/92	2	1		62	N	
1	7/2/92	3	1		63	N	
1	7/2/92	4	1		62	N	
1	7/2/92	5	1		62	N	
1	7/2/92	6	1		62	N	
1	7/2/92	7	1		62	N	
1	7/2/92	8	1		63	N	
1	7/2/92	9	1		63	N	
1	7/2/92	10	1		64	N	
1	7/3/92	11	1		64	N	
1	1/3/93	1	1		67.1	N	J 890523512-47
1	1/3/93	2	1		67.2	N	
1	1/3/93	3	1		67.6	N	
1	1/3/93	4	1		67.8	Y	
1	1/3/93	5	1		67.5	N	
1	1/3/93	6	1		66	N	
1	1/3/93	7	1		65.1	N	
1	1/3/93	8	1		65	N	
1	1/3/93	9	1		65	N	
1	1/3/93	10	1		64.9	N	
1	1/1/93	11	1		63.4	N	
1	7/1/93	1	1		65.6	Y	J 91012614366
1	7/1/93	2	1		65.4	N	
1	7/1/93	3	1		64.8	N	
1	7/1/93	4	1		63.9	N	
1	7/1/93	5	1		63.1	N	
1	7/1/93	6	1		62.9	N	
1	7/1/93	7	1		63.2	N	
1	7/1/93	8	1		63.2	N	
1	7/1/93	9	1		63.2	N	
1	7/1/93	10	1		63.2	N	
1	6/30/93	11	1		62.8	N	
364 Records selected.							

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-105							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/1/76	1	1		77	Y	
1	4/1/76	2	1		71	N	
1	4/1/76	3	1		68	N	
1	4/1/76	4	1		65	N	
1	4/1/76	5	1		64	N	
1	4/1/76	6	1		64	N	
1	4/1/76	7	1		54	N	
1	4/1/76	8	1		64	N	
1	4/1/76	9	1		64	N	
1	4/1/76	10	1		64	N	
1	4/1/76	11	1		64	N	
1	11/7/76	1	1		73	Y	
1	11/7/76	2	1		73	N	
1	11/7/76	3	1		72	N	
1	11/7/76	4	1		71	N	
1	11/7/76	5	1		71	N	
1	11/7/76	6	1		70	N	
1	11/7/76	7	1		71	N	
1	11/7/76	8	1		70	N	
1	11/7/76	9	1		71	N	
1	11/7/76	10	1		71	N	
1	11/7/76	11	1		71	N	
1	1/3/77	1	1		80	Y	
1	1/3/77	2	1		77	N	
1	1/3/77	3	1		75	N	
1	1/3/77	4	1		75	N	
1	1/3/77	5	1		77	N	
1	1/3/77	6	1		76	N	
1	1/3/77	7	1		76	N	
1	1/3/77	8	1		76	N	
1	1/3/77	9	1		76	N	
1	1/3/77	10	1		76	N	
1	1/3/77	11	1		71	N	
1	1/3/77	12	1		65	N	
1	4/26/77	1	1		61	Y	
1	4/26/77	2	1		59	N	
1	4/26/77	3	1		54	N	
1	4/26/77	4	1		52	N	
1	4/26/77	5	1		51	N	
1	4/26/77	6	1		51	N	
1	4/26/77	7	1		51	N	
1	4/26/77	8	1		51	N	
1	4/26/77	9	1		52	N	
1	4/26/77	10	1		52	N	
1	4/26/77	11	1		52	N	
1	7/28/77	1	1		54	N	
1	7/28/77	2	1		63	Y	
1	7/28/77	3	1		61	N	
1	7/28/77	4	1		61	N	
1	7/28/77	5	1		60	N	
1	7/28/77	6	1		60	N	
1	7/28/77	7	1		60	N	
1	7/28/77	8	1		60	N	
1	7/28/77	9	1		60	N	
1	7/28/77	10	1		60	N	
1	7/28/77	11	1		60	N	
1	7/28/77	12	1		60	N	
1	10/7/77	1	1		69	Y	
1	10/7/77	2	1		68	N	
1	10/7/77	3	1		68	N	
1	10/7/77	4	1		68	N	
1	10/7/77	5	1		68	N	
1	10/7/77	6	1		68	N	
1	10/7/77	7	1		68	N	
1	10/7/77	8	1		68	N	
1	10/7/77	9	1		68	N	

Data obtained from WHC Surveillance Computer System (SACS), June 2, 1993.

TANK 241-B-105							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/7/77	10	1		69	N	
1	10/7/77	11	1		69	N	
1	1/16/78	1	1		79	Y	
1	1/16/78	2	1		76	N	
1	1/16/78	3	1		71	N	
1	1/16/78	4	1		68	N	
1	1/16/78	5	1		67	N	
1	1/16/78	6	1		67	N	
1	1/16/78	7	1		67	N	
1	1/16/78	8	1		67	N	
1	1/16/78	9	1		67	N	
1	1/16/78	10	1		67	N	
1	1/16/78	11	1		67	N	
1	4/23/78	1	1		83	Y	
1	4/23/78	2	1		82	N	
1	4/23/78	3	1		74	N	
1	4/23/78	4	1		71	N	
1	4/23/78	5	1		71	N	
1	4/23/78	6	1		71	N	
1	4/23/78	7	1		71	N	
1	4/23/78	8	1		70	N	
1	4/23/78	9	1		72	N	
1	4/23/78	10	1		73	N	
1	4/23/78	11	1		73	N	
1	4/25/78	1	1		73	Y	
1	4/25/78	2	1		71	N	
1	4/25/78	3	1		67	N	
1	4/25/78	4	1		64	N	
1	4/25/78	5	1		64	N	
1	4/25/78	6	1		64	N	
1	4/25/78	7	1		64	N	
1	4/25/78	8	1		64	N	
1	4/25/78	9	1		64	N	
1	4/25/78	10	1		64	N	
1	4/25/78	11	1		64	N	
1	4/25/78	12	1		64	N	
1	4/25/78	13	1		64	N	
1	7/16/78	1	1		73	Y	
1	7/16/78	2	1		72	N	
1	7/16/78	3	1		70	N	
1	7/16/78	4	1		69	N	
1	7/16/78	5	1		69	N	
1	7/16/78	6	1		69	N	
1	7/16/78	7	1		69	N	
1	7/16/78	8	1		69	N	
1	7/16/78	9	1		69	N	
1	7/16/78	10	1		69	N	
1	7/16/78	11	1		69	N	
1	1/9/79	1	1		82	Y	
1	1/9/79	2	1		81	N	
1	1/9/79	3	1		78	N	
1	1/9/79	4	1		72	N	
1	1/9/79	5	1		71	N	
1	1/9/79	6	1		71	N	
1	1/9/79	7	1		70	N	
1	1/9/79	8	1		70	N	
1	1/9/79	9	1		72	N	
1	1/9/79	10	1		70	N	
1	1/9/79	11	1		70	N	
1	1/9/79	12	1		69	N	
1	4/8/79	1	1		83	Y	
1	4/8/79	2	1		80	N	
1	4/8/79	3	1		75	N	
1	4/8/79	4	1		72	N	
1	4/8/79	5	1		71	N	
1	4/8/79	6	1		71	N	

Data obtained from WHC Surveillance Computer System (SACS), June 2, 1993.

TANK 241-B-105							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/8/79	7	1		71	N	
1	4/8/79	8	1		71	N	
1	4/8/79	9	1		71	N	
1	4/8/79	10	1		71	N	
1	4/8/79	11	1		71	N	
1	7/23/79	1	1		59	Y	
1	7/23/79	2	1		57	N	
1	7/23/79	3	1		56	N	
1	7/23/79	4	1		55	N	
1	7/23/79	5	1		55	N	
1	7/23/79	6	1		55	N	
1	7/23/79	7	1		55	N	
1	7/23/79	8	1		54	N	
1	7/23/79	9	1		54	N	
1	7/23/79	10	1		54	N	
1	7/23/79	11	1		54	N	
1	3/12/80	1	1		60	Y	
1	3/12/80	2	1		58	N	
1	3/12/80	3	1		54	N	
1	3/12/80	4	1		54	N	
1	3/12/80	5	1		54	N	
1	3/12/80	6	1		54	N	
1	3/12/80	7	1		54	N	
1	3/12/80	8	1		54	N	
1	3/12/80	9	1		54	N	
1	3/12/80	10	1		54	N	
1	3/12/80	11	1		54	N	
1	1/1/82	1	1		83	Y	
1	1/1/82	2	1		81	N	
1	1/1/82	3	1		77	N	
1	1/1/82	4	1		74	N	
1	1/1/82	5	1		74	N	
1	1/1/82	6	1		74	N	
1	1/1/82	7	1		74	N	
1	1/1/82	8	1		74	N	
1	1/1/82	9	1		74	N	
1	1/1/82	10	1		74	N	
1	1/1/82	11	1		73	N	
1	4/16/82	1	1		61	Y	
1	4/16/82	2	1		59	N	
1	4/16/82	3	1		54	N	
1	4/16/82	4	1		52	N	
1	4/16/82	5	1		51	N	
1	4/16/82	6	1		51	N	
1	4/16/82	7	1		51	N	
1	4/16/82	8	1		51	N	
1	4/16/82	9	1		51	N	
1	4/16/82	10	1		51	N	
1	4/16/82	11	1		51	N	
1	7/5/89	1	1		105.6	N	
1	7/5/89	2	1		100	N	
1	7/5/89	3	1		106.3	N	
1	7/5/89	4	1		106.2	N	
1	7/5/89	5	1		106.3	N	
1	7/5/89	6	1		106.4	N	
1	7/5/89	7	1		106.6	Y	
1	7/5/89	8	1		106.6	N	
1	7/5/89	9	1		106.6	N	
1	7/5/89	10	1		106.4	N	
1	7/5/89	11	1		106.3	N	
1	7/5/89	12	1		105.9	N	
1	1/1/90	1	1		71.9	Y	
1	1/1/90	2	1		70.6	N	
1	1/1/90	3	1		66.9	N	
1	1/1/90	4	1		64.5	N	
1	1/1/90	5	1		64.2	N	

Data obtained from WHC Surveillance Computer System (SACS), June 2, 1993.

TANK 241-B-105							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/90	6	1		64.1	N	
1	1/1/90	7	1		64.1	N	
1	1/1/90	8	1		64.1	N	
1	1/1/90	9	1		64.1	N	
1	1/1/90	10	1		64.1	N	
1	1/1/90	11	1		64	N	
1	11/12/91	1	1		68	Y	J-TI-023
1	11/12/91	2	1		68	N	
1	11/12/91	3	1		68	N	
1	11/12/91	4	1		67	N	
1	11/12/91	5	1		67	N	
1	11/12/91	6	1		67	N	
1	11/12/91	7	1		67	N	
1	11/12/91	8	1		67	N	
1	11/12/91	9	1		67	N	
1	11/12/91	10	1		67	N	
1	11/12/91	11	1		68	N	
1	1/1/92	1	1		70.2	Y	J-900925741-79 TC #12 O/S
1	1/1/92	2	1		69.4	N	
1	1/1/92	3	1		66.6	N	
1	1/1/92	4	1		64.8	N	
1	1/1/92	5	1		64.5	N	
1	1/1/92	6	1		64.4	N	
1	1/1/92	7	1		64.4	N	
1	1/1/92	8	1		64.4	N	
1	1/1/92	9	1		64.4	N	
1	1/1/92	10	1		64.3	N	
1	1/1/92	11	1		64.2	N	
1	7/2/92	1	1			N	No rdgs. J-3 written
1	11/4/92	1	1			N	S&DA-92-488 No Rdgs since 1/92
1	11/6/92	1	1		70.2	N	J 817-13-55-001
1	11/6/92	2	1		70.4	Y	
1	11/6/92	3	1		70.3	N	
1	11/6/92	4	1		69.9	N	
1	11/6/92	5	1		69.9	N	
1	11/6/92	6	1		69.9	N	
1	11/6/92	7	1		69.9	N	
1	11/6/92	8	1		69.9	N	
1	11/6/92	9	1		69.9	N	
1	11/6/92	10	1		69.9	N	
1	11/6/92	11	1		69.9	N	
1	1/3/93	1	1		67.6	Y	J 890523512-47
1	1/3/93	2	1		66.7	N	
1	1/3/93	3	1		63.6	N	
1	1/3/93	4	1		61.5	N	
1	1/3/93	5	1		61.3	N	
1	1/3/93	6	1		61.2	N	
1	1/3/93	7	1		61.2	N	
1	1/3/93	8	1		61.2	N	
1	1/3/93	9	1		61.2	N	
1	1/3/93	10	1		61.1	N	
1	1/3/93	11	1		61	N	
1	7/1/93	1	1		66.5	Y	J 910126143-66
1	7/1/93	2	1		65.5	N	
1	7/1/93	3	1		63.9	N	
1	7/1/93	4	1		63	N	
1	7/1/93	5	1		62.8	N	
1	7/1/93	6	1		62.8	N	
1	7/1/93	7	1		62.8	N	
1	7/1/93	8	1		62.9	N	
1	7/1/93	9	1		63	N	
1	7/1/93	10	1		62.9	N	
1	7/1/93	11	1		63.1	N	

Data obtained from WHC Surveillance Computer System (SACS), June 2, 1993.

TANK 241-B-106							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/24/74	1	1		63	N	
1	9/24/74	2	1		63	N	
1	9/24/74	3	1		68	Y	
1	9/24/74	4	1		63	N	
1	9/24/74	5	1		63	N	
1	9/24/74	6	1		63	N	
1	9/24/74	7	1		64	N	
1	9/24/74	8	1		63	N	
1	9/24/74	9	1		66	N	
1	9/24/74	10	1		63	N	
1	9/24/74	11	1		63	N	
1	9/24/74	12	1		63	N	
1	12/11/74	1	1		63	Y	
1	12/11/74	2	1		57	N	
1	12/11/74	3	1		52	N	
1	12/11/74	4	1		52	N	
1	12/11/74	5	1		52	N	
1	12/11/74	6	1		52	N	
1	12/11/74	7	1		57	N	
1	12/11/74	8	1		50	N	
1	12/11/74	9	1		50	N	
1	12/11/74	10	1		52	N	
1	12/11/74	11	1		52	N	
1	12/11/74	12	1		54	N	
1	4/24/75	1	1		63	Y	
1	4/24/75	2	1		61	N	
1	4/24/75	3	1		61	N	
1	4/24/75	4	1		61	N	
1	4/24/75	5	1		61	N	
1	4/24/75	6	1		63	N	
1	4/24/75	7	1		63	N	
1	4/24/75	8	1		63	N	
1	4/24/75	9	1		63	N	
1	4/24/75	10	1		61	N	
1	4/24/75	11	1		63	N	
1	4/24/75	12	1		63	N	
1	7/31/75	1	1		69	N	
1	7/31/75	2	1		66	N	
1	7/31/75	3	1		66	N	
1	7/31/75	4	1		67	N	
1	7/31/75	5	1		70	N	
1	7/31/75	6	1		70	N	
1	7/31/75	7	1		71	Y	
1	7/31/75	8	1		69	N	
1	7/31/75	9	1		71	N	
1	7/31/75	10	1		69	N	
1	7/31/75	11	1		69	N	
1	7/31/75	12	1		69	N	
1	1/7/76	1	1		78	Y	
1	1/7/76	2	1		76	N	
1	1/7/76	3	1		73	N	
1	1/7/76	4	1		73	N	
1	1/7/76	5	1		76	N	
1	1/7/76	6	1		73	N	
1	1/7/76	7	1		76	N	
1	1/7/76	8	1		73	N	
1	1/7/76	9	1		76	N	
1	1/7/76	10	1		73	N	
1	1/7/76	11	1		74	N	
1	1/7/76	12	1		74	N	
1	4/1/76	1	1		70	Y	
1	4/1/76	2	1		67	N	
1	4/1/76	3	1		65	N	
1	4/1/76	4	1		65	N	
1	4/1/76	5	1		65	N	
1	4/1/76	6	1		65	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-106							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/1/76	7	1		68	N	
1	4/1/76	8	1		66	N	
1	4/1/76	9	1		68	N	
1	4/1/76	10	1		65	N	
1	4/1/76	11	1		65	N	
1	4/1/76	12	1		65	N	
1	11/7/76	1	1		68	N	
1	11/7/76	2	1		69	N	
1	11/7/76	3	1		69	N	
1	11/7/76	4	1		69	N	
1	11/7/76	5	1		69	N	
1	11/7/76	6	1		69	N	
1	11/7/76	7	1		70	N	
1	11/7/76	8	1		70	N	
1	11/7/76	9	1		70	N	
1	11/7/76	10	1		70	N	
1	11/7/76	11	1		70	N	
1	11/7/76	12	1		71	Y	
1	1/3/77	1	1		82	Y	
1	1/3/77	2	1		79	N	
1	1/3/77	3	1		77	N	
1	1/3/77	4	1		77	N	
1	1/3/77	5	1		77	N	
1	1/3/77	6	1		77	N	
1	1/3/77	7	1		78	N	
1	1/3/77	8	1		78	N	
1	1/3/77	9	1		78	N	
1	1/3/77	10	1		78	N	
1	1/3/77	11	1		78	N	
1	1/3/77	12	1		78	N	
1	4/26/77	1	1		59	Y	
1	4/26/77	2	1		57	N	
1	4/26/77	3	1		58	N	
1	4/26/77	4	1		57	N	
1	4/26/77	5	1		57	N	
1	4/26/77	6	1		56	N	
1	4/26/77	7	1		58	N	
1	4/26/77	8	1		57	N	
1	4/26/77	9	1		59	N	
1	4/26/77	10	1		57	N	
1	4/26/77	11	1		57	N	
1	4/26/77	12	1		56	N	
1	7/28/77	1	1		60	N	
1	7/28/77	2	1		61	N	
1	7/28/77	3	1		64	N	
1	7/28/77	4	1		62	N	
1	7/28/77	5	1		64	N	
1	7/28/77	6	1		69	N	
1	7/28/77	7	1		70	Y	
1	7/28/77	8	1		62	N	
1	7/28/77	9	1		64	N	
1	7/28/77	10	1		62	N	
1	7/28/77	11	1		62	N	
1	7/28/77	12	1		62	N	
1	10/7/77	1	1		70	N	
1	10/7/77	2	1		70	N	
1	10/7/77	3	1		71	N	
1	10/7/77	4	1		71	N	
1	10/7/77	5	1		71	N	
1	10/7/77	6	1		71	N	
1	10/7/77	7	1		72	Y	
1	10/7/77	8	1		72	N	
1	10/7/77	9	1		72	N	
1	10/7/77	10	1		72	N	
1	10/7/77	11	1		71	N	
1	10/7/77	12	1		72	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-106 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/16/78	1	1		76	Y	
1	1/16/78	2	1		73	N	
1	1/16/78	3	1		70	N	
1	1/16/78	4	1		71	N	
1	1/16/78	5	1		71	N	
1	1/16/78	6	1		71	N	
1	1/16/78	7	1		71	N	
1	1/16/78	8	1		71	N	
1	1/16/78	9	1		71	N	
1	1/16/78	10	1		71	N	
1	1/16/78	11	1		71	N	
1	4/23/78	1	1		75	Y	
1	4/23/78	2	1		73	N	
1	4/23/78	3	1		74	N	
1	4/23/78	4	1		71	N	
1	4/23/78	5	1		71	N	
1	4/23/78	6	1		71	N	
1	4/23/78	7	1		73	N	
1	4/23/78	8	1		72	N	
1	4/23/78	9	1		72	N	
1	4/23/78	10	1		71	N	
1	4/23/78	11	1		71	N	
1	4/23/78	12	1		71	N	
1	7/16/78	1	1		68	N	
1	7/16/78	2	1		69	N	
1	7/16/78	3	1		70	Y	
1	7/16/78	4	1		70	N	
1	7/16/78	5	1		69	N	
1	7/16/78	6	1		70	N	
1	7/16/78	7	1		70	N	
1	7/16/78	8	1		70	N	
1	7/16/78	9	1		70	N	
1	7/16/78	10	1		70	N	
1	7/16/78	11	1		70	N	
1	7/16/78	12	1		70	N	
1	1/9/79	1	1		68	Y	
1	1/9/79	2	1		67	N	
1	1/9/79	3	1		66	N	
1	1/9/79	4	1		65	N	
1	1/9/79	5	1		64	N	
1	1/9/79	6	1		63	N	
1	1/9/79	7	1		63	N	
1	1/9/79	8	1		63	N	
1	1/9/79	9	1		63	N	
1	1/9/79	10	1		63	N	
1	1/9/79	11	1		63	N	
1	1/9/79	12	1		63	N	
1	4/8/79	1	1		83	Y	
1	4/8/79	2	1		80	N	
1	4/8/79	3	1		79	N	
1	4/8/79	4	1		78	N	
1	4/8/79	5	1		78	N	
1	4/8/79	6	1		78	N	
1	4/8/79	7	1		78	N	
1	4/8/79	8	1		78	N	
1	4/8/79	9	1		78	N	
1	4/8/79	10	1		78	N	
1	4/8/79	11	1		78	N	
1	4/8/79	12	1		77	N	
1	7/23/79	1	1		54	N	
1	7/23/79	2	1		54	N	
1	7/23/79	3	1		55	N	
1	7/23/79	4	1		55	N	
1	7/23/79	5	1		55	N	
1	7/23/79	6	1		56	Y	
1	7/23/79	7	1		56	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-106							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/23/79	8	1		56	N	
1	7/23/79	9	1		56	N	
1	7/23/79	10	1		56	N	
1	7/23/79	11	1		56	N	
1	7/23/79	12	1		56	N	
1	3/12/80	1	1		53	N	
1	3/12/80	2	1		55	N	
1	3/12/80	3	1		55	N	
1	3/12/80	4	1		55	N	
1	3/12/80	5	1		53	N	
1	3/12/80	6	1		55	N	
1	3/12/80	7	1		53	N	
1	3/12/80	8	1		55	N	
1	3/12/80	9	1		53	N	
1	3/12/80	10	1		53	N	
1	3/12/80	11	1		53	N	
1	3/12/80	12	1		57	Y	
1	3/12/80	13	1		56	N	
1	1/1/82	1	1		86	Y	
1	1/1/82	2	1		81	N	
1	1/1/82	3	1		80	N	
1	1/1/82	4	1		80	N	
1	1/1/82	5	1		76	N	
1	1/1/82	6	1		80	N	
1	1/1/82	7	1		80	N	
1	1/1/82	8	1		80	N	
1	1/1/82	9	1		80	N	
1	1/1/82	10	1		80	N	
1	1/1/82	11	1		80	N	
1	1/1/82	12	1		80	N	
1	4/16/82	1	1		59	Y	
1	4/16/82	2	1		56	N	
1	4/16/82	3	1		55	N	
1	4/16/82	4	1		55	N	
1	4/16/82	5	1		43	N	
1	4/16/82	6	1		55	N	
1	4/16/82	7	1		55	N	
1	4/16/82	8	1		55	N	
1	4/16/82	9	1		55	N	
1	4/16/82	10	1		55	N	
1	4/16/82	11	1		55	N	
1	4/16/82	12	1		55	N	
1	2/11/84	2	1		61	Y	
1	2/11/84	3	1		60	N	
1	2/11/84	4	1		60	N	
1	2/11/84	5	1		60	N	
1	2/11/84	6	1		60	N	
1	2/11/84	7	1		60	N	
1	2/11/84	8	1		60	N	
1	2/11/84	9	1		60	N	
1	2/11/84	10	1		60	N	
1	2/11/84	11	1		59	N	
1	2/11/84	12	1		59	N	
1	7/5/89	3	1		106.1	N	
1	7/5/89	4	1		106.7	N	
1	7/5/89	5	1		105.8	N	
1	7/5/89	6	1		105.8	N	
1	7/5/89	7	1		105.8	N	
1	7/5/89	8	1		105.8	N	
1	7/5/89	9	1		105.8	N	
1	7/5/89	10	1		105.8	N	
1	7/5/89	11	1		105.6	N	
1	7/5/89	12	1		105.5	N	
1	1/1/90	3	1		63	N	
1	1/1/90	4	1		63	N	
1	1/1/90	5	1		63	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-106							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/90	6	1		63.1	N	
1	1/1/90	7	1		63.2	N	
1	1/1/90	8	1		63	N	
1	1/1/90	9	1		63.2	N	
1	1/1/90	10	1		63	N	
1	1/1/90	11	1		63	N	
1	11/12/91	3	1		66	N	
1	11/12/91	4	1		66	N	
1	11/12/91	5	1		66	N	
1	11/12/91	6	1		66	N	
1	11/12/91	7	1		66	N	
1	11/12/91	8	1		66	N	
1	11/12/91	9	1		66	N	
1	11/12/91	10	1		66	N	
1	11/12/91	11	1		66	N	
1	11/12/91	12	1		67	Y	
1	1/1/92	3	1		64.3	Y	J-900925741-79 TC #12 O/S
1	1/1/92	4	1		64.3	N	
1	1/1/92	5	1		64.3	N	
1	1/1/92	6	1		64.3	N	
1	1/1/92	7	1		64.3	N	
1	1/1/92	8	1		64.2	N	
1	1/1/92	9	1		64.2	N	
1	1/1/92	10	1		64.2	N	
1	1/1/92	11	1		64.2	N	
1	1/1/92	12	1		64.1	N	
1	7/2/92	3	1		60.8	N	J TI-041
1	7/2/92	4	1		61.2	N	
1	7/2/92	5	1		61.7	N	
1	7/2/92	6	1		62	N	
1	7/2/92	7	1		62.3	N	
1	7/2/92	8	1		62.7	N	
1	7/2/92	9	1		63.1	N	
1	7/2/92	10	1		63.3	N	
1	7/2/92	11	1		63.4	Y	
1	1/3/93	3	1		61	Y	J 890523512-47
1	1/3/93	4	1		60.8	N	
1	1/3/93	5	1		60.9	N	
1	1/3/93	6	1		60.9	N	
1	1/3/93	7	1		60.8	N	
1	1/3/93	8	1		60.8	N	
1	1/3/93	9	1		60.8	N	
1	1/3/93	10	1		60.8	N	
1	1/3/93	11	1		60.8	N	
1	1/3/93	12	1		59.8	N	
1	7/1/93	3	1		61.7	N	J 910126143-66
1	7/1/93	4	1		61.7	N	
1	7/1/93	5	1		61.8	N	
1	7/1/93	6	1		61.8	N	
1	7/1/93	7	1		61.8	N	
1	7/1/93	8	1		61.8	N	
1	7/1/93	9	1		61.8	N	
1	7/1/93	10	1		61.9	N	
1	7/1/93	11	1		61.9	N	
1	7/1/93	12	1		61.8	N	
319 Records selected.							

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	1	1		74	Y	
1	5/21/75	2	1		72	N	
1	5/21/75	3	1		71	N	
1	5/21/75	4	1		70	N	
1	5/21/75	5	1		70	N	
1	5/21/75	6	1		69	N	
1	5/21/75	7	1		69	N	
1	5/21/75	8	1		69	N	
1	5/21/75	9	1		69	N	
1	5/21/75	10	1		69	N	
1	5/21/75	11	1		69	N	
1	5/28/75	1	1		63	Y	
1	5/28/75	2	1		62	N	
1	5/28/75	3	1		60	N	
1	5/28/75	4	1		60	N	
1	5/28/75	5	1		60	N	
1	5/28/75	6	1		60	N	
1	5/28/75	7	1		60	N	
1	5/28/75	8	1		60	N	
1	5/28/75	9	1		60	N	
1	5/28/75	10	1		60	N	
1	5/28/75	11	1		59	N	
1	6/2/75	1	1		62	Y	
1	6/2/75	2	1		61	N	
1	6/2/75	3	1		60	N	
1	6/2/75	4	1		59	N	
1	6/2/75	5	1		59	N	
1	6/2/75	6	1		59	N	
1	6/2/75	7	1		59	N	
1	6/2/75	8	1		59	N	
1	6/2/75	9	1		59	N	
1	6/2/75	10	1		59	N	
1	6/2/75	11	1		59	N	
1	6/4/75	1	1		62	Y	
1	6/4/75	2	1		61	N	
1	6/4/75	3	1		60	N	
1	6/4/75	4	1		59	N	
1	6/4/75	5	1		60	N	
1	6/4/75	6	1		60	N	
1	6/4/75	7	1		60	N	
1	6/4/75	8	1		60	N	
1	6/4/75	9	1		60	N	
1	6/4/75	10	1		60	N	
1	6/4/75	11	1		59	N	
1	6/11/75	1	1		65	Y	
1	6/11/75	2	1		64	N	
1	6/11/75	3	1		63	N	
1	6/11/75	4	1		62	N	
1	6/11/75	5	1		62	N	
1	6/11/75	6	1		62	N	
1	6/11/75	7	1		62	N	
1	6/11/75	8	1		63	N	
1	6/11/75	9	1		63	N	
1	6/11/75	10	1		63	N	
1	6/11/75	11	1		62	N	
1	6/18/75	1	1		72	Y	
1	6/18/75	2	1		71	N	
1	6/18/75	3	1		70	N	
1	6/18/75	4	1		69	N	
1	6/18/75	5	1		68	N	
1	6/18/75	6	1		67	N	
1	6/18/75	7	1		67	N	
1	6/18/75	8	1		67	N	
1	6/18/75	9	1		67	N	
1	6/18/75	10	1		67	N	
1	6/18/75	11	1		66	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/25/75	1	1		68	Y	
1	6/25/75	2	1		67	N	
1	6/25/75	3	1		66	N	
1	6/25/75	4	1		66	N	
1	6/25/75	5	1		66	N	
1	6/25/75	6	1		66	N	
1	6/25/75	7	1		66	N	
1	6/25/75	8	1		66	N	
1	6/25/75	9	1		66	N	
1	6/25/75	10	1		66	N	
1	6/25/75	11	1		66	N	
1	7/2/75	1	1		72	Y	
1	7/2/75	2	1		70	N	
1	7/2/75	3	1		70	N	
1	7/2/75	4	1		69	N	
1	7/2/75	5	1		69	N	
1	7/2/75	6	1		69	N	
1	7/2/75	7	1		69	N	
1	7/2/75	8	1		69	N	
1	7/2/75	9	1		69	N	
1	7/2/75	10	1		69	N	
1	7/2/75	11	1		69	N	
1	7/31/75	1	1		67	Y	
1	7/31/75	2	1		65	N	
1	7/31/75	3	1		66	N	
1	7/31/75	4	1		67	N	
1	7/31/75	5	1		67	N	
1	7/31/75	6	1		67	N	
1	7/31/75	7	1		67	N	
1	7/31/75	8	1		67	N	
1	7/31/75	9	1		67	N	
1	7/31/75	10	1		67	N	
1	7/31/75	11	1		67	N	
1	9/7/75	1	1		66	N	
1	9/7/75	2	1		67	N	
1	9/7/75	3	1		68	N	
1	9/7/75	4	1		69	N	
1	9/7/75	5	1		69	N	
1	9/7/75	6	1		69	N	
1	9/7/75	7	1		69	N	
1	9/7/75	8	1		69	N	
1	9/7/75	9	1		69	N	
1	9/7/75	10	1		69	N	
1	9/7/75	11	1		70	Y	
1	1/7/76	1	1		78	Y	
1	1/7/76	2	1		77	N	
1	1/7/76	3	1		76	N	
1	1/7/76	4	1		74	N	
1	1/7/76	5	1		74	N	
1	1/7/76	6	1		74	N	
1	1/7/76	7	1		74	N	
1	1/7/76	8	1		74	N	
1	1/7/76	9	1		74	N	
1	1/7/76	10	1		74	N	
1	1/7/76	11	1		71	N	
1	4/1/76	1	1		57	N	
1	4/1/76	2	1		66	Y	
1	4/1/76	3	1		64	N	
1	4/1/76	4	1		62	N	
1	4/1/76	5	1		63	N	
1	4/1/76	6	1		63	N	
1	4/1/76	7	1		63	N	
1	4/1/76	8	1		63	N	
1	4/1/76	9	1		63	N	
1	4/1/76	10	1		63	N	
1	4/1/76	11	1		60	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	6/21/76	1	1		60	Y	
1	6/21/76	2	1		59	N	
1	6/21/76	3	1		59	N	
1	6/21/76	4	1		59	N	
1	6/21/76	5	1		58	N	
1	6/21/76	6	1		58	N	
1	6/21/76	7	1		58	N	
1	6/21/76	8	1		58	N	
1	6/21/76	9	1		58	N	
1	6/21/76	10	1		58	N	
1	6/21/76	11	1		58	N	
1	11/7/76	1	1		67	N	
1	11/7/76	2	1		67	N	
1	11/7/76	3	1		68	N	
1	11/7/76	4	1		68	N	
1	11/7/76	5	1		69	Y	
1	11/7/76	6	1		69	N	
1	11/7/76	7	1		69	N	
1	11/7/76	8	1		69	N	
1	11/7/76	9	1		69	N	
1	11/7/76	10	1		69	N	
1	11/7/76	11	1		69	N	
1	1/7/77	1	1		80	N	
1	1/7/77	2	1		86	N	
1	1/7/77	3	1		83	N	
1	1/7/77	4	1		87	Y	
1	1/7/77	5	1		87	N	
1	1/7/77	6	1		82	N	
1	1/7/77	7	1		81	N	
1	1/7/77	8	1		80	N	
1	1/7/77	9	1		80	N	
1	1/7/77	10	1		80	N	
1	1/7/77	11	1		78	N	
1	2/26/77	1	1		79	Y	
1	2/26/77	2	1		77	N	
1	2/26/77	3	1		75	N	
1	2/26/77	4	1		74	N	
1	2/26/77	5	1		73	N	
1	2/26/77	6	1		73	N	
1	2/26/77	7	1		73	N	
1	2/26/77	8	1		73	N	
1	2/26/77	9	1		73	N	
1	2/26/77	10	1		73	N	
1	2/26/77	11	1		71	N	
1	4/26/77	1	1		58	Y	
1	4/26/77	2	1		57	N	
1	4/26/77	3	1		55	N	
1	4/26/77	4	1		54	N	
1	4/26/77	5	1		54	N	
1	4/26/77	6	1		54	N	
1	4/26/77	7	1		55	N	
1	4/26/77	8	1		55	N	
1	4/26/77	9	1		55	N	
1	4/26/77	10	1		55	N	
1	4/26/77	11	1		54	N	
1	6/30/77	1	1		62	Y	
1	6/30/77	2	1		60	N	
1	6/30/77	3	1		60	N	
1	6/30/77	4	1		60	N	
1	6/30/77	5	1		61	N	
1	6/30/77	6	1		61	N	
1	6/30/77	7	1		61	N	
1	6/30/77	8	1		60	N	
1	6/30/77	9	1		60	N	
1	6/30/77	10	1		60	N	
1	6/30/77	11	1		60	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/28/77	1	1		59	N	
1	7/28/77	2	1		58	N	
1	7/28/77	3	1		59	N	
1	7/28/77	4	1		60	N	
1	7/28/77	5	1		60	N	
1	7/28/77	6	1		60	N	
1	7/28/77	7	1		60	N	
1	7/28/77	8	1		60	N	
1	7/28/77	9	1		60	N	
1	7/28/77	10	1		60	N	
1	7/28/77	11	1		61	Y	
1	8/15/77	1	1		52	N	
1	8/15/77	2	1		52	N	
1	8/15/77	3	1		54	N	
1	8/15/77	4	1		55	N	
1	8/15/77	5	1		55	N	
1	8/15/77	6	1		55	N	
1	8/15/77	7	1		55	N	
1	8/15/77	8	1		55	N	
1	8/15/77	9	1		56	N	
1	8/15/77	10	1		56	N	
1	8/15/77	11	1		59	Y	
1	9/12/77	1	1		50	N	
1	9/12/77	2	1		51	N	
1	9/12/77	3	1		53	N	
1	9/12/77	4	1		53	N	
1	9/12/77	5	1		54	N	
1	9/12/77	6	1		54	N	
1	9/12/77	7	1		54	N	
1	9/12/77	8	1		54	N	
1	9/12/77	9	1		54	N	
1	9/12/77	10	1		54	N	
1	9/12/77	11	1		55	Y	
1	10/7/77	1	1		71	N	
1	10/7/77	2	1		72	N	
1	10/7/77	3	1		73	N	
1	10/7/77	4	1		74	N	
1	10/7/77	5	1		74	N	
1	10/7/77	6	1		74	N	
1	10/7/77	7	1		74	N	
1	10/7/77	8	1		74	N	
1	10/7/77	9	1		74	N	
1	10/7/77	10	1		75	Y	
1	10/7/77	11	1		75	N	
1	12/7/77	1	1		69	Y	
1	12/7/77	2	1		69	N	
1	12/7/77	3	1		66	N	
1	12/7/77	4	1		66	N	
1	12/7/77	5	1		66	N	
1	12/7/77	6	1		65	N	
1	12/7/77	7	1		65	N	
1	12/7/77	8	1		65	N	
1	12/7/77	9	1		65	N	
1	12/7/77	10	1		65	N	
1	12/7/77	11	1		64	N	
1	1/16/78	1	1		71	Y	
1	1/16/78	2	1		69	N	
1	1/16/78	3	1		67	N	
1	1/16/78	4	1		65	N	
1	1/16/78	5	1		65	N	
1	1/16/78	6	1		64	N	
1	1/16/78	7	1		64	N	
1	1/16/78	8	1		64	N	
1	1/16/78	9	1		64	N	
1	1/16/78	10	1		64	N	
1	1/16/78	11	1		60	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/23/78	1	1		82	Y	
1	4/23/78	2	1		82	N	
1	4/23/78	3	1		80	N	
1	4/23/78	4	1		79	N	
1	4/23/78	5	1		79	N	
1	4/23/78	6	1		79	N	
1	4/23/78	7	1		79	N	
1	4/23/78	8	1		78	N	
1	4/23/78	9	1		78	N	
1	4/23/78	10	1		78	N	
1	4/23/78	11	1		78	N	
1	4/25/78	1	1		69	Y	
1	4/25/78	2	1		68	N	
1	4/25/78	3	1		66	N	
1	4/25/78	4	1		65	N	
1	4/25/78	5	1		65	N	
1	4/25/78	6	1		65	N	
1	4/25/78	7	1		65	N	
1	4/25/78	8	1		65	N	
1	4/25/78	9	1		65	N	
1	4/25/78	10	1		65	N	
1	4/25/78	11	1		65	N	
1	5/19/78	1	1		65	Y	
1	5/19/78	2	1		64	N	
1	5/19/78	3	1		62	N	
1	5/19/78	4	1		62	N	
1	5/19/78	5	1		62	N	
1	5/19/78	6	1		62	N	
1	5/19/78	7	1		62	N	
1	5/19/78	8	1		62	N	
1	5/19/78	9	1		62	N	
1	5/19/78	10	1		62	N	
1	5/19/78	11	1		62	N	
1	5/19/78	12	1		62	N	
1	5/19/78	13	1		62	N	
1	6/19/78	1	1		60	Y	
1	6/19/78	2	1		59	N	
1	6/19/78	3	1		59	N	
1	6/19/78	4	1		59	N	
1	6/19/78	5	1		59	N	
1	6/19/78	6	1		59	N	
1	6/19/78	7	1		59	N	
1	6/19/78	8	1		59	N	
1	6/19/78	9	1		59	N	
1	6/19/78	10	1		59	N	
1	6/19/78	11	1		59	N	
1	6/19/78	12	1		59	N	
1	6/19/78	13	1		59	N	
1	7/16/78	1	1		68	N	
1	7/16/78	2	1		68	N	
1	7/16/78	3	1		68	N	
1	7/16/78	4	1		69	Y	
1	7/16/78	5	1		69	N	
1	7/16/78	6	1		69	N	
1	7/16/78	7	1		69	N	
1	7/16/78	8	1		69	N	
1	7/16/78	9	1		69	N	
1	7/16/78	10	1		69	N	
1	7/16/78	11	1		69	N	
1	7/16/78	12	1		69	N	
1	7/16/78	13	1		69	N	
1	8/13/78	1	1		62	N	
1	8/13/78	2	1		61	N	
1	8/13/78	3	1		62	N	
1	8/13/78	4	1		63	N	
1	8/13/78	5	1		63	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	8/13/78	6	1		63	N	
1	8/13/78	7	1		63	N	
1	8/13/78	8	1		63	N	
1	8/13/78	9	1		64	N	
1	8/13/78	10	1		64	N	
1	8/13/78	11	1		65	Y	
1	9/11/78	1	1		63	N	
1	9/11/78	2	1		64	N	
1	9/11/78	3	1		65	N	
1	9/11/78	4	1		66	N	
1	9/11/78	5	1		67	N	
1	9/11/78	6	1		67	N	
1	9/11/78	7	1		67	N	
1	9/11/78	8	1		67	N	
1	9/11/78	9	1		67	N	
1	9/11/78	10	1		68	N	
1	9/11/78	11	1		69	Y	
1	1/9/79	1	1		73	Y	
1	1/9/79	2	1		73	N	
1	1/9/79	3	1		71	N	
1	1/9/79	4	1		71	N	
1	1/9/79	5	1		70	N	
1	1/9/79	6	1		70	N	
1	1/9/79	7	1		70	N	
1	1/9/79	8	1		70	N	
1	1/9/79	9	1		70	N	
1	1/9/79	10	1		70	N	
1	1/9/79	11	1		68	N	
1	1/9/79	12	1		66	N	
1	4/8/79	1	1		82	Y	
1	4/8/79	2	1		79	N	
1	4/8/79	3	1		77	N	
1	4/8/79	4	1		76	N	
1	4/8/79	5	1		75	N	
1	4/8/79	6	1		75	N	
1	4/8/79	7	1		75	N	
1	4/8/79	8	1		75	N	
1	4/8/79	9	1		75	N	
1	4/8/79	10	1		75	N	
1	4/8/79	11	1		75	N	
1	7/23/79	1	1		53	N	
1	7/23/79	2	1		52	N	
1	7/23/79	3	1		52	N	
1	7/23/79	4	1		53	N	
1	7/23/79	5	1		53	N	
1	7/23/79	6	1		53	N	
1	7/23/79	7	1		53	N	
1	7/23/79	8	1		53	N	
1	7/23/79	9	1		53	N	
1	7/23/79	10	1		54	Y	
1	7/23/79	11	1		54	N	
1	3/12/80	1	1		52	N	
1	3/12/80	2	1		52	N	
1	3/12/80	3	1		52	N	
1	3/12/80	4	1		53	N	
1	3/12/80	5	1		53	N	
1	3/12/80	6	1		53	N	
1	3/12/80	7	1		54	Y	
1	3/12/80	8	1		54	N	
1	3/12/80	9	1		54	N	
1	3/12/80	10	1		54	N	
1	3/12/80	11	1		54	N	
1	3/12/80	12	1		54	N	
1	1/1/82	1	1		73	Y	
1	1/1/82	2	1		72	N	
1	1/1/82	4	1		70	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-107							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/82	5	1		70	N	
1	1/1/82	6	1		70	N	
1	1/1/82	7	1		70	N	
1	1/1/82	10	1		71	N	
1	1/1/82	11	1		68	N	
1	7/5/89	4	1		117.6	N	
1	7/5/89	5	1		120.2	N	
1	7/5/89	6	1		121	N	
1	7/5/89	7	1		121.7	N	
1	7/5/89	8	1		122.3	N	
1	7/5/89	9	1		122.9	N	
1	7/5/89	10	1		123.4	N	
1	7/5/89	11	1		123.5	Y	
1	1/1/90	4	1		64.1	Y	
1	1/1/90	5	1		64.1	N	
1	1/1/90	6	1		64.1	N	
1	1/1/90	7	1		64	N	
1	1/1/90	8	1		64	N	
1	1/1/90	9	1		64	N	
1	1/1/90	10	1		63.9	N	
1	1/1/90	11	1		61.4	N	
1	11/12/91	4	1		66	Y	J-TI-023 TC #2-3 O/S
1	11/12/91	5	1		66	N	
1	11/12/91	6	1		66	N	
1	11/12/91	7	1		66	N	
1	11/12/91	8	1		66	N	
1	11/12/91	9	1		66	N	
1	11/12/91	10	1		66	N	
1	11/12/91	11	1		66	N	
1	11/12/91	12	1		66	N	
1	1/4/92	4	1		61.7	N	J s910126143-50 HH-99A-J
1	1/4/92	5	1		61.9	N	
1	1/4/92	6	1		61.9	N	
1	1/4/92	7	1		62	N	
1	1/4/92	8	1		62	N	
1	1/4/92	9	1		62.1	Y	
1	1/4/92	10	1		62.1	N	
1	1/4/92	11	1		60	N	
1	7/2/92	1	1			N	UNABLE TO GET RDGS J-3 WRITTEN
1	11/4/92	1	1			N	#S&DA-92-488 NO RDGS SINCE JANUARY 1992
1	11/6/92	4	1		68.4	N	J 817-13-55-001
1	11/6/92	5	1		68.4	N	
1	11/6/92	6	1		68.4	N	
1	11/6/92	7	1		68.5	N	
1	11/6/92	8	1		68.5	N	
1	11/6/92	9	1		68.6	N	
1	11/6/92	10	1		68.6	N	
1	11/6/92	11	1		68.7	Y	
1	1/3/93	4	1		62.5	N	J 890523512-47
1	1/3/93	5	1		62.5	N	
1	1/3/93	6	1		62.6	N	
1	1/3/93	7	1		62.7	Y	
1	1/3/93	8	1		62.6	N	
1	1/3/93	9	1		62.6	N	
1	1/3/93	10	1		62.5	N	
1	1/3/93	11	1		59.8	N	
1	7/1/93	4	1		61.9	N	J 910126143-66
1	7/1/93	5	1		61.9	N	
1	7/1/93	6	1		61.8	N	
1	7/1/93	7	1		61.9	N	
1	7/1/93	8	1		61.9	N	
1	7/1/93	9	1		61.9	N	
1	7/1/93	10	1		61.9	N	
1	7/1/93	11	1		62.2	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-108 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/24/74	1	1		68	N	
1	9/24/74	2	1		68	N	
1	9/24/74	3	1		68	N	
1	9/24/74	4	1		68	N	
1	9/24/74	5	1		68	N	
1	9/24/74	6	1		68	N	
1	9/24/74	7	1		68	N	
1	9/24/74	8	1		68	N	
1	9/24/74	9	1		68	N	
1	9/24/74	10	1		70	Y	
1	9/24/74	11	1		70	N	
1	9/24/74	12	1		70	N	
1	12/11/74	1	1		75	Y	
1	12/11/74	3	1		63	N	
1	12/11/74	4	1		63	N	
1	12/11/74	5	1		63	N	
1	12/11/74	6	1		63	N	
1	12/11/74	8	1		73	Y	
1	12/11/74	9	1		72	N	
1	12/11/74	10	1		72	N	
1	12/11/74	11	1		73	N	
1	12/11/74	12	1		73	N	
1	4/24/75	1	1		73	Y	
1	4/24/75	3	1		72	N	
1	4/24/75	4	1		72	N	
1	4/24/75	5	1		72	N	
1	4/24/75	6	1		72	N	
1	4/24/75	8	1		72	N	
1	4/24/75	9	1		72	N	
1	4/24/75	10	1		72	N	
1	4/24/75	11	1		72	N	
1	4/24/75	12	1		72	N	
1	6/9/75	1	1		64	N	
1	6/9/75	3	1		66	Y	
1	6/9/75	4	1		66	N	
1	6/9/75	5	1		66	N	
1	6/9/75	6	1		66	N	
1	6/9/75	8	1		66	N	
1	6/9/75	9	1		66	N	
1	6/9/75	10	1		66	N	
1	6/9/75	11	1		66	N	
1	6/9/75	12	1		66	N	
1	7/31/75	1	1		76	N	
1	7/31/75	3	1		78	Y	
1	7/31/75	4	1		76	N	
1	7/31/75	5	1		76	N	
1	7/31/75	6	1		76	N	
1	7/31/75	8	1		77	N	
1	7/31/75	9	1		76	N	
1	7/31/75	10	1		76	N	
1	7/31/75	11	1		76	N	
1	7/31/75	12	1		76	N	
1	4/1/76	1	1		78	Y	
1	4/1/76	3	1		77	N	
1	4/1/76	4	1		75	N	
1	4/1/76	5	1		75	N	
1	4/1/76	6	1		75	N	
1	4/1/76	8	1		77	N	
1	4/1/76	9	1		75	N	
1	4/1/76	10	1		75	N	
1	4/1/76	11	1		75	N	
1	4/1/76	12	1		75	N	
1	7/9/76	1	1		70	N	
1	7/9/76	3	1		71	Y	
1	7/9/76	4	1		70	N	
1	7/9/76	5	1		70	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-108 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/9/76	6	1		70	N	
1	7/9/76	8	1		71	N	
1	7/9/76	9	1		70	N	
1	7/9/76	10	1		70	N	
1	7/9/76	11	1		70	N	
1	7/9/76	12	1		70	N	
1	11/7/76	1	1		75	N	
1	11/7/76	3	1		76	N	
1	11/7/76	4	1		76	N	
1	11/7/76	5	1		75	N	
1	11/7/76	6	1		76	N	
1	11/7/76	8	1		76	N	
1	11/7/76	9	1		76	N	
1	11/7/76	10	1		76	N	
1	11/7/76	11	1		76	N	
1	11/7/76	12	1		77	Y	
1	1/3/77	1	1		87	Y	
1	1/3/77	3	1		85	N	
1	1/3/77	4	1		84	N	
1	1/3/77	5	1		84	N	
1	1/3/77	6	1		84	N	
1	1/3/77	8	1		85	N	
1	1/3/77	9	1		84	N	
1	1/3/77	10	1		84	N	
1	1/3/77	11	1		84	N	
1	1/3/77	12	1		84	N	
1	4/20/77	1	1		60	Y	
1	4/20/77	3	1		60	N	
1	4/20/77	4	1		59	N	
1	4/20/77	5	1		59	N	
1	4/20/77	6	1		59	N	
1	4/20/77	8	1		59	N	
1	4/20/77	9	1		59	N	
1	4/20/77	10	1		58	N	
1	4/20/77	11	1		58	N	
1	4/20/77	12	1		58	N	
1	7/28/77	1	1		61	N	
1	7/28/77	3	1		63	N	
1	7/28/77	4	1		62	N	
1	7/28/77	5	1		62	N	
1	7/28/77	6	1		66	Y	
1	7/28/77	7	1		62	N	
1	7/28/77	8	1		62	N	
1	7/28/77	9	1		62	N	
1	7/28/77	10	1		62	N	
1	7/28/77	11	1		62	N	
1	7/28/77	12	1		62	N	
1	10/7/77	1	1		74	N	
1	10/7/77	3	1		75	Y	
1	10/7/77	4	1		74	N	
1	10/7/77	5	1		74	N	
1	10/7/77	6	1		74	N	
1	10/7/77	7	1		75	N	
1	10/7/77	8	1		74	N	
1	10/7/77	9	1		74	N	
1	10/7/77	10	1		74	N	
1	10/7/77	11	1		74	N	
1	10/7/77	12	1		75	N	
1	1/16/78	1	1		68	Y	
1	1/16/78	3	1		66	N	
1	1/16/78	4	1		68	N	
1	1/16/78	5	1		66	N	
1	1/16/78	6	1		66	N	
1	1/16/78	7	1		66	N	
1	1/16/78	8	1		66	N	
1	1/16/78	9	1		66	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-108							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/16/78	10	1		67	N	
1	1/16/78	11	1		66	N	
1	4/23/78	1	1		83	Y	
1	4/23/78	3	1		81	N	
1	4/23/78	4	1		80	N	
1	4/23/78	5	1		79	N	
1	4/23/78	6	1		79	N	
1	4/23/78	8	1		80	N	
1	4/23/78	9	1		80	N	
1	4/23/78	10	1		78	N	
1	4/23/78	11	1		77	N	
1	4/23/78	12	1		80	N	
1	7/16/78	1	1		71	N	
1	7/16/78	3	1		72	Y	
1	7/16/78	4	1		71	N	
1	7/16/78	5	1		71	N	
1	7/16/78	6	1		71	N	
1	7/16/78	8	1		72	N	
1	7/16/78	9	1		71	N	
1	7/16/78	10	1		71	N	
1	7/16/78	11	1		71	N	
1	7/16/78	12	1		72	N	
1	1/9/79	1	1		70	Y	
1	1/9/79	2	1		65	N	
1	1/9/79	3	1		67	N	
1	1/9/79	4	1		67	N	
1	1/9/79	5	1		67	N	
1	1/9/79	6	1		63	N	
1	1/9/79	7	1		63	N	
1	1/9/79	8	1		62	N	
1	1/9/79	9	1		50	N	
1	1/9/79	10	1		66	N	
1	1/9/79	11	1		67	N	
1	1/9/79	12	1		67	N	
1	4/8/79	1	1		84	Y	
1	4/8/79	3	1		82	N	
1	4/8/79	4	1		83	N	
1	4/8/79	5	1		81	N	
1	4/8/79	6	1		81	N	
1	4/8/79	8	1		82	N	
1	4/8/79	9	1		81	N	
1	4/8/79	10	1		80	N	
1	4/8/79	11	1		80	N	
1	4/8/79	12	1		80	N	
1	7/23/79	1	1		56	N	
1	7/23/79	3	1		57	N	
1	7/23/79	4	1		56	N	
1	7/23/79	5	1		56	N	
1	7/23/79	6	1		56	N	
1	7/23/79	7	1		56	N	
1	7/23/79	8	1		56	N	
1	7/23/79	9	1		56	N	
1	7/23/79	10	1		57	N	
1	7/23/79	11	1		58	Y	
1	7/23/79	12	1		58	N	
1	3/12/80	1	1		55	N	
1	3/12/80	3	1		57	Y	
1	3/12/80	4	1		53	N	
1	3/12/80	5	1		53	N	
1	3/12/80	6	1		53	N	
1	3/12/80	7	1		53	N	
1	3/12/80	8	1		53	N	
1	3/12/80	9	1		53	N	
1	3/12/80	10	1		53	N	
1	3/12/80	11	1		53	N	
1	3/12/80	12	1		54	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-108							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/82	1	1		83	Y	
1	1/1/82.	3	1		81	N	
1	1/1/82	4	1		81	N	
1	1/1/82	5	1		81	N	
1	1/1/82	6	1		81	N	
1	1/1/82	8	1		81	N	
1	1/1/82	9	1		81	N	
1	1/1/82	10	1		81	N	
1	1/1/82	11	1		80	N	
1	1/1/82	12	1		80	N	
1	4/16/82	1	1		60	Y	
1	4/16/82	3	1		58	N	
1	4/16/82	4	1		56	N	
1	4/16/82	5	1		56	N	
1	4/16/82	6	1		56	N	
1	4/16/82	8	1		58	N	
1	4/16/82	9	1		57	N	
1	4/16/82	10	1		57	N	
1	4/16/82	11	1		56	N	
1	4/16/82	12	1		56	N	
1	2/11/84	1	1		64	Y	
1	2/11/84	3	1		60	N	
1	2/11/84	4	1		60	N	
1	2/11/84	5	1		60	N	
1	2/11/84	6	1		60	N	
1	2/11/84	8	1		60	N	
1	2/11/84	9	1		60	N	
1	2/11/84	10	1		60	N	
1	2/11/84	11	1		60	N	
1	2/11/84	12	1		60	N	
1	7/5/89	1	1		100.4	N	
1	7/5/89	3	1		100	N	
1	7/5/89	4	1		100.1	N	
1	7/5/89	5	1		100.4	N	
1	7/5/89	6	1		100.8	N	
1	7/5/89	8	1		101.6	N	
1	7/5/89	9	1		101.9	N	
1	7/5/89	10	1		101.9	Y	
1	7/5/89	11	1		101.8	N	
1	7/5/89	12	1		101.7	N	
1	1/1/90	1	1		65	Y	
1	1/1/90	3	1		62	N	
1	1/1/90	4	1		61	N	
1	1/1/90	5	1		61	N	
1	1/1/90	6	1		61	N	
1	1/1/90	8	1		61	N	
1	1/1/90	9	1		60	N	
1	1/1/90	10	1		60	N	
1	1/1/90	11	1		60	N	
1	1/1/90	12	1		59	N	
1	11/12/91	1	1		66	Y	J-TI-023 TC #27 O/S
1	11/12/91	3	1		66	N	
1	11/12/91	4	1		66	N	
1	11/12/91	5	1		66	N	
1	11/12/91	6	1		66	N	
1	11/12/91	8	1		66	N	
1	11/12/91	9	1		66	N	
1	11/12/91	10	1		66	N	
1	11/12/91	11	1		66	N	
1	11/12/91	12	1		66	N	
1	1/1/92	1	1		65.4	Y	J-900925741-79 TC #27 O/S
1	1/1/92	3	1		64.3	N	
1	1/1/92	4	1		64.3	N	
1	1/1/92	5	1		64.3	N	
1	1/1/92	6	1		64.3	N	
1	1/1/92	8	1		64.2	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-108							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/92	9	1		64.2	N	
1	1/1/92	10	1		64.2	N	
1	1/1/92	11	1		64.1	N	
1	1/1/92	12	1		63.9	N	
1	7/2/92	1	1		60.7	N	J TI-041
1	7/2/92	3	1		61.1	N	
1	7/2/92	4	1		61.1	N	
1	7/2/92	5	1		61.1	N	
1	7/2/92	6	1		61.2	N	
1	7/2/92	8	1		61.5	N	
1	7/2/92	9	1		61.7	N	
1	7/2/92	10	1		61.9	N	
1	7/2/92	11	1		62.1	N	
1	7/2/92	12	1		62.3	Y	
1	1/3/93	1	1		62	Y	J 890523512-47
1	1/3/93	3	1		60.7	N	
1	1/3/93	4	1		60.7	N	
1	1/3/93	5	1		60.7	N	
1	1/3/93	6	1		60.7	N	
1	1/3/93	8	1		60.6	N	
1	1/3/93	9	1		60.6	N	
1	1/3/93	10	1		60.7	N	
1	1/3/93	11	1		60.6	N	
1	1/3/93	12	1		60.4	N	
1	7/1/93	1	1		61.7	N	J 910126143-66
1	7/1/93	3	1		61.7	N	
1	7/1/93	4	1		61.7	N	
1	7/1/93	5	1		61.7	N	
1	7/1/93	6	1		61.7	N	
1	7/1/93	8	1		61.6	N	
1	7/1/93	9	1		61.7	N	
1	7/1/93	10	1		61.7	N	
1	7/1/93	11	1		61.8	N	
1	7/1/93	12	1		61.8	N	
298 Records selected.							

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-109							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/24/74	1	1		70	N	
1	4/24/74	2	1		72	Y	
1	4/24/74	3	1		72	N	
1	4/24/74	4	1		72	N	
1	4/24/74	5	1		72	N	
1	4/24/74	6	1		72	N	
1	4/24/74	7	1		72	N	
1	4/24/74	8	1		72	N	
1	4/24/74	9	1		72	N	
1	4/24/74	10	1		72	N	
1	4/24/74	11	1		72	N	
1	4/24/74	12	1		72	N	
1	9/24/74	1	1		70	N	
1	9/24/74	2	1		72	Y	
1	9/24/74	3	1		72	N	
1	9/24/74	4	1		72	N	
1	9/24/74	5	1		72	N	
1	9/24/74	6	1		72	N	
1	9/24/74	7	1		72	N	
1	9/24/74	8	1		72	N	
1	9/24/74	9	1		72	N	
1	9/24/74	10	1		72	N	
1	9/24/74	11	1		72	N	
1	9/24/74	12	1		72	N	
1	12/11/74	1	1		77	Y	
1	12/11/74	2	1		77	N	
1	12/11/74	3	1		77	N	
1	12/11/74	4	1		77	N	
1	12/11/74	5	1		77	N	
1	12/11/74	6	1		75	N	
1	12/11/74	7	1		70	N	
1	12/11/74	8	1		70	N	
1	12/11/74	9	1		70	N	
1	12/11/74	10	1		70	N	
1	12/11/74	11	1		70	N	
1	12/11/74	12	1		70	N	
1	4/9/75	1	1		72	Y	
1	4/9/75	2	1		72	N	
1	4/9/75	3	1		68	N	
1	4/9/75	4	1		68	N	
1	4/9/75	5	1		68	N	
1	4/9/75	6	1		68	N	
1	4/9/75	8	1		68	N	
1	4/9/75	9	1		68	N	
1	4/9/75	10	1		68	N	
1	4/9/75	11	1		68	N	
1	4/9/75	12	1		68	N	
1	6/9/75	1	1		72	N	
1	6/9/75	2	1		72	N	
1	6/9/75	3	1		72	N	
1	6/9/75	4	1		73	Y	
1	6/9/75	5	1		73	N	
1	6/9/75	6	1		70	N	
1	6/9/75	7	1		68	N	
1	6/9/75	8	1		68	N	
1	6/9/75	9	1		68	N	
1	6/9/75	10	1		68	N	
1	6/9/75	11	1		68	N	
1	6/9/75	12	1		66	N	
1	7/31/75	1	1		77	Y	
1	7/31/75	2	1		77	N	
1	7/31/75	3	1		77	N	
1	7/31/75	4	1		77	N	
1	7/31/75	5	1		77	N	
1	7/31/75	6	1		76	N	
1	7/31/75	7	1		76	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-109							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/31/75	8	1		76	N	
1	7/31/75	9	1		76	N	
1	7/31/75	10	1		76	N	
1	7/31/75	11	1		76	N	
1	7/31/75	12	1		76	N	
1	1/7/76	1	1		86	Y	
1	1/7/76	2	1		83	N	
1	1/7/76	3	1		81	N	
1	1/7/76	4	1		81	N	
1	1/7/76	5	1		82	N	
1	1/7/76	6	1		82	N	
1	1/7/76	7	1		82	N	
1	1/7/76	8	1		82	N	
1	1/7/76	9	1		82	N	
1	1/7/76	10	1		82	N	
1	1/7/76	11	1		82	N	
1	1/7/76	12	1		82	N	
1	4/1/76	1	1		81	Y	
1	4/1/76	2	1		81	N	
1	4/1/76	3	1		80	N	
1	4/1/76	4	1		77	N	
1	4/1/76	5	1		74	N	
1	4/1/76	6	1		74	N	
1	4/1/76	7	1		74	N	
1	4/1/76	8	1		74	N	
1	4/1/76	9	1		74	N	
1	4/1/76	10	1		74	N	
1	4/1/76	11	1		74	N	
1	4/1/76	12	1		73	N	
1	7/9/76	1	1		71	Y	
1	7/9/76	2	1		71	N	
1	7/9/76	3	1		71	N	
1	7/9/76	4	1		70	N	
1	7/9/76	5	1		69	N	
1	7/9/76	6	1		69	N	
1	7/9/76	7	1		69	N	
1	7/9/76	8	1		69	N	
1	7/9/76	9	1		69	N	
1	7/9/76	10	1		69	N	
1	7/9/76	11	1		69	N	
1	7/9/76	12	1		69	N	
1	11/7/76	1	1		77	N	
1	11/7/76	2	1		78	N	
1	11/7/76	3	1		79	Y	
1	11/7/76	4	1		77	N	
1	11/7/76	5	1		76	N	
1	11/7/76	6	1		76	N	
1	11/7/76	7	1		76	N	
1	11/7/76	8	1		77	N	
1	11/7/76	9	1		76	N	
1	11/7/76	10	1		77	N	
1	11/7/76	11	1		77	N	
1	11/7/76	12	1		77	N	
1	1/3/77	1	1		90	N	
1	1/3/77	2	1		91	Y	
1	1/3/77	3	1		90	N	
1	1/3/77	4	1		86	N	
1	1/3/77	5	1		82	N	
1	1/3/77	6	1		83	N	
1	1/3/77	7	1		83	N	
1	1/3/77	8	1		83	N	
1	1/3/77	9	1		83	N	
1	1/3/77	10	1		83	N	
1	1/3/77	11	1		83	N	
1	1/3/77	12	1		83	N	
1	4/26/77	1	1		67	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-109							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/26/77	2	1		67	N	
1	4/26/77	3	1		67	N	
1	4/26/77	4	1		63	N	
1	4/26/77	5	1		62	N	
1	4/26/77	6	1		61	N	
1	4/26/77	7	1		61	N	
1	4/26/77	8	1		61	N	
1	4/26/77	9	1		61	N	
1	4/26/77	10	1		61	N	
1	4/26/77	11	1		61	N	
1	4/26/77	12	1		61	N	
1	8/28/77	1	1		65	N	
1	8/28/77	2	1		65	N	
1	8/28/77	3	1		66	N	
1	8/28/77	4	1		65	N	
1	8/28/77	5	1		65	N	
1	8/28/77	6	1		65	N	
1	8/28/77	7	1		65	N	
1	8/28/77	8	1		65	N	
1	8/28/77	9	1		65	N	
1	8/28/77	10	1		65	N	
1	8/28/77	11	1		69	Y	
1	8/28/77	12	1		69	N	
1	10/7/77	1	1		75	N	
1	10/7/77	2	1		75	N	
1	10/7/77	3	1		75	N	
1	10/7/77	4	1		75	N	
1	10/7/77	5	1		75	N	
1	10/7/77	6	1		75	N	
1	10/7/77	7	1		76	Y	
1	10/7/77	8	1		76	N	
1	10/7/77	9	1		76	N	
1	10/7/77	10	1		76	N	
1	10/7/77	11	1		76	N	
1	10/7/77	12	1		76	N	
1	1/16/78	1	1		72	Y	
1	1/16/78	2	1		70	N	
1	1/16/78	3	1		68	N	
1	1/16/78	4	1		69	N	
1	1/16/78	5	1		69	N	
1	1/16/78	6	1		69	N	
1	1/16/78	7	1		69	N	
1	1/16/78	8	1		69	N	
1	1/16/78	9	1		69	N	
1	1/16/78	10	1		69	N	
1	1/16/78	11	1		61	N	
1	4/23/78	1	1		83	Y	
1	4/23/78	2	1		81	N	
1	4/23/78	3	1		80	N	
1	4/23/78	4	1		80	N	
1	4/23/78	5	1		80	N	
1	4/23/78	6	1		80	N	
1	4/23/78	7	1		80	N	
1	4/23/78	8	1		80	N	
1	4/23/78	9	1		80	N	
1	4/23/78	10	1		80	N	
1	4/23/78	11	1		80	N	
1	4/23/78	12	1		80	N	
1	7/18/78	1	1		71	N	
1	7/18/78	2	1		71	N	
1	7/18/78	3	1		72	Y	
1	7/18/78	4	1		72	N	
1	7/18/78	5	1		72	N	
1	7/18/78	6	1		72	N	
1	7/18/78	7	1		71	N	
1	7/18/78	8	1		72	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-109							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/18/78	9	1		72	N	
1	7/18/78	10	1		72	N	
1	7/18/78	11	1		72	N	
1	7/18/78	12	1		72	N	
1	1/9/79	1	1		69	Y	
1	1/9/79	2	1		68	N	
1	1/9/79	3	1		66	N	
1	1/9/79	4	1		66	N	
1	1/9/79	5	1		66	N	
1	1/9/79	6	1		66	N	
1	1/9/79	7	1		66	N	
1	1/9/79	8	1		66	N	
1	1/9/79	9	1		66	N	
1	1/9/79	10	1		66	N	
1	1/9/79	11	1		66	N	
1	1/9/79	12	1		66	N	
1	4/8/79	1	1		84	Y	
1	4/8/79	2	1		82	N	
1	4/8/79	3	1		80	N	
1	4/8/79	4	1		80	N	
1	4/8/79	5	1		80	N	
1	4/8/79	6	1		80	N	
1	4/8/79	7	1		80	N	
1	4/8/79	8	1		80	N	
1	4/8/79	9	1		80	N	
1	4/8/79	10	1		80	N	
1	4/8/79	11	1		80	N	
1	4/8/79	12	1		79	N	
1	7/23/79	1	1		55	N	
1	7/23/79	2	1		54	N	
1	7/23/79	3	1		54	N	
1	7/23/79	4	1		54	N	
1	7/23/79	5	1		55	N	
1	7/23/79	6	1		55	N	
1	7/23/79	7	1		56	N	
1	7/23/79	8	1		56	N	
1	7/23/79	9	1		57	Y	
1	7/23/79	10	1		57	N	
1	7/23/79	11	1		57	N	
1	7/23/79	12	1		57	N	
1	3/12/80	1	1		54	N	
1	3/12/80	2	1		54	N	
1	3/12/80	3	1		54	N	
1	3/12/80	4	1		55	N	
1	3/12/80	5	1		53	N	
1	3/12/80	6	1		55	N	
1	3/12/80	7	1		56	Y	
1	3/12/80	8	1		56	N	
1	3/12/80	9	1		56	N	
1	3/12/80	10	1		56	N	
1	3/12/80	11	1		56	N	
1	3/12/80	12	1		56	N	
1	1/1/82	1	1		83	Y	
1	1/1/82	2	1		82	N	
1	1/1/82	3	1		81	N	
1	1/1/82	4	1		80	N	
1	1/1/82	5	1		80	N	
1	1/1/82	6	1		80	N	
1	1/1/82	7	1		80	N	
1	1/1/82	8	1		80	N	
1	1/1/82	9	1		80	N	
1	1/1/82	10	1		80	N	
1	1/1/82	11	1		80	N	
1	1/1/82	12	1		80	N	
1	4/16/82	1	1		59	Y	
1	4/16/82	2	1		57	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-109							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/16/82	3	1		56	N	
1	4/16/82	4	1		56	N	
1	4/16/82	5	1		56	N	
1	4/16/82	6	1		56	N	
1	4/16/82	7	1		56	N	
1	4/16/82	8	1		56	N	
1	4/16/82	9	1		56	N	
1	4/16/82	10	1		56	N	
1	4/16/82	11	1		56	N	
1	4/16/82	12	1		55	N	
1	2/11/84	1	1		63	Y	
1	2/11/84	2	1		61	N	
1	2/11/84	3	1		60	N	
1	2/11/84	4	1		60	N	
1	2/11/84	5	1		60	N	
1	2/11/84	6	1		60	N	
1	2/11/84	7	1		60	N	
1	2/11/84	8	1		60	N	
1	2/11/84	9	1		60	N	
1	2/11/84	10	1		60	N	
1	2/11/84	11	1		60	N	
1	2/11/84	12	1		59	N	
1	7/5/89	1	1		103.9	Y	
1	7/5/89	2	1		103.5	N	
1	7/5/89	3	1		103.2	N	
1	7/5/89	4	1		103.1	N	
1	7/5/89	5	1		102.9	N	
1	7/5/89	6	1		103	N	
1	7/5/89	7	1		103.1	N	
1	1/1/90	1	1		66	Y	
1	1/1/90	2	1		65	N	
1	1/1/90	3	1		64	N	
1	1/1/90	4	1		63	N	
1	1/1/90	5	1		63	N	
1	1/1/90	6	1		63	N	
1	1/1/90	7	1		63.1	N	
1	1/1/90	8	1		63.2	N	
1	1/1/90	9	1		63.1	N	
1	1/1/90	10	1		63	N	
1	1/1/90	11	1		63	N	
1	1/1/90	12	1		63	N	
1	11/12/91	1	1		65	N	J-TI-023
1	11/12/91	2	1		65	N	
1	11/12/91	3	1		65	N	
1	11/12/91	4	1		65	N	
1	11/12/91	5	1		65	N	
1	11/12/91	6	1		65	N	
1	11/12/91	7	1		65	N	
1	11/12/91	8	1		65	N	
1	11/12/91	9	1		65	N	
1	11/12/91	10	1		66	Y	
1	11/12/91	11	1		66	N	
1	11/12/91	12	1		66	N	
1	1/1/92	1	1		65	Y	J-900925741-79
1	1/1/92	2	1		64.3	N	
1	1/1/92	3	1		63.3	N	
1	1/1/92	4	1		63.3	N	
1	1/1/92	5	1		63.2	N	
1	1/1/92	6	1		63.2	N	
1	1/1/92	7	1		63.2	N	
1	1/1/92	8	1		63.2	N	
1	1/1/92	9	1		63.2	N	
1	1/1/92	10	1		63.2	N	
1	1/1/92	11	1		63.2	N	
1	1/1/92	12	1		63	N	
1	7/2/92	1	1		58.8	N	J TI-041

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-109							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/2/92	2	1		59.2	N	
1	7/2/92	3	1		59.8	N	
1	7/2/92	4	1		60.1	N	
1	7/2/92	5	1		60.6	N	
1	7/2/92	6	1		61.1	N	
1	7/2/92	7	1		61.6	N	
1	7/2/92	8	1		62	N	
1	7/2/92	9	1		62.1	N	
1	7/2/92	10	1		62.2	N	
1	7/2/92	11	1		62.2	N	
1	7/2/92	12	1		62.2	Y	
1	1/3/93	1	1		62	Y	J 890523512-47
1	1/3/93	2	1		61.3	N	
1	1/3/93	3	1		60.1	N	
1	1/3/93	4	1		60.1	N	
1	1/3/93	5	1		60.1	N	
1	1/3/93	6	1		60.1	N	
1	1/3/93	7	1		60.1	N	
1	1/3/93	8	1		60.3	N	
1	1/3/93	9	1		60.1	N	
1	1/3/93	10	1		60.1	N	
1	1/3/93	11	1		60.1	N	
1	1/3/93	12	1		59.9	N	
1	7/1/93	1	1		60.9	N	J 910126143-66
1	7/1/93	2	1		60.9	N	
1	7/1/93	3	1		61.1	N	
1	7/1/93	4	1		61.1	N	
1	7/1/93	5	1		61.1	N	
1	7/1/93	6	1		61.1	N	
1	7/1/93	7	1		61.1	N	
1	7/1/93	8	1		61.1	N	
1	7/1/93	9	1		61.1	N	
1	7/1/93	10	1		61.1	N	
1	7/1/93	11	1		61.1	N	
1	7/1/93	12	1		61.1	N	
365 Records selected.							

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 12, 1993.

TANK 241-B-110							
THERMOCOUPLE DATA							
TREE#	DATE	THERMO#	TREE SET #	TEMP C	TEMP F	Y= MAX TEMP	COMMENTS
1	5/7/75	1	1		81.0	Y	
1	5/7/75	2	1		79.0	N	
1	5/7/75	3	1		79.0	N	
1	5/7/75	4	1		79.0	N	
1	5/7/75	5	1		79.0	N	
1	5/7/75	6	1		79.0	N	
1	5/7/75	7	1		79.0	N	
1	5/7/75	8	1		77.0	N	
1	5/14/75	1	1		73.0	Y	
1	5/14/75	2	1		72.0	N	
1	5/14/75	3	1		72.0	N	
1	5/14/75	4	1		72.0	N	
1	5/14/75	5	1		72.0	N	
1	5/14/75	6	1		72.0	N	
1	5/14/75	7	1		72.0	N	
1	5/14/75	8	1		70.0	N	
1	5/14/75	9	1		70.0	N	
1	5/14/75	10	1		63.0	N	
1	5/14/75	11	1		59.0	N	
1	5/14/75	12	1		55.0	N	
1	5/21/75	1	1		66.0	Y	
1	5/21/75	2	1		66.0	N	
1	5/21/75	3	1		66.0	N	
1	5/21/75	4	1		66.0	N	
1	5/21/75	5	1		64.0	N	
1	5/21/75	6	1		64.0	N	
1	5/21/75	7	1		55.0	N	
1	5/28/75	1	1		81.0	Y	
1	5/28/75	2	1		81.0	N	
1	5/28/75	3	1		79.0	N	
1	5/28/75	4	1		79.0	N	
1	5/28/75	5	1		77.0	N	
1	5/28/75	6	1		75.0	N	
1	5/28/75	7	1		75.0	N	
1	5/28/75	8	1		75.0	N	
1	5/28/75	9	1		75.0	N	
1	5/28/75	10	1		75.0	N	
1	5/28/75	11	1		73.0	N	
1	6/4/75	1	1		72.0	Y	
1	6/4/75	2	1		70.0	N	
1	6/4/75	3	1		70.0	N	
1	6/4/75	4	1		70.0	N	
1	6/4/75	5	1		66.0	N	
1	6/4/75	6	1		66.0	N	
1	6/4/75	7	1		66.0	N	
1	6/4/75	8	1		66.0	N	
1	6/4/75	9	1		66.0	N	
1	6/4/75	10	1		66.0	N	
1	6/4/75	11	1		64.0	N	
1	6/10/75	1	1		75.0	Y	
1	6/10/75	2	1		73.0	N	
1	6/10/75	3	1		73.0	N	
1	6/10/75	4	1		73.0	N	
1	6/10/75	5	1		73.0	N	
1	6/10/75	6	1		73.0	N	
1	6/10/75	7	1		72.0	N	
1	6/10/75	8	1		72.0	N	
1	6/10/75	9	1		72.0	N	
1	6/10/75	10	1		70.0	N	
1	6/10/75	11	1		68.0	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-110							
THERMOCOUPLE DATA							
TREE#	DATE	THERMO#	TREE SET #	TEMP C	TEMP F	Y= MAX TEMP	COMMENTS
1	6/11/75	1	1		70.0	Y	
1	6/11/75	2	1		70.0	N	
1	6/11/75	3	1		70.0	N	
1	6/11/75	4	1		70.0	N	
1	6/11/75	5	1		68.0	N	
1	6/11/75	6	1		68.0	N	
1	6/11/75	7	1		68.0	N	
1	6/11/75	8	1		66.0	N	
1	6/11/75	9	1		66.0	N	
1	6/11/75	10	1		66.0	N	
1	6/11/75	11	1		64.0	N	
1	7/31/75	1	1		78.0	Y	
1	7/31/75	2	1		76.0	N	
1	7/31/75	3	1		76.0	N	
1	7/31/75	4	1		77.0	N	
1	7/31/75	5	1		78.0	N	
1	7/31/75	6	1		78.0	N	
1	7/31/75	7	1		78.0	N	
1	7/31/75	8	1		78.0	N	
1	7/31/75	9	1		78.0	N	
1	7/31/75	10	1		78.0	N	
1	7/31/75	11	1		78.0	N	
1	7/31/75	12	1		77.0	N	
1	1/7/76	1	1		89.0	N	
1	1/7/76	2	1		89.0	N	
1	1/7/76	3	1		90.0	Y	
1	1/7/76	4	1		89.0	N	
1	1/7/76	5	1		87.0	N	
1	1/7/76	6	1		87.0	N	
1	1/7/76	7	1		87.0	N	
1	1/7/76	8	1		87.0	N	
1	1/7/76	9	1		87.0	N	
1	1/7/76	10	1		87.0	N	
1	1/7/76	11	1		84.0	N	
1	4/1/76	1	1		77.0	N	
1	4/1/76	2	1		78.0	Y	
1	4/1/76	3	1		77.0	N	
1	4/1/76	4	1		75.0	N	
1	4/1/76	5	1		74.0	N	
1	4/1/76	6	1		74.0	N	
1	4/1/76	7	1		74.0	N	
1	4/1/76	8	1		74.0	N	
1	4/1/76	9	1		74.0	N	
1	4/1/76	10	1		73.0	N	
1	4/1/76	11	1		70.0	N	
1	11/7/76	1	1		76.0	N	
1	11/7/76	2	1		77.0	N	
1	11/7/76	3	1		78.0	N	
1	11/7/76	4	1		80.0	Y	
1	11/7/76	5	1		80.0	N	
1	11/7/76	6	1		79.0	N	
1	11/7/76	7	1		79.0	N	
1	11/7/76	8	1		79.0	N	
1	11/7/76	9	1		79.0	N	
1	11/7/76	10	1		79.0	N	
1	11/7/76	11	1		78.0	N	
1	1/3/77	1	1		90.0	Y	
1	1/3/77	2	1		90.0	N	
1	1/3/77	3	1		90.0	N	
1	1/3/77	4	1		90.0	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-110							
THERMOCOUPLE DATA							
TREE#	DATE	THERMO#	TREE SET #	TEMP C	TEMP F	Y= MAX TEMP	COMMENTS
1	1/3/77	5	1		88.0	N	
1	1/3/77	6	1		87.0	N	
1	1/3/77	7	1		87.0	N	
1	1/3/77	8	1		87.0	N	
1	1/3/77	9	1		87.0	N	
1	1/3/77	10	1		87.0	N	
1	1/3/77	11	1		84.0	N	
1	4/26/77	1	1		67.0	Y	
1	4/26/77	2	1		66.0	N	
1	4/26/77	3	1		66.0	N	
1	4/26/77	4	1		64.0	N	
1	4/26/77	5	1		63.0	N	
1	4/26/77	6	1		63.0	N	
1	4/26/77	7	1		62.0	N	
1	4/26/77	8	1		62.0	N	
1	4/26/77	9	1		62.0	N	
1	4/26/77	10	1		62.0	N	
1	4/26/77	11	1		60.0	N	
1	7/28/77	1	1		69.0	N	
1	7/28/77	2	1		69.0	N	
1	7/28/77	3	1		70.0	N	
1	7/28/77	4	1		72.0	Y	
1	7/28/77	5	1		72.0	N	
1	7/28/77	6	1		72.0	N	
1	7/28/77	7	1		72.0	N	
1	7/28/77	8	1		71.0	N	
1	7/28/77	9	1		71.0	N	
1	7/28/77	10	1		71.0	N	
1	7/28/77	11	1		70.0	N	
1	10/7/77	1	1		78.0	N	
1	10/7/77	2	1		78.0	N	
1	10/7/77	3	1		79.0	N	
1	10/7/77	4	1		81.0	Y	
1	10/7/77	5	1		80.0	N	
1	10/7/77	6	1		80.0	N	
1	10/7/77	7	1		80.0	N	
1	10/7/77	8	1		80.0	N	
1	10/7/77	9	1		80.0	N	
1	10/7/77	10	1		80.0	N	
1	10/7/77	11	1		80.0	N	
1	1/16/78	1	1		91.0	Y	
1	1/16/78	2	1		91.0	N	
1	1/16/78	3	1		91.0	N	
1	1/16/78	4	1		90.0	N	
1	1/16/78	5	1		88.0	N	
1	1/16/78	6	1		88.0	N	
1	1/16/78	7	1		88.0	N	
1	1/16/78	8	1		88.0	N	
1	1/16/78	9	1		88.0	N	
1	1/16/78	10	1		88.0	N	
1	1/16/78	11	1		85.0	N	
1	4/23/78	1	1		87.0	Y	
1	4/23/78	2	1		86.0	N	
1	4/23/78	3	1		86.0	N	
1	4/23/78	4	1		85.0	N	
1	4/23/78	5	1		85.0	N	
1	4/23/78	6	1		84.0	N	
1	4/23/78	7	1		84.0	N	
1	4/23/78	8	1		84.0	N	
1	4/23/78	9	1		85.0	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-110							
THERMOCOUPLE DATA							
TREE#	DATE	THERMO#	TREE SET #	TEMP C	TEMP F	Y= MAX TEMP	COMMENTS
1	4/23/78	10	1		85.0	N	
1	4/23/78	11	1		83.0	N	
1	7/16/78	1	1		77.0	N	
1	7/16/78	2	1		77.0	N	
1	7/16/78	3	1		77.0	N	
1	7/16/78	4	1		78.0	Y	
1	7/16/78	5	1		78.0	N	
1	7/16/78	6	1		78.0	N	
1	7/16/78	7	1		78.0	N	
1	7/16/78	8	1		78.0	N	
1	7/16/78	9	1		77.0	N	
1	7/16/78	10	1		77.0	N	
1	1/9/79	1	1		78.0	N	
1	1/9/79	2	1		81.0	N	
1	1/9/79	3	1		82.0	Y	
1	1/9/79	4	1		82.0	N	
1	1/9/79	5	1		79.0	N	
1	1/9/79	6	1		79.0	N	
1	1/9/79	7	1		79.0	N	
1	1/9/79	8	1		79.0	N	
1	1/9/79	9	1		79.0	N	
1	1/9/79	10	1		79.0	N	
1	1/9/79	11	1		78.0	N	
1	1/9/79	12	1		77.0	N	
1	4/8/79	1	1		89.0	Y	
1	4/8/79	2	1		89.0	N	
1	4/8/79	3	1		88.0	N	
1	4/8/79	4	1		86.0	N	
1	4/8/79	5	1		85.0	N	
1	4/8/79	6	1		85.0	N	
1	4/8/79	7	1		85.0	N	
1	4/8/79	8	1		85.0	N	
1	4/8/79	9	1		85.0	N	
1	4/8/79	10	1		84.0	N	
1	4/8/79	11	1		81.0	N	
1	7/23/79	1	1		64.0	N	
1	7/23/79	2	1		64.0	N	
1	7/23/79	3	1		64.0	N	
1	7/23/79	4	1		66.0	Y	
1	7/23/79	5	1		65.0	N	
1	7/23/79	6	1		65.0	N	
1	7/23/79	7	1		64.0	N	
1	7/23/79	8	1		64.0	N	
1	7/23/79	9	1		64.0	N	
1	7/23/79	10	1		63.0	N	
1	7/23/79	11	1		62.0	N	
1	3/12/80	1	1		63.0	N	
1	3/12/80	2	1		63.0	N	
1	3/12/80	3	1		63.0	N	
1	3/12/80	4	1		65.0	Y	
1	3/12/80	5	1		65.0	N	
1	3/12/80	6	1		65.0	N	
1	3/12/80	7	1		56.0	N	
1	3/12/80	8	1		64.0	N	
1	3/12/80	9	1		64.0	N	
1	3/12/80	10	1		64.0	N	
1	3/12/80	11	1		63.0	N	
1	1/1/82	1	1		82.0	N	
1	1/1/82	2	1		83.0	N	
1	1/1/82	3	1		84.0	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-110							
THERMOCOUPLE DATA							
TREE#	DATE	THERMO#	TREE SET #	TEMP C	TEMP F	Y= MAX TEMP	COMMENTS
1	1/1/82	4	1		83.0	N	
1	1/1/82	5	1		82.0	N	
1	1/1/82	6	1		82.0	N	
1	1/1/82	7	1		82.0	N	
1	1/1/82	8	1		82.0	N	
1	1/1/82	9	1		82.0	N	
1	1/1/82	10	1		82.0	N	
1	1/1/82	11	1		80.0	N	
1	4/16/82	1	1		69.0	Y	
1	4/16/82	2	1		68.0	N	
1	4/16/82	3	1		67.0	N	
1	4/16/82	4	1		66.0	N	
1	4/16/82	5	1		65.0	N	
1	4/16/82	6	1		65.0	N	
1	4/16/82	7	1		64.0	N	
1	4/16/82	8	1		64.0	N	
1	4/16/82	9	1		64.0	N	
1	4/16/82	10	1		64.0	N	
1	4/16/82	11	1		61.0	N	
1	7/5/89	5	1		116.8	N	
1	7/5/89	6	1		117.3	N	
1	7/5/89	7	1		118.3	N	
1	7/5/89	8	1		119	N	
1	7/5/89	9	1		119.6	N	
1	7/5/89	10	1		120	N	
1	7/5/89	11	1		121.2	Y	
1	11/12/91	5	1		70.0	Y	E-TI-055 TC# 1-4 O/S
1	11/12/91	6	1		70.0	N	
1	11/12/91	7	1		70.0	N	
1	11/12/91	8	1		70.0	N	
1	11/12/91	9	1		70.0	N	
1	11/12/91	10	1		70.0	N	
1	11/12/91	11	1		70.0	N	
1	1/4/92	5	1		64.4	N	E300325164-70 HH-99A-E Omega
1	1/4/92	6	1		64.3	N	
1	1/4/92	7	1		64.4	N	
1	1/4/92	8	1		64.4	N	
1	1/4/92	9	1		64.5	Y	
1	1/4/92	10	1		64.5	N	
1	1/4/92	11	1		62.9	N	
1	7/2/92	5	1		70.5	Y	E TI-020
1	7/2/92	6	1		70.5	N	
1	7/2/92	7	1		70.4	N	
1	7/2/92	8	1		70.3	N	
1	7/2/92	9	1		70.1	N	
1	7/2/92	10	1		70.1	N	
1	7/2/92	11	1		69.7	N	
1	1/3/93	1	1			N	UNABLE TO GET READINGS
1	1/3/93	1	1			N	UNABLE TO GET READINGS
1	7/1/93	5	1		68.1	N	E 900325164-85
1	7/1/93	6	1		68.3	N	
1	7/1/93	7	1		68.3	N	
1	7/1/93	8	1		68.2	N	
1	7/1/93	9	1		68.3	N	
1	7/1/93	10	1		68.2	N	
1	7/1/93	11	1		67.8	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-111							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/9/75	1	1		90	Y	
1	4/9/75	2	1		88	N	
1	4/9/75	3	1		84	N	
1	4/9/75	4	1		84	N	
1	4/9/75	5	1		84	N	
1	4/9/75	6	1		84	N	
1	4/9/75	7	1		84	N	
1	4/9/75	8	1		84	N	
1	4/9/75	9	1		84	N	
1	4/9/75	10	1		86	N	
1	4/9/75	11	1		84	N	
1	4/23/75	1	1		79	Y	
1	4/23/75	2	1		79	N	
1	4/23/75	3	1		77	N	
1	4/23/75	4	1		79	N	
1	4/23/75	5	1		79	N	
1	4/23/75	6	1		79	N	
1	4/23/75	7	1		77	N	
1	4/23/75	8	1		77	N	
1	4/23/75	9	1		79	N	
1	4/23/75	10	1		77	N	
1	4/23/75	11	1		70	N	
1	4/30/75	1	1		81	Y	
1	4/30/75	2	1		81	N	
1	4/30/75	3	1		79	N	
1	4/30/75	4	1		75	N	
1	4/30/75	5	1		75	N	
1	4/30/75	6	1		75	N	
1	4/30/75	7	1		75	N	
1	4/30/75	8	1		75	N	
1	4/30/75	9	1		73	N	
1	4/30/75	10	1		73	N	
1	4/30/75	11	1		68	N	
1	5/7/75	1	1		90	Y	
1	5/7/75	2	1		90	N	
1	5/7/75	3	1		88	N	
1	5/7/75	4	1		84	N	
1	5/7/75	5	1		84	N	
1	5/7/75	6	1		84	N	
1	5/7/75	7	1		84	N	
1	5/7/75	8	1		84	N	
1	5/7/75	9	1		84	N	
1	5/7/75	10	1		84	N	
1	5/7/75	11	1		79	N	
1	5/7/75	12	1		79	N	
1	5/14/75	1	1		88	Y	
1	5/14/75	2	1		84	N	
1	5/14/75	3	1		84	N	
1	5/14/75	4	1		81	N	
1	5/14/75	5	1		81	N	
1	5/14/75	6	1		81	N	
1	5/14/75	7	1		81	N	
1	5/14/75	8	1		81	N	
1	5/14/75	9	1		81	N	
1	5/14/75	10	1		81	N	
1	5/14/75	11	1		73	N	
1	5/21/75	1	1		81	Y	
1	5/21/75	2	1		81	N	
1	5/21/75	3	1		81	N	
1	5/21/75	4	1		77	N	
1	5/21/75	5	1		77	N	
1	5/21/75	6	1		77	N	
1	5/21/75	7	1		77	N	
1	5/21/75	8	1		77	N	
1	5/21/75	9	1		77	N	
1	5/21/75	10	1		77	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-111							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	11	1		73	N	
1	5/28/75	1	1		81	Y	
1	5/28/75	2	1		81	N	
1	5/28/75	3	1		81	N	
1	5/28/75	4	1		79	N	
1	5/28/75	5	1		79	N	
1	5/28/75	6	1		79	N	
1	5/28/75	7	1		79	N	
1	5/28/75	8	1		79	N	
1	5/28/75	9	1		79	N	
1	5/28/75	10	1		79	N	
1	5/28/75	11	1		73	N	
1	6/4/75	1	1		82	Y	
1	6/4/75	2	1		82	N	
1	6/4/75	3	1		81	N	
1	6/4/75	4	1		79	N	
1	6/4/75	5	1		79	N	
1	6/4/75	6	1		79	N	
1	6/4/75	7	1		79	N	
1	6/4/75	8	1		79	N	
1	6/4/75	9	1		79	N	
1	6/4/75	10	1		79	N	
1	6/4/75	11	1		73	N	
1	7/31/75	1	1		82	N	
1	7/31/75	2	1		82	N	
1	7/31/75	3	1		84	Y	
1	7/31/75	4	1		84	N	
1	7/31/75	5	1		84	N	
1	7/31/75	6	1		84	N	
1	7/31/75	7	1		84	N	
1	7/31/75	8	1		84	N	
1	7/31/75	9	1		84	N	
1	7/31/75	10	1		84	N	
1	7/31/75	11	1		84	N	
1	7/31/75	12	1		81	N	
1	1/7/76	1	1		86	N	
1	1/7/76	2	1		97	Y	
1	1/7/76	3	1		97	N	
1	1/7/76	4	1		94	N	
1	1/7/76	5	1		94	N	
1	1/7/76	6	1		94	N	
1	1/7/76	7	1		94	N	
1	1/7/76	8	1		94	N	
1	1/7/76	9	1		94	N	
1	1/7/76	10	1		93	N	
1	1/7/76	11	1		87	N	
1	4/1/76	1	1		87	N	
1	4/1/76	2	1		88	Y	
1	4/1/76	3	1		87	N	
1	4/1/76	4	1		84	N	
1	4/1/76	5	1		84	N	
1	4/1/76	6	1		84	N	
1	4/1/76	7	1		84	N	
1	4/1/76	8	1		84	N	
1	4/1/76	9	1		84	N	
1	4/1/76	10	1		83	N	
1	4/1/76	11	1		76	N	
1	11/7/76	1	1		84	N	
1	11/7/76	2	1		85	N	
1	11/7/76	3	1		87	Y	
1	11/7/76	4	1		86	N	
1	11/7/76	5	1		86	N	
1	11/7/76	6	1		86	N	
1	11/7/76	7	1		86	N	
1	11/7/76	8	1		87	N	
1	11/7/76	9	1		87	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-111 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	11/7/76	10	1		86	N	
1	11/7/76	11	1		83	N	
1	1/3/77	1	1		96	Y	
1	1/3/77	2	1		96	N	
1	1/3/77	3	1		96	N	
1	1/3/77	4	1		93	N	
1	1/3/77	5	1		93	N	
1	1/3/77	6	1		93	N	
1	1/3/77	7	1		93	N	
1	1/3/77	8	1		93	N	
1	1/3/77	9	1		93	N	
1	1/3/77	10	1		92	N	
1	1/3/77	11	1		86	N	
1	4/26/77	1	1		80	Y	
1	4/26/77	2	1		79	N	
1	4/26/77	3	1		78	N	
1	4/26/77	4	1		76	N	
1	4/26/77	5	1		76	N	
1	4/26/77	6	1		75	N	
1	4/26/77	7	1		75	N	
1	4/26/77	8	1		74	N	
1	4/26/77	9	1		74	N	
1	4/26/77	10	1		73	N	
1	4/26/77	11	1		68	N	
1	7/16/77	1	1		84	N	
1	7/16/77	2	1		85	N	
1	7/16/77	3	1		86	Y	
1	7/16/77	4	1		85	N	
1	7/16/77	5	1		85	N	
1	7/16/77	6	1		85	N	
1	7/16/77	7	1		85	N	
1	7/16/77	8	1		85	N	
1	7/16/77	9	1		85	N	
1	7/16/77	10	1		85	N	
1	7/16/77	11	1		85	N	
1	7/16/77	12	1		85	N	
1	7/28/77	1	1		76	N	
1	7/28/77	2	1		77	N	
1	7/28/77	3	1		78	Y	
1	7/28/77	4	1		78	N	
1	7/28/77	5	1		78	N	
1	7/28/77	6	1		78	N	
1	7/28/77	7	1		78	N	
1	7/28/77	8	1		78	N	
1	7/28/77	9	1		78	N	
1	7/28/77	10	1		77	N	
1	7/28/77	11	1		75	N	
1	10/7/77	1	1		89	N	
1	10/7/77	2	1		89	N	
1	10/7/77	3	1		91	Y	
1	10/7/77	4	1		90	N	
1	10/7/77	5	1		90	N	
1	10/7/77	6	1		90	N	
1	10/7/77	7	1		90	N	
1	10/7/77	8	1		90	N	
1	10/7/77	9	1		90	N	
1	10/7/77	10	1		89	N	
1	10/7/77	11	1		87	N	
1	1/16/78	1	1		95	N	
1	1/16/78	2	1		96	N	
1	1/16/78	3	1		97	Y	
1	1/16/78	4	1		95	N	
1	1/16/78	5	1		94	N	
1	1/16/78	6	1		94	N	
1	1/16/78	7	1		94	N	
1	1/16/78	8	1		94	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-111							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/16/78	9	1		94	N	
1	1/16/78	10	1		94	N	
1	1/16/78	11	1		88	N	
1	4/23/78	1	1		91	Y	
1	4/23/78	2	1		91	N	
1	4/23/78	3	1		90	N	
1	4/23/78	4	1		89	N	
1	4/23/78	5	1		89	N	
1	4/23/78	6	1		89	N	
1	4/23/78	7	1		89	N	
1	4/23/78	8	1		89	N	
1	4/23/78	9	1		89	N	
1	4/23/78	10	1		88	N	
1	4/23/78	11	1		85	N	
1	1/9/79	1	1		72	N	
1	1/9/79	2	1		72	N	
1	1/9/79	3	1		76	Y	
1	1/9/79	4	1		73	N	
1	1/9/79	5	1		71	N	
1	1/9/79	6	1		70	N	
1	1/9/79	7	1		68	N	
1	1/9/79	8	1		68	N	
1	1/9/79	9	1		68	N	
1	1/9/79	10	1		68	N	
1	1/9/79	11	1		68	N	
1	1/9/79	12	1		69	N	
1	4/8/79	1	1		98	Y	
1	4/8/79	2	1		98	N	
1	4/8/79	3	1		97	N	
1	4/8/79	4	1		94	N	
1	4/8/79	5	1		94	N	
1	4/8/79	6	1		94	N	
1	4/8/79	7	1		94	N	
1	4/8/79	8	1		94	N	
1	4/8/79	9	1		93	N	
1	4/8/79	10	1		87	N	
1	7/23/79	1	1		68	Y	
1	7/23/79	2	1		67	N	
1	7/23/79	3	1		68	N	
1	7/23/79	4	1		67	N	
1	7/23/79	5	1		67	N	
1	7/23/79	6	1		67	N	
1	7/23/79	7	1		67	N	
1	7/23/79	8	1		67	N	
1	7/23/79	9	1		67	N	
1	7/23/79	10	1		67	N	
1	7/23/79	11	1		66	N	
1	3/12/80	1	1		67	N	
1	3/12/80	2	1		67	N	
1	3/12/80	3	1		67	N	
1	3/12/80	4	1		67	N	
1	3/12/80	5	1		67	N	
1	3/12/80	6	1		68	N	
1	3/12/80	7	1		69	Y	
1	3/12/80	8	1		68	N	
1	3/12/80	9	1		67	N	
1	3/12/80	10	1		67	N	
1	3/12/80	11	1		67	N	
1	3/12/80	12	1		67	N	
1	1/1/82	2	1		91	Y	
1	1/1/82	3	1		91	N	
1	1/1/82	4	1		89	N	
1	1/1/82	5	1		89	N	
1	1/1/82	6	1		88	N	
1	1/1/82	7	1		88	N	
1	1/1/82	8	1		88	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-111							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/82	9	1		88	N	
1	1/1/82	11	1		83	N	
1	4/16/82	2	1		66	Y	
1	4/16/82	3	1		65	N	
1	4/16/82	4	1		63	N	
1	4/16/82	5	1		63	N	
1	4/16/82	6	1		63	N	
1	4/16/82	7	1		63	N	
1	4/16/82	8	1		63	N	
1	4/16/82	9	1		63	N	
1	4/16/82	10	1		63	N	
1	4/16/82	11	1		58	N	
1	6/16/83	2	1		78	Y	
1	6/16/83	3	1		78	N	
1	6/16/83	4	1		77	N	
1	6/16/83	5	1		77	N	
1	6/16/83	6	1		77	N	
1	6/16/83	7	1		77	N	
1	6/16/83	8	1		76	N	
1	6/16/83	9	1		76	N	
1	6/16/83	10	1		76	N	
1	6/16/83	11	1		73	N	
1	7/5/89	2	1		93	Y	
1	7/5/89	3	1		92.4	N	
1	7/5/89	4	1		74.8	N	
1	7/5/89	5	1		75	N	
1	7/5/89	6	1		75.2	N	
1	7/5/89	7	1		75.5	N	
1	7/5/89	8	1		75.7	N	
1	7/5/89	9	1		76	N	
1	7/5/89	10	1		76.2	N	
1	7/5/89	11	1		76.6	N	
1	1/1/90	1	1		56	N	
1	1/1/90	2	1		56.1	N	
1	1/1/90	3	1		56.4	Y	
1	1/1/90	4	1		55	N	
1	1/1/90	5	1		55	N	
1	1/1/90	6	1		55.2	N	
1	1/1/90	7	1		55.1	N	
1	1/1/90	8	1		55.1	N	
1	1/1/90	9	1		54.5	N	
1	1/1/90	10	1		54.8	N	
1	1/1/90	11	1		55	N	
1	1/1/90	12	1		55	N	
1	1/3/93	1	1			N	UNABLE TO GET READINGS
1	7/1/93	3	1		72.7	N	J 910126143-66
1	7/1/93	4	1		85.7	N	
1	7/1/93	5	1		85.6	N	
1	7/1/93	6	1		85.6	N	
1	7/1/93	7	1		85.7	N	
1	7/1/93	8	1		85.6	N	
1	7/1/93	9	1		85.6	N	
1	7/1/93	10	1		85.6	N	
1	7/1/93	11	1		85.6	N	
1	7/1/93	12	1		85.7	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-112							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	9/24/74	1	1		77	Y	
1	9/24/74	2	1		77	N	
1	9/24/74	3	1		75	N	
1	9/24/74	4	1		77	N	
1	9/24/74	5	1		77	N	
1	9/24/74	6	1		77	N	
1	9/24/74	7	1		77	N	
1	9/24/74	8	1		77	N	
1	9/24/74	9	1		77	N	
1	9/24/74	10	1		77	N	
1	9/24/74	11	1		77	N	
1	9/24/74	12	1		77	N	
1	12/11/74	1	1		84	Y	
1	12/11/74	3	1		82	N	
1	12/11/74	4	1		82	N	
1	12/11/74	5	1		82	N	
1	12/11/74	6	1		79	N	
1	12/11/74	7	1		79	N	
1	12/11/74	8	1		79	N	
1	12/11/74	9	1		79	N	
1	12/11/74	10	1		79	N	
1	12/11/74	11	1		79	N	
1	12/11/74	12	1		79	N	
1	4/9/75	1	1		82	Y	
1	4/9/75	2	1		77	N	
1	4/9/75	3	1		81	N	
1	4/9/75	4	1		81	N	
1	4/9/75	5	1		81	N	
1	4/9/75	6	1		75	N	
1	4/9/75	7	1		73	N	
1	4/9/75	8	1		75	N	
1	4/9/75	9	1		73	N	
1	4/9/75	10	1		75	N	
1	4/9/75	11	1		75	N	
1	4/9/75	12	1		75	N	
1	6/9/75	1	1		79	N	
1	6/9/75	2	1		81	Y	
1	6/9/75	3	1		82	N	
1	6/9/75	4	1		81	N	
1	6/9/75	5	1		79	N	
1	6/9/75	6	1		75	N	
1	6/9/75	7	1		75	N	
1	6/9/75	8	1		75	N	
1	6/9/75	9	1		75	N	
1	6/9/75	10	1		75	N	
1	6/9/75	11	1		75	N	
1	6/9/75	12	1		73	N	
1	7/31/75	1	1		85	Y	
1	7/31/75	2	1		70	N	
1	7/31/75	3	1		85	N	
1	7/31/75	4	1		84	N	
1	7/31/75	5	1		84	N	
1	7/31/75	6	1		83	N	
1	7/31/75	7	1		83	N	
1	7/31/75	8	1		86	N	
1	7/31/75	9	1		83	N	
1	7/31/75	10	1		83	N	
1	7/31/75	11	1		82	N	
1	7/31/75	12	1		82	N	
1	1/7/76	1	1		100	Y	
1	1/7/76	3	1		98	N	
1	1/7/76	4	1		98	N	
1	1/7/76	5	1		96	N	
1	1/7/76	6	1		90	N	
1	1/7/76	7	1		90	N	
1	1/7/76	8	1		90	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-112							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/7/76	9	1		90	N	
1	1/7/76.	10	1		90	N	
1	1/7/76	11	1		90	N	
1	1/7/76	12	1		90	N	
1	4/1/76	1	1		92	Y	
1	4/1/76	3	1		91	N	
1	4/1/76	5	1		91	N	
1	4/1/76	6	1		84	N	
1	4/1/76	7	1		83	N	
1	4/1/76	8	1		83	N	
1	4/1/76	9	1		83	N	
1	4/1/76	10	1		83	N	
1	4/1/76	11	1		83	N	
1	4/1/76	12	1		82	N	
1	7/9/76	1	1		81	N	
1	7/9/76	3	1		85	Y	
1	7/9/76	5	1		80	N	
1	7/9/76	6	1		77	N	
1	7/9/76	7	1		77	N	
1	7/9/76	8	1		77	N	
1	7/9/76	9	1		77	N	
1	7/9/76	10	1		77	N	
1	7/9/76	11	1		77	N	
1	7/9/76	12	1		76	N	
1	11/7/76	1	1		87	Y	
1	11/7/76	3	1		86	N	
1	11/7/76	5	1		87	N	
1	11/7/76	6	1		84	N	
1	11/7/76	7	1		84	N	
1	11/7/76	8	1		84	N	
1	11/7/76	9	1		83	N	
1	11/7/76	10	1		83	N	
1	11/7/76	11	1		84	N	
1	11/7/76	12	1		83	N	
1	1/3/77	1	1		101	Y	
1	1/3/77	3	1		100	N	
1	1/3/77	5	1		99	N	
1	1/3/77	6	1		94	N	
1	1/3/77	7	1		93	N	
1	1/3/77	8	1		93	N	
1	1/3/77	9	1		93	N	
1	1/3/77	10	1		93	N	
1	1/3/77	11	1		93	N	
1	1/3/77	12	1		92	N	
1	4/26/77	1	1		77	Y	
1	4/26/77	5	1		74	N	
1	4/26/77	6	1		72	N	
1	4/26/77	7	1		72	N	
1	4/26/77	8	1		72	N	
1	4/26/77	9	1		72	N	
1	4/26/77	10	1		72	N	
1	4/26/77	11	1		71	N	
1	4/26/77	12	1		70	N	
1	7/16/77	1	1		76	Y	
1	7/16/77	3	1		76	N	
1	7/16/77	5	1		76	N	
1	7/16/77	6	1		76	N	
1	7/16/77	7	1		76	N	
1	7/16/77	8	1		76	N	
1	7/16/77	9	1		76	N	
1	7/16/77	10	1		76	N	
1	7/16/77	11	1		76	N	
1	7/16/77	12	1		76	N	
1	7/28/77	1	1		72	N	
1	7/28/77	3	1		72	N	
1	7/28/77	5	1		74	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-112							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/28/77	6	1		75	N	
1	7/28/77	7	1		76	Y	
1	7/28/77	8	1		69	N	
1	7/28/77	9	1		69	N	
1	7/28/77	10	1		69	N	
1	7/28/77	11	1		69	N	
1	7/28/77	12	1		69	N	
1	10/7/77	1	1		82	Y	
1	10/7/77	3	1		82	N	
1	10/7/77	5	1		82	N	
1	10/7/77	6	1		81	N	
1	10/7/77	7	1		81	N	
1	10/7/77	8	1		81	N	
1	10/7/77	9	1		81	N	
1	10/7/77	10	1		81	N	
1	10/7/77	11	1		81	N	
1	10/7/77	12	1		81	N	
1	1/16/78	1	1		78	Y	
1	1/16/78	3	1		76	N	
1	1/16/78	5	1		77	N	
1	1/16/78	6	1		77	N	
1	1/16/78	7	1		77	N	
1	1/16/78	8	1		77	N	
1	1/16/78	9	1		77	N	
1	1/16/78	10	1		77	N	
1	4/23/78	1	1		85	Y	
1	4/23/78	3	1		84	N	
1	4/23/78	5	1		84	N	
1	4/23/78	6	1		83	N	
1	4/23/78	7	1		83	N	
1	4/23/78	8	1		83	N	
1	4/23/78	9	1		83	N	
1	4/23/78	10	1		83	N	
1	4/23/78	11	1		83	N	
1	4/23/78	12	1		82	N	
1	1/9/79	1	1		71	Y	
1	1/9/79	2	1		70	N	
1	1/9/79	3	1		71	N	
1	1/9/79	4	1		64	N	
1	1/9/79	5	1		70	N	
1	1/9/79	6	1		69	N	
1	1/9/79	7	1		69	N	
1	1/9/79	8	1		70	N	
1	1/9/79	9	1		70	N	
1	1/9/79	10	1		70	N	
1	1/9/79	11	1		70	N	
1	1/9/79	12	1		70	N	
1	4/8/79	1	1		85	Y	
1	4/8/79	3	1		85	N	
1	4/8/79	5	1		85	N	
1	4/8/79	6	1		84	N	
1	4/8/79	7	1		84	N	
1	4/8/79	8	1		84	N	
1	4/8/79	9	1		84	N	
1	4/8/79	10	1		84	N	
1	4/8/79	11	1		84	N	
1	4/8/79	12	1		83	N	
1	7/23/79	1	1		60	N	
1	7/23/79	3	1		59	N	
1	7/23/79	5	1		60	N	
1	7/23/79	6	1		61	Y	
1	7/23/79	7	1		59	N	
1	7/23/79	8	1		59	N	
1	7/23/79	9	1		59	N	
1	7/23/79	10	1		60	N	
1	7/23/79	11	1		60	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-112							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/23/79	12	1		60	N	
1	3/12/80	1	1		58	N	
1	3/12/80	3	1		58	N	
1	3/12/80	5	1		60	Y	
1	3/12/80	6	1		60	N	
1	3/12/80	7	1		60	N	
1	3/12/80	8	1		58	N	
1	3/12/80	9	1		58	N	
1	3/12/80	10	1		56	N	
1	3/12/80	11	1		56	N	
1	3/12/80	12	1		56	N	
1	1/1/82	1	1		84	N	
1	1/1/82	3	1		82	N	
1	1/1/82	5	1		83	N	
1	1/1/82	6	1		82	N	
1	1/1/82	7	1		82	N	
1	1/1/82	8	1		82	N	
1	1/1/82	9	1		82	N	
1	1/1/82	11	1		91	Y	
1	1/1/82	12	1		82	N	
1	4/16/82	1	1		60	Y	
1	4/16/82	3	1		60	N	
1	4/16/82	5	1		59	N	
1	4/16/82	6	1		58	N	
1	4/16/82	7	1		58	N	
1	4/16/82	8	1		58	N	
1	4/16/82	9	1		58	N	
1	4/16/82	10	1		58	N	
1	4/16/82	11	1		58	N	
1	4/16/82	12	1		58	N	
1	6/16/83	1	1		63	Y	
1	6/16/83	3	1		61	N	
1	6/16/83	5	1		61	N	
1	6/16/83	6	1		61	N	
1	6/16/83	7	1		61	N	
1	6/16/83	8	1		61	N	
1	6/16/83	9	1		61	N	
1	6/16/83	10	1		61	N	
1	6/16/83	11	1		61	N	
1	6/16/83	12	1		61	N	
1	7/5/89	1	1		99.4	N	
1	7/5/89	3	1		99.5	N	
1	7/5/89	5	1		99.8	N	
1	7/5/89	6	1		100.3	N	
1	7/5/89	7	1		99.9	N	
1	7/5/89	8	1		101.1	N	
1	7/5/89	9	1		101.3	Y	
1	7/5/89	10	1		101.3	N	
1	7/5/89	11	1		101.2	N	
1	7/5/89	12	1		101.1	N	
1	1/1/90	1	1		66	Y	
1	1/1/90	3	1		65	N	
1	1/1/90	5	1		65.7	N	
1	1/1/90	6	1		65.6	N	
1	1/1/90	7	1		65.6	N	
1	1/1/90	8	1		65.4	N	
1	1/1/90	9	1		65.4	N	
1	1/1/90	10	1		65	N	
1	1/1/90	11	1		64	N	
1	1/1/90	12	1		64.8	N	
1	11/12/91	1	1		67	Y	J-TI-023 TC #2,4 O/S
1	11/12/91	3	1		65	N	
1	11/12/91	5	1		66	N	
1	11/12/91	6	1		66	N	
1	11/12/91	7	1		66	N	
1	11/12/91	8	1		66	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-112							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	11/12/91	9	1		66	N	
1	11/12/91	10	1		66	N	
1	11/12/91	11	1		66	N	
1	11/12/91	12	1		66	N	
1	1/4/92	1	1		63	Y	J 910126143-50 HH-99A-J OMEGA
1	1/4/92	3	1		62.4	N	
1	1/4/92	5	1		62.1	N	
1	1/4/92	6	1		62.2	N	
1	1/4/92	7	1		62.3	N	
1	1/4/92	8	1		62.3	N	
1	1/4/92	9	1		62.3	N	
1	1/4/92	10	1		56.8	N	
1	1/4/92	11	1		62.2	N	
1	1/4/92	12	1		62	N	
1	7/2/92	1	1		62.5	N	J TI-041 TC#2,4 O/S
1	7/2/92	3	1		62.5	N	
1	7/2/92	5	1		62.6	N	
1	7/2/92	6	1		62.6	N	
1	7/2/92	7	1		62.6	N	
1	7/2/92	8	1		62.8	N	
1	7/2/92	9	1		62.8	N	
1	7/2/92	10	1		62.9	N	
1	7/2/92	11	1		63.1	N	
1	7/2/92	12	1		63.2	Y	
1	1/3/93	1	1		61.9	Y	J 890523512-47
1	1/3/93	3	1		60.8	N	
1	1/3/93	5	1		60.9	N	
1	1/3/93	6	1		61	N	
1	1/3/93	7	1		61	N	
1	1/3/93	8	1		61	N	
1	1/3/93	9	1		61	N	
1	1/3/93	10	1		60	N	
1	1/3/93	11	1		60.8	N	
1	1/3/93	12	1		60.4	N	
1	7/1/93	1	1		63.2	N	J 910126143-66
1	7/1/93	3	1		63.2	N	
1	7/1/93	5	1		63.2	N	
1	7/1/93	6	1		63.2	N	
1	7/1/93	7	1		63.2	N	
1	7/1/93	8	1		63.2	N	
1	7/1/93	9	1		63.2	N	
1	7/1/93	10	1		63.7	N	
1	7/1/93	11	1		63.2	N	
1	7/1/93	12	1		63.1	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	1	1		66	Y	
1	5/21/75	2	1		66	N	
1	5/21/75	3	1		66	N	
1	5/21/75	4	1		66	N	
1	5/21/75	5	1		64	N	
1	5/21/75	6	1		64	N	
1	5/21/75	7	1		62	N	
1	5/21/75	8	1		62	N	
1	5/21/75	9	1		62	N	
1	5/21/75	10	1		62	N	
1	5/21/75	11	1		62	N	
1	5/28/75	1	1		59	Y	
1	5/28/75	2	1		58	N	
1	5/28/75	3	1		57	N	
1	5/28/75	4	1		57	N	
1	5/28/75	5	1		56	N	
1	5/28/75	6	1		55	N	
1	5/28/75	7	1		54	N	
1	5/28/75	8	1		55	N	
1	5/28/75	9	1		55	N	
1	5/28/75	10	1		55	N	
1	5/28/75	11	1		55	N	
1	6/4/75	1	1		59	Y	
1	6/4/75	2	1		58	N	
1	6/4/75	3	1		57	N	
1	6/4/75	4	1		57	N	
1	6/4/75	5	1		56	N	
1	6/4/75	6	1		55	N	
1	6/4/75	7	1		55	N	
1	6/4/75	8	1		55	N	
1	6/4/75	9	1		56	N	
1	6/4/75	10	1		56	N	
1	6/4/75	11	1		56	N	
1	6/11/75	1	1		59	Y	
1	6/11/75	2	1		58	N	
1	6/11/75	3	1		57	N	
1	6/11/75	4	1		57	N	
1	6/11/75	5	1		56	N	
1	6/11/75	6	1		55	N	
1	6/11/75	7	1		55	N	
1	6/11/75	8	1		55	N	
1	6/11/75	9	1		56	N	
1	6/11/75	10	1		56	N	
1	6/11/75	11	1		56	N	
1	6/18/75	1	1		65	Y	
1	6/18/75	2	1		64	N	
1	6/18/75	3	1		63	N	
1	6/18/75	4	1		63	N	
1	6/18/75	5	1		62	N	
1	6/18/75	6	1		61	N	
1	6/18/75	7	1		61	N	
1	6/18/75	8	1		62	N	
1	6/18/75	9	1		62	N	
1	6/18/75	10	1		62	N	
1	6/18/75	11	1		62	N	
1	6/25/75	1	1		63	Y	
1	6/25/75	2	1		62	N	
1	6/25/75	3	1		61	N	
1	6/25/75	4	1		60	N	
1	6/25/75	5	1		59	N	
1	6/25/75	6	1		59	N	
1	6/25/75	7	1		59	N	
1	6/25/75	8	1		59	N	
1	6/25/75	9	1		59	N	
1	6/25/75	10	1		59	N	
1	6/25/75	11	1		59	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/2/75	1	1		66	Y	
1	7/2/75	2	1		65	N	
1	7/2/75	3	1		64	N	
1	7/2/75	4	1		64	N	
1	7/2/75	5	1		63	N	
1	7/2/75	6	1		62	N	
1	7/2/75	7	1		63	N	
1	7/2/75	8	1		63	N	
1	7/2/75	9	1		63	N	
1	7/2/75	10	1		63	N	
1	7/2/75	11	1		64	N	
1	7/9/75	1	1		60	Y	
1	7/9/75	2	1		58	N	
1	7/9/75	3	1		57	N	
1	7/9/75	4	1		57	N	
1	7/9/75	5	1		56	N	
1	7/9/75	6	1		57	N	
1	7/9/75	7	1		57	N	
1	7/9/75	8	1		57	N	
1	7/9/75	9	1		58	N	
1	7/9/75	10	1		58	N	
1	7/9/75	11	1		58	N	
1	7/16/75	1	1		60	N	
1	7/16/75	2	1		60	N	
1	7/16/75	3	1		59	N	
1	7/16/75	4	1		59	N	
1	7/16/75	5	1		58	N	
1	7/16/75	6	1		58	N	
1	7/16/75	7	1		60	N	
1	7/16/75	8	1		60	N	
1	7/16/75	9	1		60	N	
1	7/16/75	10	1		61	Y	
1	7/16/75	11	1		61	N	
1	7/31/75	1	1		65	N	
1	7/31/75	2	1		64	N	
1	7/31/75	3	1		64	N	
1	7/31/75	4	1		63	N	
1	7/31/75	5	1		63	N	
1	7/31/75	6	1		64	N	
1	7/31/75	7	1		65	N	
1	7/31/75	8	1		65	N	
1	7/31/75	9	1		65	N	
1	7/31/75	10	1		65	N	
1	7/31/75	11	1		66	N	
1	7/31/75	12	1		67	Y	
1	1/7/76	1	1		76	Y	
1	1/7/76	2	1		76	N	
1	1/7/76	3	1		76	N	
1	1/7/76	4	1		76	N	
1	1/7/76	5	1		75	N	
1	1/7/76	6	1		74	N	
1	1/7/76	7	1		71	N	
1	1/7/76	8	1		70	N	
1	1/7/76	9	1		70	N	
1	1/7/76	10	1		70	N	
1	1/7/76	11	1		70	N	
1	4/1/76	1	1		63	N	
1	4/1/76	2	1		64	Y	
1	4/1/76	3	1		64	N	
1	4/1/76	4	1		64	N	
1	4/1/76	5	1		62	N	
1	4/1/76	6	1		60	N	
1	4/1/76	7	1		58	N	
1	4/1/76	8	1		58	N	
1	4/1/76	9	1		58	N	
1	4/1/76	10	1		58	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/1/76	11	1		57	N	
1	7/9/76	1	1		63	Y	
1	7/9/76	2	1		62	N	
1	7/9/76	3	1		61	N	
1	7/9/76	4	1		61	N	
1	7/9/76	5	1		60	N	
1	7/9/76	6	1		59	N	
1	7/9/76	7	1		59	N	
1	7/9/76	8	1		60	N	
1	7/9/76	9	1		60	N	
1	7/9/76	10	1		60	N	
1	7/9/76	11	1		61	N	
1	11/7/76	1	1		63	N	
1	11/7/76	2	1		63	N	
1	11/7/76	3	1		63	N	
1	11/7/76	4	1		63	N	
1	11/7/76	5	1		63	N	
1	11/7/76	6	1		64	N	
1	11/7/76	7	1		64	N	
1	11/7/76	8	1		64	N	
1	11/7/76	9	1		64	N	
1	11/7/76	10	1		64	N	
1	11/7/76	11	1		65	Y	
1	1/3/77	1	1		80	Y	
1	1/3/77	2	1		79	N	
1	1/3/77	3	1		78	N	
1	1/3/77	4	1		78	N	
1	1/3/77	5	1		77	N	
1	1/3/77	6	1		76	N	
1	1/3/77	7	1		73	N	
1	1/3/77	8	1		73	N	
1	1/3/77	9	1		73	N	
1	1/3/77	10	1		73	N	
1	1/3/77	11	1		72	N	
1	4/26/77	1	1		61	Y	
1	4/26/77	2	1		60	N	
1	4/26/77	3	1		59	N	
1	4/26/77	4	1		58	N	
1	4/26/77	5	1		57	N	
1	4/26/77	6	1		55	N	
1	4/26/77	7	1		53	N	
1	4/26/77	8	1		53	N	
1	4/26/77	9	1		53	N	
1	4/26/77	10	1		54	N	
1	4/26/77	11	1		53	N	
1	7/16/77	1	1		68	Y	
1	7/16/77	2	1		68	N	
1	7/16/77	3	1		67	N	
1	7/16/77	4	1		67	N	
1	7/16/77	5	1		66	N	
1	7/16/77	6	1		66	N	
1	7/16/77	7	1		67	N	
1	7/16/77	8	1		67	N	
1	7/16/77	9	1		67	N	
1	7/16/77	10	1		67	N	
1	7/16/77	11	1		67	N	
1	7/16/77	12	1		67	N	
1	7/28/77	1	1		56	N	
1	7/28/77	2	1		55	N	
1	7/28/77	3	1		55	N	
1	7/28/77	4	1		55	N	
1	7/28/77	5	1		54	N	
1	7/28/77	6	1		54	N	
1	7/28/77	7	1		55	N	
1	7/28/77	8	1		55	N	
1	7/28/77	9	1		55	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/28/77	10	1		56	N	
1	7/28/77.	11	1		57	Y	
1	10/7/77	1	1		64	N	
1	10/7/77	2	1		64	N	
1	10/7/77	3	1		64	N	
1	10/7/77	4	1		64	N	
1	10/7/77	5	1		64	N	
1	10/7/77	6	1		64	N	
1	10/7/77	7	1		64	N	
1	10/7/77	8	1		67	N	
1	10/7/77	9	1		67	N	
1	10/7/77	10	1		67	N	
1	10/7/77	11	1		68	Y	
1	1/16/78	1	1		63	N	
1	1/16/78	2	1		64	Y	
1	1/16/78	3	1		63	N	
1	1/16/78	4	1		62	N	
1	1/16/78	5	1		61	N	
1	1/16/78	6	1		60	N	
1	1/16/78	7	1		56	N	
1	1/16/78	8	1		56	N	
1	1/16/78	9	1		56	N	
1	1/16/78	10	1		56	N	
1	1/16/78	11	1		55	N	
1	4/23/78	1	1		69	Y	
1	4/23/78	2	1		69	N	
1	4/23/78	3	1		68	N	
1	4/23/78	4	1		68	N	
1	4/23/78	5	1		67	N	
1	4/23/78	6	1		65	N	
1	4/23/78	7	1		64	N	
1	4/23/78	8	1		63	N	
1	4/23/78	9	1		63	N	
1	4/23/78	10	1		63	N	
1	4/23/78	11	1		63	N	
1	4/25/78	1	1		68	Y	
1	4/25/78	2	1		68	Y	
1	4/25/78	3	1		68	Y	
1	4/25/78	4	1		66	Y	
1	4/25/78	5	1		66	Y	
1	4/25/78	6	1		62	Y	
1	4/25/78	7	1		62	Y	
1	4/25/78	8	1		61	Y	
1	4/25/78	9	1		61	Y	
1	4/25/78	10	1		61	Y	
1	4/25/78	11	1		61	Y	
1	4/25/78	12	1		61	Y	
1	5/21/78	1	1		72	Y	
1	5/21/78	2	1		72	N	
1	5/21/78	3	1		72	N	
1	5/21/78	4	1		72	N	
1	5/21/78	5	1		72	N	
1	5/21/78	6	1		72	N	
1	5/21/78	7	1		71	N	
1	5/21/78	8	1		70	N	
1	5/21/78	9	1		69	N	
1	5/21/78	10	1		66	N	
1	5/21/78	11	1		66	N	
1	5/28/78	1	1		61	Y	
1	5/28/78	2	1		61	N	
1	5/28/78	3	1		60	N	
1	5/28/78	4	1		60	N	
1	5/28/78	5	1		60	N	
1	5/28/78	6	1		60	N	
1	5/28/78	7	1		59	N	
1	5/28/78	8	1		59	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/28/78	9	1		57	N	
1	5/28/78	10	1		55	N	
1	5/28/78	11	1		55	N	
1	6/4/78	1	1		64	Y	
1	6/4/78	2	1		63	N	
1	6/4/78	3	1		63	N	
1	6/4/78	4	1		63	N	
1	6/4/78	5	1		62	N	
1	6/4/78	6	1		62	N	
1	6/4/78	7	1		61	N	
1	6/4/78	8	1		60	N	
1	6/4/78	9	1		59	N	
1	6/4/78	10	1		58	N	
1	6/4/78	11	1		58	N	
1	6/10/78	1	1		60	Y	
1	6/10/78	2	1		60	N	
1	6/10/78	3	1		59	N	
1	6/10/78	4	1		59	N	
1	6/10/78	5	1		59	N	
1	6/10/78	6	1		59	N	
1	6/10/78	7	1		58	N	
1	6/10/78	8	1		57	N	
1	6/10/78	9	1		56	N	
1	6/10/78	10	1		55	N	
1	6/10/78	11	1		56	N	
1	6/18/78	1	1		68	Y	
1	6/18/78	2	1		68	N	
1	6/18/78	3	1		67	N	
1	6/18/78	4	1		67	N	
1	6/18/78	5	1		67	N	
1	6/18/78	6	1		66	N	
1	6/18/78	7	1		66	N	
1	6/18/78	8	1		65	N	
1	6/18/78	9	1		64	N	
1	6/18/78	10	1		63	N	
1	6/18/78	11	1		64	N	
1	6/25/78	1	1		62	Y	
1	6/25/78	2	1		61	N	
1	6/25/78	3	1		61	N	
1	6/25/78	4	1		60	N	
1	6/25/78	5	1		60	N	
1	6/25/78	6	1		60	N	
1	6/25/78	7	1		59	N	
1	6/25/78	8	1		58	N	
1	6/25/78	9	1		57	N	
1	6/25/78	10	1		57	N	
1	6/25/78	11	1		58	N	
1	7/2/78	1	1		69	Y	
1	7/2/78	2	1		68	N	
1	7/2/78	3	1		67	N	
1	7/2/78	4	1		67	N	
1	7/2/78	5	1		67	N	
1	7/2/78	6	1		66	N	
1	7/2/78	7	1		65	N	
1	7/2/78	8	1		65	N	
1	7/2/78	9	1		64	N	
1	7/2/78	10	1		64	N	
1	7/2/78	11	1		65	N	
1	7/9/78	1	1		60	Y	
1	7/9/78	2	1		60	N	
1	7/9/78	3	1		59	N	
1	7/9/78	4	1		59	N	
1	7/9/78	5	1		58	N	
1	7/9/78	6	1		58	N	
1	7/9/78	7	1		57	N	
1	7/9/78	8	1		57	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/9/78	9	1		56	N	
1	7/9/78	10	1		57	N	
1	7/9/78	11	1		58	N	
1	7/16/78	1	1		68	Y	
1	7/16/78	2	1		68	N	
1	7/16/78	3	1		67	N	
1	7/16/78	4	1		67	N	
1	7/16/78	5	1		66	N	
1	7/16/78	6	1		66	N	
1	7/16/78	7	1		67	N	
1	7/16/78	8	1		67	N	
1	7/16/78	9	1		67	N	
1	7/16/78	10	1		67	N	
1	7/16/78	11	1		68	N	
1	1/9/79	1	1		65	N	
1	1/9/79	2	1		69	Y	
1	1/9/79	3	1		69	N	
1	1/9/79	4	1		69	N	
1	1/9/79	5	1		69	N	
1	1/9/79	6	1		61	N	
1	1/9/79	7	1		58	N	
1	1/9/79	8	1		59	N	
1	1/9/79	9	1		58	N	
1	1/9/79	10	1		58	N	
1	1/9/79	11	1		58	N	
1	1/9/79	12	1		57	N	
1	4/8/79	1	1		70	Y	
1	4/8/79	2	1		70	N	
1	4/8/79	3	1		68	N	
1	4/8/79	4	1		68	N	
1	4/8/79	5	1		66	N	
1	4/8/79	6	1		64	N	
1	4/8/79	7	1		62	N	
1	4/8/79	8	1		62	N	
1	4/8/79	9	1		61	N	
1	4/8/79	10	1		61	N	
1	4/8/79	11	1		61	N	
1	7/5/89	1	1		92.2	N	
1	7/5/89	2	1		105.9	N	
1	7/5/89	3	1		107.8	N	
1	7/5/89	4	1		108.6	N	
1	7/5/89	5	1		109.7	N	
1	7/5/89	6	1		110.7	N	
1	7/5/89	7	1		111	N	
1	7/5/89	8	1		111.3	N	
1	7/5/89	9	1		112	N	
1	7/5/89	10	1		112.1	Y	
1	7/5/89	11	1		112	N	
1	1/1/90	1	1		65	N	
1	1/1/90	2	1		65	N	
1	1/1/90	3	1		65	N	
1	1/1/90	4	1		65	N	
1	1/1/90	5	1		65.2	Y	
1	1/1/90	6	1		63.1	N	
1	1/1/90	7	1		63	N	
1	1/1/90	8	1		63	N	
1	1/1/90	9	1		62	N	
1	1/1/90	10	1		62.4	N	
1	1/1/90	11	1		62.3	N	
1	1/1/90	12	1		60	N	
1	11/12/91	1	1		59	N	J-TI-023
1	11/12/91	2	1		59	N	
1	11/12/91	3	1		60	N	
1	11/12/91	4	1		60	N	
1	11/12/91	5	1		60	N	
1	11/12/91	6	1		62	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-201							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	11/12/91	7	1		62	N	
1	11/12/91	8	1		62	N	
1	11/12/91	9	1		61	N	
1	11/12/91	10	1		62	N	
1	11/12/91	11	1		62	N	
1	11/12/91	12	1		62	N	
1	1/4/92	1	1		61	N	J 910126143-50 HH-99A-J Omega
1	1/4/92	2	1		61	N	
1	1/4/92	3	1		61.8	N	
1	1/4/92	4	1		61.9	Y	
1	1/4/92	5	1		61.5	N	
1	1/4/92	6	1		61	N	
1	1/4/92	7	1		59.7	N	
1	1/4/92	8	1		59.6	N	
1	1/4/92	9	1		59.5	N	
1	1/4/92	10	1		59.5	N	
1	1/4/92	11	1		59.1	N	
1	7/2/92	1	1			N	UNABLE TO GET RDGS J-3 WRITTEN
1	11/4/92	1	1			N	#S&DA-92-488 NO RDGS SINCE JANUARY 1992
1	11/6/92	1	1		61.9	N	J 817-13-55-001
1	11/6/92	2	1		62.9	N	
1	11/6/92	3	1		63.5	N	
1	11/6/92	4	1		63.4	N	
1	11/6/92	5	1		64.4	N	
1	11/6/92	6	1		65.4	N	
1	11/6/92	7	1		66.2	N	
1	11/6/92	8	1		66.7	N	
1	11/6/92	9	1		66.5	N	
1	11/6/92	10	1		66.7	N	
1	11/6/92	11	1		67.2	Y	
1	1/3/93	1	1		58.3	N	J 890523512-47
1	1/3/93	4	1		59.1	Y	
1	1/3/93	5	1		59.1	N	
1	1/3/93	6	1		58	N	
1	1/3/93	7	1		56.2	N	
1	1/3/93	8	1		56.1	N	
1	1/3/93	9	1		56.1	N	
1	1/3/93	10	1		56	N	
1	1/3/93	11	1		55.4	N	
1	7/1/93	1	1		60.2	N	J 910126143-66
1	7/1/93	2	1		60	N	
1	7/1/93	3	1		58.6	N	
1	7/1/93	5	1		58.3	N	
1	7/1/93	6	1		58.1	N	
1	7/1/93	7	1		58.4	N	
1	7/1/93	8	1		57.7	N	
1	7/1/93	9	1		58.6	N	
1	7/1/93	10	1		58.9	N	
1	7/1/93	11	1		59.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-202 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	1	1		74	Y	
1	5/21/75	2	1		74	N	
1	5/21/75	3	1		74	N	
1	5/21/75	4	1		74	N	
1	5/21/75	5	1		74	N	
1	5/21/75	6	1		74	N	
1	5/21/75	7	1		72	N	
1	5/21/75	8	1		70	N	
1	5/21/75	9	1		70	N	
1	5/21/75	10	1		67	N	
1	5/21/75	11	1		67	N	
1	5/28/75	1	1		60	Y	
1	5/28/75	2	1		60	N	
1	5/28/75	3	1		60	N	
1	5/28/75	4	1		59	N	
1	5/28/75	5	1		59	N	
1	5/28/75	6	1		59	N	
1	5/28/75	7	1		58	N	
1	5/28/75	8	1		57	N	
1	5/28/75	9	1		57	N	
1	5/28/75	10	1		54	N	
1	5/28/75	11	1		54	N	
1	6/4/75	1	1		61	Y	
1	6/4/75	2	1		60	N	
1	6/4/75	3	1		60	N	
1	6/4/75	4	1		60	N	
1	6/4/75	5	1		59	N	
1	6/4/75	6	1		59	N	
1	6/4/75	7	1		58	N	
1	6/4/75	8	1		57	N	
1	6/4/75	9	1		57	N	
1	6/4/75	10	1		55	N	
1	6/4/75	11	1		55	N	
1	6/11/75	1	1		60	Y	
1	6/11/75	2	1		59	N	
1	6/11/75	3	1		59	N	
1	6/11/75	4	1		59	N	
1	6/11/75	5	1		59	N	
1	6/11/75	6	1		58	N	
1	6/11/75	7	1		58	N	
1	6/11/75	8	1		57	N	
1	6/11/75	9	1		56	N	
1	6/11/75	10	1		55	N	
1	6/11/75	11	1		55	N	
1	6/18/75	1	1		66	Y	
1	6/18/75	2	1		66	N	
1	6/18/75	3	1		66	N	
1	6/18/75	4	1		66	N	
1	6/18/75	5	1		65	N	
1	6/18/75	6	1		65	N	
1	6/18/75	7	1		64	N	
1	6/18/75	8	1		63	N	
1	6/18/75	9	1		62	N	
1	6/18/75	10	1		61	N	
1	6/18/75	11	1		62	N	
1	6/25/75	1	1		64	Y	
1	6/25/75	2	1		63	N	
1	6/25/75	3	1		63	N	
1	6/25/75	4	1		62	N	
1	6/25/75	5	1		62	N	
1	6/25/75	6	1		61	N	
1	6/25/75	7	1		60	N	
1	6/25/75	8	1		60	N	
1	6/25/75	9	1		60	N	
1	6/25/75	10	1		59	N	
1	6/25/75	11	1		58	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-202							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/2/75	1	1		67	Y	
1	7/2/75	2	1		66	N	
1	7/2/75	3	1		66	N	
1	7/2/75	4	1		65	N	
1	7/2/75	5	1		65	N	
1	7/2/75	6	1		64	N	
1	7/2/75	7	1		63	N	
1	7/2/75	8	1		63	N	
1	7/2/75	9	1		62	N	
1	7/2/75	10	1		62	N	
1	7/2/75	11	1		63	N	
1	7/9/75	1	1		60	Y	
1	7/9/75	2	1		59	N	
1	7/9/75	3	1		58	N	
1	7/9/75	4	1		58	N	
1	7/9/75	5	1		58	N	
1	7/9/75	6	1		57	N	
1	7/9/75	7	1		57	N	
1	7/9/75	8	1		56	N	
1	7/9/75	9	1		55	N	
1	7/9/75	10	1		55	N	
1	7/9/75	11	1		57	N	
1	7/31/75	1	1		68	Y	
1	7/31/75	2	1		66	Y	
1	7/31/75	3	1		66	Y	
1	7/31/75	4	1		65	Y	
1	7/31/75	5	1		65	Y	
1	7/31/75	6	1		64	Y	
1	7/31/75	7	1		64	Y	
1	7/31/75	8	1		63	Y	
1	7/31/75	9	1		63	Y	
1	7/31/75	10	1		64	Y	
1	7/31/75	11	1		67	Y	
1	1/7/76	1	1		73	N	
1	1/7/76	2	1		73	N	
1	1/7/76	3	1		73	N	
1	1/7/76	4	1		73	N	
1	1/7/76	5	1		73	N	
1	1/7/76	6	1		74	Y	
1	1/7/76	7	1		74	N	
1	1/7/76	8	1		73	N	
1	1/7/76	9	1		73	N	
1	1/7/76	10	1		69	N	
1	1/7/76	11	1		65	N	
1	4/1/76	1	1		57	N	
1	4/1/76	2	1		58	Y	
1	4/1/76	3	1		58	Y	
1	4/1/76	4	1		57	Y	
1	4/1/76	5	1		57	Y	
1	4/1/76	6	1		56	Y	
1	4/1/76	7	1		55	Y	
1	4/1/76	8	1		54	Y	
1	4/1/76	9	1		54	Y	
1	4/1/76	10	1		58	Y	
1	4/1/76	11	1		55	Y	
1	7/9/76	1	1		63	Y	
1	7/9/76	2	1		63	N	
1	7/9/76	3	1		63	N	
1	7/9/76	4	1		62	N	
1	7/9/76	5	1		62	N	
1	7/9/76	6	1		61	N	
1	7/9/76	7	1		60	N	
1	7/9/76	8	1		59	N	
1	7/9/76	9	1		58	N	
1	7/9/76	10	1		58	N	
1	7/9/76	11	1		60	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-202							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/16/76	1	1		62	Y	
1	7/16/76	2	1		60	N	
1	7/16/76	3	1		60	N	
1	7/16/76	4	1		60	N	
1	7/16/76	5	1		59	N	
1	7/16/76	6	1		59	N	
1	7/16/76	7	1		58	N	
1	7/16/76	8	1		58	N	
1	7/16/76	9	1		57	N	
1	7/16/76	10	1		57	N	
1	7/16/76	11	1		60	N	
1	7/31/76	1	1		68	Y	
1	7/31/76	2	1		66	N	
1	7/31/76	3	1		66	N	
1	7/31/76	4	1		65	N	
1	7/31/76	5	1		65	N	
1	7/31/76	6	1		64	N	
1	7/31/76	7	1		64	N	
1	7/31/76	8	1		63	N	
1	7/31/76	9	1		63	N	
1	7/31/76	10	1		64	N	
1	7/31/76	11	1		67	N	
1	11/7/76	2	1		63	N	
1	11/7/76	3	1		63	N	
1	11/7/76	4	1		62	N	
1	11/7/76	5	1		62	N	
1	11/7/76	6	1		62	N	
1	11/7/76	7	1		62	N	
1	11/7/76	8	1		62	N	
1	11/7/76	9	1		63	N	
1	11/7/76	10	1		64	N	
1	11/7/76	11	1		65	Y	
1	1/3/77	1	1		74	Y	
1	1/3/77	2	1		73	N	
1	1/3/77	3	1		73	N	
1	1/3/77	4	1		73	N	
1	1/3/77	5	1		73	N	
1	1/3/77	6	1		73	N	
1	1/3/77	7	1		73	N	
1	1/3/77	8	1		73	N	
1	1/3/77	9	1		73	N	
1	1/3/77	10	1		69	N	
1	1/3/77	11	1		65	N	
1	4/26/77	1	1		61	Y	
1	4/26/77	2	1		60	N	
1	4/26/77	3	1		60	N	
1	4/26/77	4	1		60	N	
1	4/26/77	5	1		59	N	
1	4/26/77	6	1		59	N	
1	4/26/77	7	1		58	N	
1	4/26/77	8	1		57	N	
1	4/26/77	9	1		55	N	
1	4/26/77	10	1		52	N	
1	4/26/77	11	1		51	N	
1	7/28/77	1	1		55	N	
1	7/28/77	2	1		55	N	
1	7/28/77	3	1		55	N	
1	7/28/77	4	1		54	N	
1	7/28/77	5	1		54	N	
1	7/28/77	6	1		54	N	
1	7/28/77	7	1		54	N	
1	7/28/77	8	1		55	N	
1	7/28/77	9	1		55	N	
1	7/28/77	10	1		55	N	
1	7/28/77	11	1		57	Y	
1	7/28/77	12	1		56	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-202							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	10/7/77	1	1		65	N	
1	10/7/77	2	1		65	N	
1	10/7/77	3	1		65	N	
1	10/7/77	4	1		65	N	
1	10/7/77	5	1		65	N	
1	10/7/77	6	1		66	N	
1	10/7/77	7	1		67	N	
1	10/7/77	8	1		67	N	
1	10/7/77	9	1		67	N	
1	10/7/77	10	1		68	N	
1	10/7/77	11	1		69	Y	
1	1/16/78	1	1		69	Y	
1	1/16/78	2	1		67	N	
1	1/16/78	3	1		67	N	
1	1/16/78	4	1		66	N	
1	1/16/78	5	1		64	N	
1	1/16/78	6	1		61	N	
1	1/16/78	7	1		60	N	
1	1/16/78	8	1		60	N	
1	1/16/78	9	1		60	N	
1	1/16/78	10	1		60	N	
1	1/16/78	11	1		59	N	
1	4/23/78	1	1		69	Y	
1	4/23/78	2	1		69	N	
1	4/23/78	3	1		68	N	
1	4/23/78	4	1		68	N	
1	4/23/78	5	1		65	N	
1	4/23/78	6	1		63	N	
1	4/23/78	7	1		63	N	
1	4/23/78	8	1		63	N	
1	4/23/78	9	1		62	N	
1	4/23/78	10	1		62	N	
1	4/23/78	11	1		62	N	
1	4/25/78	1	1		68	N	
1	4/25/78	2	1		70	Y	
1	4/25/78	3	1		67	N	
1	4/25/78	4	1		65	N	
1	4/25/78	5	1		64	N	
1	4/25/78	6	1		62	N	
1	4/25/78	7	1		61	N	
1	4/25/78	8	1		61	N	
1	4/25/78	9	1		61	N	
1	4/25/78	10	1		61	N	
1	4/25/78	11	1		61	N	
1	4/25/78	12	1		61	N	
1	7/16/78	1	1		69	Y	
1	7/16/78	2	1		68	N	
1	7/16/78	3	1		67	N	
1	7/16/78	4	1		67	N	
1	7/16/78	5	1		66	N	
1	7/16/78	6	1		66	N	
1	7/16/78	7	1		66	N	
1	7/16/78	8	1		66	N	
1	7/16/78	9	1		66	N	
1	7/16/78	10	1		66	N	
1	7/16/78	11	1		66	N	
1	7/16/78	12	1		66	N	
1	1/10/79	1	1		69	Y	
1	1/10/79	2	1		69	N	
1	1/10/79	3	1		69	N	
1	1/10/79	4	1		67	N	
1	1/10/79	5	1		67	N	
1	1/10/79	6	1		64	N	
1	1/10/79	7	1		63	N	
1	1/10/79	8	1		63	N	
1	1/10/79	9	1		63	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-202							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/10/79	10	1		63	N	
1	1/10/79	11	1		63	N	
1	1/10/79	12	1		54	N	
1	4/8/79	1	1		73	Y	
1	4/8/79	2	1		72	N	
1	4/8/79	3	1		71	N	
1	4/8/79	4	1		70	N	
1	4/8/79	5	1		68	N	
1	4/8/79	6	1		66	N	
1	4/8/79	7	1		65	N	
1	4/8/79	8	1		65	N	
1	4/8/79	9	1		65	N	
1	4/8/79	10	1		64	N	
1	4/8/79	11	1		64	N	
1	4/16/82	1	1		57	Y	
1	4/16/82	2	1		57	N	
1	4/16/82	3	1		56	N	
1	4/16/82	4	1		55	N	
1	4/16/82	5	1		54	N	
1	4/16/82	6	1		52	N	
1	4/16/82	7	1		51	N	
1	4/16/82	8	1		51	N	
1	4/16/82	9	1		51	N	
1	4/16/82	10	1		51	N	
1	4/16/82	11	1		51	N	
1	7/5/89	1	1		106	N	
1	7/5/89	2	1		106.5	N	
1	7/5/89	3	1		107.4	N	
1	7/5/89	4	1		107.9	N	
1	7/5/89	5	1		108.6	N	
1	7/5/89	6	1		109.2	N	
1	7/5/89	7	1		109.1	N	
1	7/5/89	8	1		109.4	N	
1	7/5/89	9	1		109.7	Y	
1	7/5/89	10	1		109.7	N	
1	7/5/89	11	1		109.3	N	
1	1/1/90	1	1		66.1	N	
1	1/1/90	2	1		66.2	Y	
1	1/1/90	3	1		66.1	N	
1	1/1/90	4	1		66	N	
1	1/1/90	5	1		65	N	
1	1/1/90	6	1		64.3	N	
1	1/1/90	7	1		63	N	
1	1/1/90	8	1		63	N	
1	1/1/90	9	1		62.8	N	
1	1/1/90	10	1		62.7	N	
1	1/1/90	11	1		62	N	
1	1/1/90	12	1		62	N	
1	11/12/91	1	1		59	N	J-TI-023
1	11/12/91	2	1		60	N	
1	11/12/91	3	1		60	N	
1	11/12/91	4	1		61	N	
1	11/12/91	5	1		61	N	
1	11/12/91	6	1		63	Y	
1	11/12/91	7	1		63	N	
1	11/12/91	8	1		63	N	
1	11/12/91	9	1		63	N	
1	11/12/91	10	1		63	N	
1	11/12/91	11	1		63	N	
1	1/1/92	1	1		61.9	N	J-900925741-79 TC #12 O/S
1	1/1/92	2	1		62	N	
1	1/1/92	3	1		62.3	N	
1	1/1/92	4	1		62.5	Y	
1	1/1/92	5	1		62.5	N	
1	1/1/92	6	1		61.9	N	
1	1/1/92	7	1		60.8	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-202							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/1/92	8	1		60.7	N	
1	1/1/92	9	1		60.6	N	
1	1/1/92	10	1		60.5	N	
1	1/1/92	11	1		60	N	
1	7/2/92	1	1			N	UNABLE TO GET RDGS J-3 WRITTEN
1	11/4/92	1	1			N	#S&DA-92-488 NO RDGS SINCE JANUARY 1992
1	11/6/92	1	1		62.6	N	J 817-13-55-001
1	11/6/92	2	1		62.8	N	
1	11/6/92	3	1		63.1	N	
1	11/6/92	4	1		63.6	N	
1	11/6/92	5	1		64.5	N	
1	11/6/92	6	1		64.5	N	
1	11/6/92	7	1		66.1	N	
1	11/6/92	8	1		66.4	N	
1	11/6/92	9	1		66.5	N	
1	11/6/92	10	1		66.6	N	
1	11/6/92	11	1		67	Y	
1	1/3/93	1	1		58.6	N	J 890523512-47
1	1/3/93	2	1		58.8	N	
1	1/3/93	3	1		59.1	N	
1	1/3/93	4	1		59.3	Y	
1	1/3/93	5	1		59.3	N	
1	1/3/93	6	1		58.2	N	
1	1/3/93	7	1		56.8	N	
1	1/3/93	8	1		56.8	N	
1	1/3/93	9	1		56.8	N	
1	1/3/93	10	1		56.6	N	
1	1/3/93	11	1		56	N	
1	7/1/93	1	1		61.2	N	J 910126143-66
1	7/1/93	2	1		60.8	N	
1	7/1/93	3	1		60.2	N	
1	7/1/93	4	1		59.6	N	
1	7/1/93	5	1		59	N	
1	7/1/93	6	1		58.7	N	
1	7/1/93	7	1		58.8	N	
1	7/1/93	8	1		58.8	N	
1	7/1/93	9	1		58.9	N	
1	7/1/93	10	1		59.1	N	
1	7/1/93	11	1		59.8	N	
369 Records selected.							

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-203 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	1	1		75	Y	
1	5/21/75	2	1		75	N	
1	5/21/75	3	1		74	N	
1	5/21/75	4	1		74	N	
1	5/21/75	5	1		74	N	
1	5/21/75	6	1		72	N	
1	5/21/75	7	1		72	N	
1	5/21/75	8	1		70	N	
1	5/21/75	9	1		70	N	
1	5/21/75	10	1		66	N	
1	5/21/75	11	1		66	N	
1	5/28/75	1	1		60	Y	
1	5/28/75	2	1		60	N	
1	5/28/75	3	1		60	N	
1	5/28/75	4	1		59	N	
1	5/28/75	5	1		59	N	
1	5/28/75	6	1		59	N	
1	5/28/75	7	1		59	N	
1	5/28/75	8	1		58	N	
1	5/28/75	9	1		57	N	
1	5/28/75	10	1		55	N	
1	5/28/75	11	1		55	N	
1	6/4/75	1	1		63	Y	
1	6/4/75	2	1		62	N	
1	6/4/75	3	1		62	N	
1	6/4/75	4	1		62	N	
1	6/4/75	5	1		61	N	
1	6/4/75	6	1		61	N	
1	6/4/75	7	1		60	N	
1	6/4/75	8	1		59	N	
1	6/4/75	9	1		58	N	
1	6/4/75	10	1		56	N	
1	6/4/75	11	1		57	N	
1	6/11/75	1	1		60	Y	
1	6/11/75	2	1		60	N	
1	6/11/75	3	1		60	N	
1	6/11/75	4	1		60	N	
1	6/11/75	5	1		59	N	
1	6/11/75	6	1		59	N	
1	6/11/75	7	1		58	N	
1	6/11/75	8	1		58	N	
1	6/11/75	9	1		57	N	
1	6/11/75	10	1		55	N	
1	6/11/75	11	1		56	N	
1	6/18/75	1	1		68	Y	
1	6/18/75	2	1		67	N	
1	6/18/75	3	1		67	N	
1	6/18/75	4	1		66	N	
1	6/18/75	5	1		66	N	
1	6/18/75	6	1		66	N	
1	6/18/75	7	1		65	N	
1	6/18/75	8	1		64	N	
1	6/18/75	9	1		63	N	
1	6/18/75	10	1		62	N	
1	6/18/75	11	1		63	N	
1	6/25/75	1	1		64	Y	
1	6/25/75	2	1		63	N	
1	6/25/75	3	1		62	N	
1	6/25/75	4	1		62	N	
1	6/25/75	5	1		62	N	
1	6/25/75	6	1		61	N	
1	6/25/75	7	1		61	N	
1	6/25/75	8	1		60	N	
1	6/25/75	9	1		59	N	
1	6/25/75	10	1		58	N	
1	6/25/75	11	1		59	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-203							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/2/75	1	1		69	Y	
1	7/2/75	2	1		68	N	
1	7/2/75	3	1		67	N	
1	7/2/75	4	1		67	N	
1	7/2/75	5	1		66	N	
1	7/2/75	6	1		66	N	
1	7/2/75	7	1		65	N	
1	7/2/75	8	1		64	N	
1	7/2/75	9	1		69	N	
1	7/2/75	10	1		69	N	
1	7/2/75	11	1		64	N	
1	7/9/75	1	1		62	Y	
1	7/9/75	2	1		60	N	
1	7/9/75	3	1		60	N	
1	7/9/75	4	1		59	N	
1	7/9/75	5	1		59	N	
1	7/9/75	6	1		58	N	
1	7/9/75	7	1		58	N	
1	7/9/75	8	1		57	N	
1	7/9/75	9	1		56	N	
1	7/9/75	10	1		57	N	
1	7/9/75	11	1		58	N	
1	7/31/75	1	1		68	Y	
1	7/31/75	2	1		67	N	
1	7/31/75	3	1		66	N	
1	7/31/75	4	1		66	N	
1	7/31/75	5	1		65	N	
1	7/31/75	6	1		65	N	
1	7/31/75	7	1		64	N	
1	7/31/75	8	1		64	N	
1	7/31/75	9	1		63	N	
1	7/31/75	10	1		65	N	
1	7/31/75	11	1		67	N	
1	1/7/76	1	1		70	N	
1	1/7/76	2	1		70	N	
1	1/7/76	3	1		70	N	
1	1/7/76	4	1		70	N	
1	1/7/76	5	1		71	Y	
1	1/7/76	6	1		71	N	
1	1/7/76	7	1		71	N	
1	1/7/76	8	1		71	N	
1	1/7/76	9	1		71	N	
1	1/7/76	10	1		66	N	
1	1/7/76	11	1		63	N	
1	4/1/76	1	1		57	N	
1	4/1/76	2	1		58	N	
1	4/1/76	3	1		58	N	
1	4/1/76	4	1		58	N	
1	4/1/76	5	1		58	N	
1	4/1/76	6	1		57	N	
1	4/1/76	7	1		56	N	
1	4/1/76	8	1		55	N	
1	4/1/76	9	1		54	N	
1	4/1/76	10	1		55	N	
1	4/1/76	11	1		55	N	
1	4/1/76	12	1		59	Y	
1	7/9/76	1	1		63	Y	
1	7/9/76	2	1		62	N	
1	7/9/76	3	1		62	N	
1	7/9/76	4	1		61	N	
1	7/9/76	5	1		61	N	
1	7/9/76	6	1		60	N	
1	7/9/76	7	1		59	N	
1	7/9/76	8	1		59	N	
1	7/9/76	9	1		58	N	
1	7/9/76	10	1		58	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-203							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/9/76	11	1		60	N	
1	11/7/76	1	1		64	Y	
1	11/7/76	2	1		64	N	
1	11/7/76	3	1		64	N	
1	11/7/76	4	1		63	N	
1	11/7/76	5	1		63	N	
1	11/7/76	6	1		63	N	
1	11/7/76	7	1		63	N	
1	11/7/76	8	1		63	N	
1	11/7/76	9	1		64	N	
1	11/7/76	10	1		64	N	
1	11/7/76	11	1		64	N	
1	1/3/77	1	1		73	Y	
1	1/3/77	2	1		72	N	
1	1/3/77	3	1		72	N	
1	1/3/77	4	1		72	N	
1	1/3/77	5	1		71	N	
1	1/3/77	6	1		71	N	
1	1/3/77	7	1		71	N	
1	1/3/77	8	1		71	N	
1	1/3/77	9	1		71	N	
1	1/3/77	10	1		66	N	
1	1/3/77	11	1		64	N	
1	4/26/77	1	1		61	Y	
1	4/26/77	2	1		60	N	
1	4/26/77	3	1		60	N	
1	4/26/77	4	1		59	N	
1	4/26/77	5	1		59	N	
1	4/26/77	6	1		58	N	
1	4/26/77	7	1		57	N	
1	4/26/77	8	1		56	N	
1	4/26/77	9	1		55	N	
1	4/26/77	10	1		51	N	
1	4/26/77	11	1		51	N	
1	7/28/77	1	1		55	Y	
1	7/28/77	2	1		54	N	
1	7/28/77	3	1		54	N	
1	7/28/77	4	1		54	N	
1	7/28/77	5	1		53	N	
1	7/28/77	6	1		53	N	
1	7/28/77	7	1		52	N	
1	7/28/77	8	1		52	N	
1	7/28/77	9	1		52	N	
1	7/28/77	10	1		53	N	
1	7/28/77	11	1		55	N	
1	10/7/77	1	1		65	N	
1	10/7/77	2	1		65	N	
1	10/7/77	3	1		65	N	
1	10/7/77	4	1		64	N	
1	10/7/77	5	1		64	N	
1	10/7/77	6	1		64	N	
1	10/7/77	7	1		64	N	
1	10/7/77	8	1		64	N	
1	10/7/77	9	1		65	N	
1	10/7/77	10	1		68	N	
1	10/7/77	11	1		69	Y	
1	1/16/78	1	1		67	Y	
1	1/16/78	2	1		66	N	
1	1/16/78	3	1		66	N	
1	1/16/78	4	1		66	N	
1	1/16/78	5	1		66	N	
1	1/16/78	6	1		66	N	
1	1/16/78	7	1		66	N	
1	1/16/78	8	1		65	N	
1	1/16/78	9	1		60	N	
1	1/16/78	10	1		57	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-203							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/16/78	11	1		59	N	
1	4/23/78	1	1		69	Y	
1	4/23/78	2	1		69	N	
1	4/23/78	3	1		68	N	
1	4/23/78	4	1		68	N	
1	4/23/78	5	1		68	N	
1	4/23/78	6	1		68	N	
1	4/23/78	7	1		67	N	
1	4/23/78	8	1		65	N	
1	4/23/78	9	1		64	N	
1	4/23/78	10	1		61	N	
1	4/23/78	11	1		59	N	
1	4/25/78	1	1		69	Y	
1	4/25/78	2	1		68	N	
1	4/25/78	3	1		68	N	
1	4/25/78	4	1		68	N	
1	4/25/78	5	1		67	N	
1	4/25/78	6	1		67	N	
1	4/25/78	7	1		66	N	
1	4/25/78	8	1		65	N	
1	4/25/78	9	1		62	N	
1	4/25/78	10	1		60	N	
1	4/25/78	11	1		59	N	
1	4/25/78	12	1		59	N	
1	7/16/78	1	1		68	Y	
1	7/16/78	2	1		67	N	
1	7/16/78	3	1		67	N	
1	7/16/78	4	1		67	N	
1	7/16/78	5	1		66	N	
1	7/16/78	6	1		66	N	
1	7/16/78	7	1		65	N	
1	7/16/78	8	1		65	N	
1	7/16/78	9	1		64	N	
1	7/16/78	10	1		65	N	
1	7/16/78	11	1		67	N	
1	1/9/79	1	1		66	Y	
1	1/9/79	2	1		65	N	
1	1/9/79	3	1		65	N	
1	1/9/79	4	1		65	N	
1	1/9/79	5	1		65	N	
1	1/9/79	6	1		64	N	
1	1/9/79	7	1		64	N	
1	1/9/79	8	1		62	N	
1	1/9/79	9	1		58	N	
1	1/9/79	10	1		58	N	
1	1/9/79	11	1		55	N	
1	1/9/79	12	1		48	N	
1	4/8/79	1	1		78	Y	
1	4/8/79	2	1		77	N	
1	4/8/79	3	1		76	N	
1	4/8/79	4	1		76	N	
1	4/8/79	5	1		75	N	
1	4/8/79	6	1		74	N	
1	4/8/79	7	1		73	N	
1	4/8/79	8	1		72	N	
1	4/8/79	9	1		70	N	
1	4/8/79	10	1		66	N	
1	4/8/79	11	1		64	N	
1	4/16/82	1	1		62	Y	
1	4/16/82	2	1		61	N	
1	4/16/82	3	1		61	N	
1	4/16/82	4	1		61	N	
1	4/16/82	5	1		61	N	
1	4/16/82	6	1		60	N	
1	4/16/82	7	1		59	N	
1	4/16/82	8	1		59	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-203 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	4/16/82	9	1		57	N	
1	4/16/82	10	1		54	N	
1	4/16/82	11	1		52	N	
1	7/5/89	1	1		108.7	N	
1	7/5/89	2	1		108.1	N	
1	7/5/89	3	1		108.1	N	
1	7/5/89	4	1		108	N	
1	7/5/89	5	1		108.3	N	
1	7/5/89	6	1		108:8	N	
1	7/5/89	7	1		109.5	N	
1	7/5/89	8	1		109.8	N	
1	7/5/89	9	1		110.3	N	
1	7/5/89	10	1		109.6	N	
1	7/5/89	11	1		108.4	N	
1	1/1/90	1	1		62.1	N	
1	1/1/90	2	1		62.4	N	
1	1/1/90	3	1		62.4	N	
1	1/1/90	4	1		62	N	
1	1/1/90	5	1		63.1	N	
1	1/1/90	6	1		63.3	N	
1	1/1/90	7	1		63.2	N	
1	1/1/90	8	1		64	Y	
1	1/1/90	9	1		64	N	
1	1/1/90	10	1		64	N	
1	1/1/90	11	1		64.3	N	
1	1/1/90	12	1		61	N	
1	11/12/91	1	1		60	N	J-TI-023
1	11/12/91	2	1		60	N	
1	11/12/91	3	1		60	N	
1	11/12/91	4	1		60	N	
1	11/12/91	5	1		60	N	
1	11/12/91	6	1		60	N	
1	11/12/91	7	1		60	N	
1	11/12/91	8	1		61	N	
1	11/12/91	9	1		62	N	
1	11/12/91	10	1		64	Y	
1	11/12/91	11	1		64	N	
1	1/1/92	1	1		62	N	J-900925741-79 TC #12 O/S
1	1/1/92	2	1		62	N	
1	1/1/92	3	1		62	N	
1	1/1/92	4	1		62.2	N	
1	1/1/92	5	1		62.3	N	
1	1/1/92	6	1		61.6	N	
1	1/1/92	7	1		60.8	N	
1	1/1/92	8	1		63.1	Y	
1	1/1/92	9	1		60.2	N	
1	1/1/92	10	1		60.8	N	
1	1/1/92	11	1		59.2	N	
1	7/2/92	1	1			N	UNABLE TO GET RDGS J-3 WRITTEN
1	11/4/92	1	1			N	#S&DA-92-488 NO RDGS SINCE JANUARY 1992
1	11/6/92	1	1		62.6	N	J 817-13-55-001
1	11/6/92	2	1		62.6	N	
1	11/6/92	3	1		62.6	N	
1	11/6/92	4	1		62.7	N	
1	11/6/92	5	1		62.9	N	
1	11/6/92	6	1		63.1	N	
1	11/6/92	7	1		63.6	N	
1	11/6/92	8	1		64.3	N	
1	11/6/92	9	1		65.2	N	
1	11/6/92	10	1		67.1	N	
1	11/6/92	11	1		67.6	Y	
1	1/3/93	1	1		58.4	N	J 890523512-47
1	1/3/93	2	1		58.8	N	
1	1/3/93	3	1		58.7	N	
1	1/3/93	4	1		58.9	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-203							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/3/93	5	1		59.3	N	
1	1/3/93	6	1		59.5	N	
1	1/3/93	7	1		59.8	N	
1	1/3/93	8	1		60	Y	
1	1/3/93	9	1		60	N	
1	1/3/93	10	1		56.8	N	
1	1/3/93	11	1		54.7	N	
1	7/1/93	1	1		61.8	N	J 910126143-66
1	7/1/93	2	1		61.7	N	
1	7/1/93	3	1		61.5	N	
1	7/1/93	4	1		61.2	N	
1	7/1/93	5	1		60.6	N	
1	7/1/93	6	1		60.1	N	
1	7/1/93	7	1		59.5	N	
1	7/1/93	8	1		58.7	N	
1	7/1/93	9	1		58.1	N	
1	7/1/93	10	1		58.3	N	
1	7/1/93	11	1		59.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-204							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	5/21/75	1	1		72	Y	
1	5/21/75	2	1		72	N	
1	5/21/75	3	1		72	N	
1	5/21/75	4	1		72	N	
1	5/21/75	5	1		72	N	
1	5/21/75	6	1		72	N	
1	5/21/75	7	1		71	N	
1	5/21/75	8	1		70	N	
1	5/21/75	9	1		69	N	
1	5/21/75	10	1		66	N	
1	5/21/75	11	1		66	N	
1	7/16/75	1	1		61	Y	
1	7/16/75	2	1		60	N	
1	7/16/75	3	1		60	N	
1	7/16/75	4	1		60	N	
1	7/16/75	5	1		59	N	
1	7/16/75	6	1		59	N	
1	7/16/75	7	1		58	N	
1	7/16/75	8	1		58	N	
1	7/16/75	9	1		57	N	
1	7/16/75	10	1		58	N	
1	7/16/75	11	1		60	N	
1	7/31/75	1	1		68	Y	
1	7/31/75	2	1		67	N	
1	7/31/75	3	1		67	N	
1	7/31/75	4	1		66	N	
1	7/31/75	5	1		66	N	
1	7/31/75	6	1		65	N	
1	7/31/75	7	1		65	N	
1	7/31/75	8	1		64	N	
1	7/31/75	9	1		64	N	
1	7/31/75	10	1		66	N	
1	7/31/75	11	1		68	N	
1	1/7/76	1	1		60	N	
1	1/7/76	2	1		61	N	
1	1/7/76	3	1		61	N	
1	1/7/76	4	1		62	N	
1	1/7/76	5	1		62	N	
1	1/7/76	6	1		63	N	
1	1/7/76	7	1		63	N	
1	1/7/76	8	1		64	Y	
1	1/7/76	9	1		63	N	
1	1/7/76	10	1		58	N	
1	1/7/76	11	1		57	N	
1	7/9/76	1	1		62	Y	
1	7/9/76	2	1		61	N	
1	7/9/76	3	1		61	N	
1	7/9/76	4	1		60	N	
1	7/9/76	5	1		60	N	
1	7/9/76	6	1		59	N	
1	7/9/76	7	1		58	N	
1	7/9/76	8	1		58	N	
1	7/9/76	9	1		57	N	
1	7/9/76	10	1		57	N	
1	7/9/76	11	1		59	N	
1	11/7/76	1	1		61	N	
1	11/7/76	2	1		61	N	
1	11/7/76	3	1		61	N	
1	11/7/76	4	1		60	N	
1	11/7/76	5	1		61	N	
1	11/7/76	6	1		61	N	
1	11/7/76	7	1		61	N	
1	11/7/76	8	1		62	N	
1	11/7/76	9	1		62	N	
1	11/7/76	10	1		63	N	
1	11/7/76	11	1		64	Y	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-204							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	1/3/77	1	1		68	N	
1	1/3/77	2	1		68	N	
1	1/3/77	3	1		68	N	
1	1/3/77	4	1		68	N	
1	1/3/77	5	1		69	Y	
1	1/3/77	6	1		69	N	
1	1/3/77	7	1		69	N	
1	1/3/77	8	1		69	N	
1	1/3/77	9	1		68	N	
1	1/3/77	10	1		63	N	
1	1/3/77	11	1		62	N	
1	4/26/77	1	1		60	Y	
1	4/26/77	2	1		60	N	
1	4/26/77	3	1		60	N	
1	4/26/77	4	1		59	N	
1	4/26/77	5	1		59	N	
1	4/26/77	6	1		58	N	
1	4/26/77	7	1		57	N	
1	4/26/77	8	1		56	N	
1	4/26/77	9	1		55	N	
1	4/26/77	10	1		51	N	
1	4/26/77	11	1		51	N	
1	7/28/77	1	1		55	Y	
1	7/28/77	2	1		54	N	
1	7/28/77	3	1		54	N	
1	7/28/77	4	1		53	N	
1	7/28/77	5	1		53	N	
1	7/28/77	6	1		52	N	
1	7/28/77	7	1		52	N	
1	7/28/77	8	1		51	N	
1	7/28/77	9	1		51	N	
1	7/28/77	10	1		53	N	
1	7/28/77	11	1		55	N	
1	10/7/77	1	1		66	N	
1	10/7/77	2	1		66	N	
1	10/7/77	3	1		65	N	
1	10/7/77	4	1		65	N	
1	10/7/77	5	1		64	N	
1	10/7/77	6	1		64	N	
1	10/7/77	7	1		64	N	
1	10/7/77	8	1		65	N	
1	10/7/77	9	1		66	N	
1	10/7/77	10	1		68	N	
1	10/7/77	11	1		70	Y	
1	1/16/78	1	1		74	Y	
1	1/16/78	2	1		73	N	
1	1/16/78	3	1		73	N	
1	1/16/78	4	1		74	N	
1	1/16/78	5	1		74	N	
1	1/16/78	6	1		74	N	
1	1/16/78	7	1		73	N	
1	1/16/78	8	1		73	N	
1	1/16/78	9	1		72	N	
1	1/16/78	10	1		66	N	
1	1/16/78	11	1		65	N	
1	4/23/78	1	1		70	Y	
1	4/23/78	2	1		69	N	
1	4/23/78	3	1		69	N	
1	4/23/78	4	1		68	N	
1	4/23/78	5	1		67	N	
1	4/23/78	6	1		67	N	
1	4/23/78	7	1		66	N	
1	4/23/78	8	1		65	N	
1	4/23/78	9	1		63	N	
1	4/23/78	10	1		59	N	
1	4/23/78	11	1		58	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-204							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/16/78	1	1		69	Y	
1	7/16/78	2	1		68	N	
1	7/16/78	3	1		68	N	
1	7/16/78	4	1		68	N	
1	7/16/78	5	1		68	N	
1	7/16/78	6	1		68	N	
1	7/16/78	7	1		68	N	
1	7/16/78	8	1		68	N	
1	7/16/78	9	1		68	N	
1	7/16/78	10	1		68	N	
1	7/16/78	11	1		68	N	
1	7/16/78	12	1		68	N	
1	1/9/79	1	1		54	N	
1	1/9/79	2	1		54	N	
1	1/9/79	3	1		54	N	
1	1/9/79	4	1		53	N	
1	1/9/79	5	1		53	N	
1	1/9/79	6	1		53	N	
1	1/9/79	7	1		53	N	
1	1/9/79	8	1		55	Y	
1	1/9/79	9	1		55	N	
1	1/9/79	10	1		54	N	
1	1/9/79	11	1		54	N	
1	1/9/79	12	1		47	N	
1	4/8/79	1	1		75	N	
1	4/8/79	2	1		75	N	
1	4/8/79	3	1		75	N	
1	4/8/79	4	1		76	Y	
1	4/8/79	5	1		74	N	
1	4/8/79	6	1		73	N	
1	4/8/79	7	1		73	N	
1	4/8/79	8	1		71	N	
1	4/8/79	9	1		69	N	
1	4/8/79	10	1		64	N	
1	4/8/79	11	1		63	N	
1	7/23/79	1	1		50	Y	
1	7/23/79	2	1		48	N	
1	7/23/79	3	1		48	N	
1	7/23/79	4	1		47	N	
1	7/23/79	5	1		47	N	
1	7/23/79	6	1		46	N	
1	7/23/79	7	1		46	N	
1	7/23/79	8	1		45	N	
1	7/23/79	9	1		45	N	
1	7/23/79	10	1		48	N	
1	4/16/82	1	1		59	Y	
1	4/16/82	2	1		58	N	
1	4/16/82	3	1		58	N	
1	4/16/82	4	1		58	N	
1	4/16/82	5	1		57	N	
1	4/16/82	6	1		57	N	
1	4/16/82	7	1		57	N	
1	4/16/82	8	1		55	N	
1	4/16/82	9	1		54	N	
1	4/16/82	10	1		49	N	
1	4/16/82	11	1		49	N	
1	7/5/89	1	1		105.3	N	
1	7/5/89	2	1		105.4	N	
1	7/5/89	3	1		107	N	
1	7/5/89	4	1		107	N	
1	7/5/89	5	1		107.5	N	
1	7/5/89	6	1		108.3	N	
1	7/5/89	7	1		108.9	N	
1	7/5/89	8	1		109.5	N	
1	7/5/89	9	1		110.1	Y	
1	7/5/89	10	1		108.8	N	

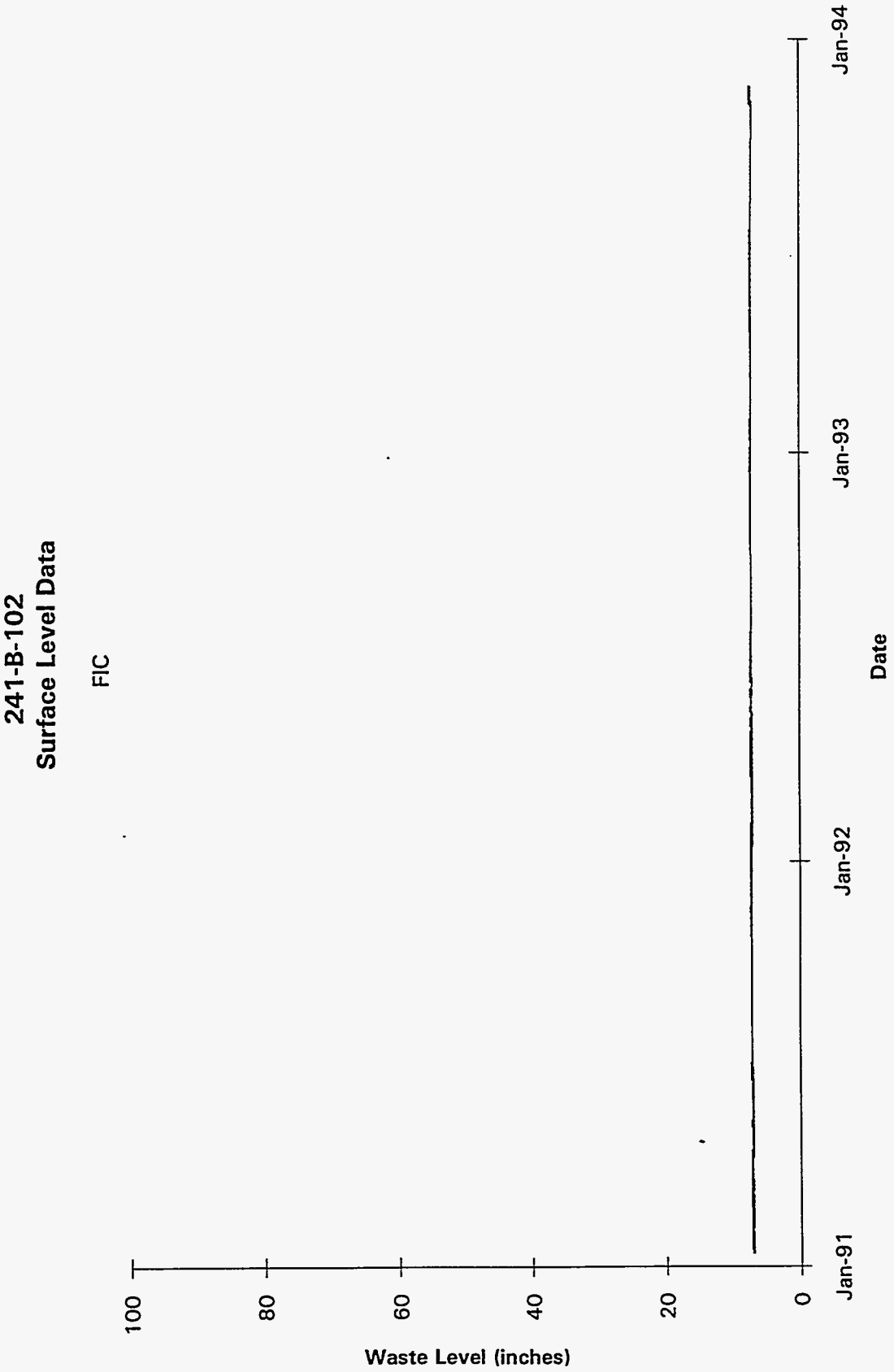
Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

TANK 241-B-204 THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/5/89	11	1		107.7	N	
1	1/1/90	1	1		61.1	N	
1	1/1/90	2	1		66.2	N	
1	1/1/90	3	1		66.7	N	
1	1/1/90	4	1		67.1	Y	
1	1/1/90	5	1		67	N	
1	1/1/90	6	1		67.1	N	
1	1/1/90	7	1		67	N	
1	1/1/90	8	1		67	N	
1	1/1/90	9	1		67	N	
1	1/1/90	10	1		67	N	
1	1/1/90	11	1		63	N	
1	1/1/90	12	1		63	N	
1	11/12/91	1	1		60	N	J-TI-023
1	11/12/91	2	1		60	N	
1	11/12/91	3	1		60	N	
1	11/12/91	4	1		60	N	
1	11/12/91	5	1		60	N	
1	11/12/91	6	1		60	N	
1	11/12/91	7	1		61	N	
1	11/12/91	8	1		61	N	
1	11/12/91	9	1		62	N	
1	11/12/91	10	1		64	Y	
1	11/12/91	11	1		64	Y	
1	1/4/92	1	1		60.9	N	J 910126143-50 HH-99A-J
1	1/4/92	2	1		60.8	N	
1	1/4/92	3	1		60.8	N	
1	1/4/92	4	1		60.9	N	
1	1/4/92	5	1		61.1	N	
1	1/4/92	6	1		61.4	N	
1	1/4/92	7	1		61.7	N	
1	1/4/92	8	1		61.9	N	
1	1/4/92	9	1		61.8	N	
1	1/4/92	10	1		66.7	Y	
1	1/4/92	11	1		62.8	N	
1	7/2/92	1	1			N	UNABLE TO GET RDGS J-3 WRITTEN
1	11/4/92	1	1			N	#S&DA-92-488 NO RDGS SINCE JANUARY 1992
1	11/6/92	1	1		63	N	J 817-13-55-001
1	11/6/92	2	1		62.9	N	
1	11/6/92	3	1		62.9	N	
1	11/6/92	4	1		63	N	
1	11/6/92	5	1		63.1	N	
1	11/6/92	6	1		63.4	N	
1	11/6/92	7	1		63.9	N	
1	11/6/92	8	1		64.5	N	
1	11/6/92	9	1		65.5	N	
1	11/6/92	10	1		67.5	N	
1	11/6/92	11	1		67.9	Y	
1	1/3/93	1	1		58.7	N	J 890523512-47
1	1/3/93	2	1		58.7	N	
1	1/3/93	3	1		58.8	N	
1	1/3/93	4	1		59.1	N	
1	1/3/93	5	1		59.4	N	
1	1/3/93	6	1		59.7	N	
1	1/3/93	7	1		60	N	
1	1/3/93	8	1		60.2	Y	
1	1/3/93	9	1		60.1	N	
1	1/3/93	10	1		56	N	
1	1/3/93	11	1		55.1	N	
1	7/1/93	1	1		61.9	N	J 910126143-66
1	7/1/93	2	1		61.8	N	
1	7/1/93	3	1		61.6	N	
1	7/1/93	4	1		61.2	N	
1	7/1/93	5	1		60.8	N	
1	7/1/93	6	1		60.3	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

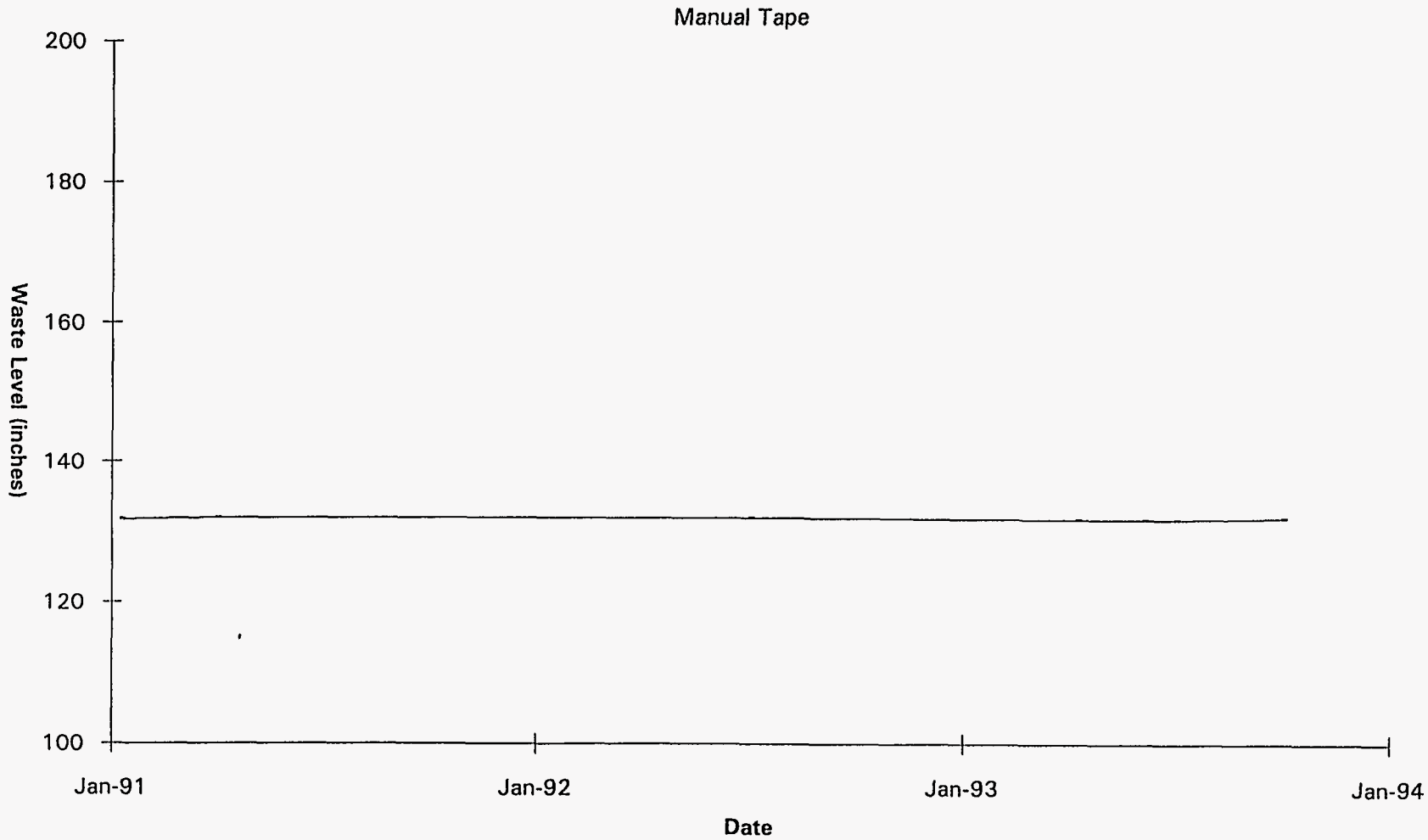
TANK 241-B-204							
THERMOCOUPLE DATA							
TREE #	DATE	THERMO #	TREE SET #	TEMP C	TEMP F	Y=MAX TEMP	COMMENTS
1	7/1/93	7	1		59.5	N	
1	7/1/93	8	1		58.7	N	
1	7/1/93	9	1		58	N	
1	7/1/93	10	1		58.5	N	
1	7/1/93	11	1		59.6	N	

Data obtained from WHC Surveillance Analysis Computer System (SACS), June 2, 1993.

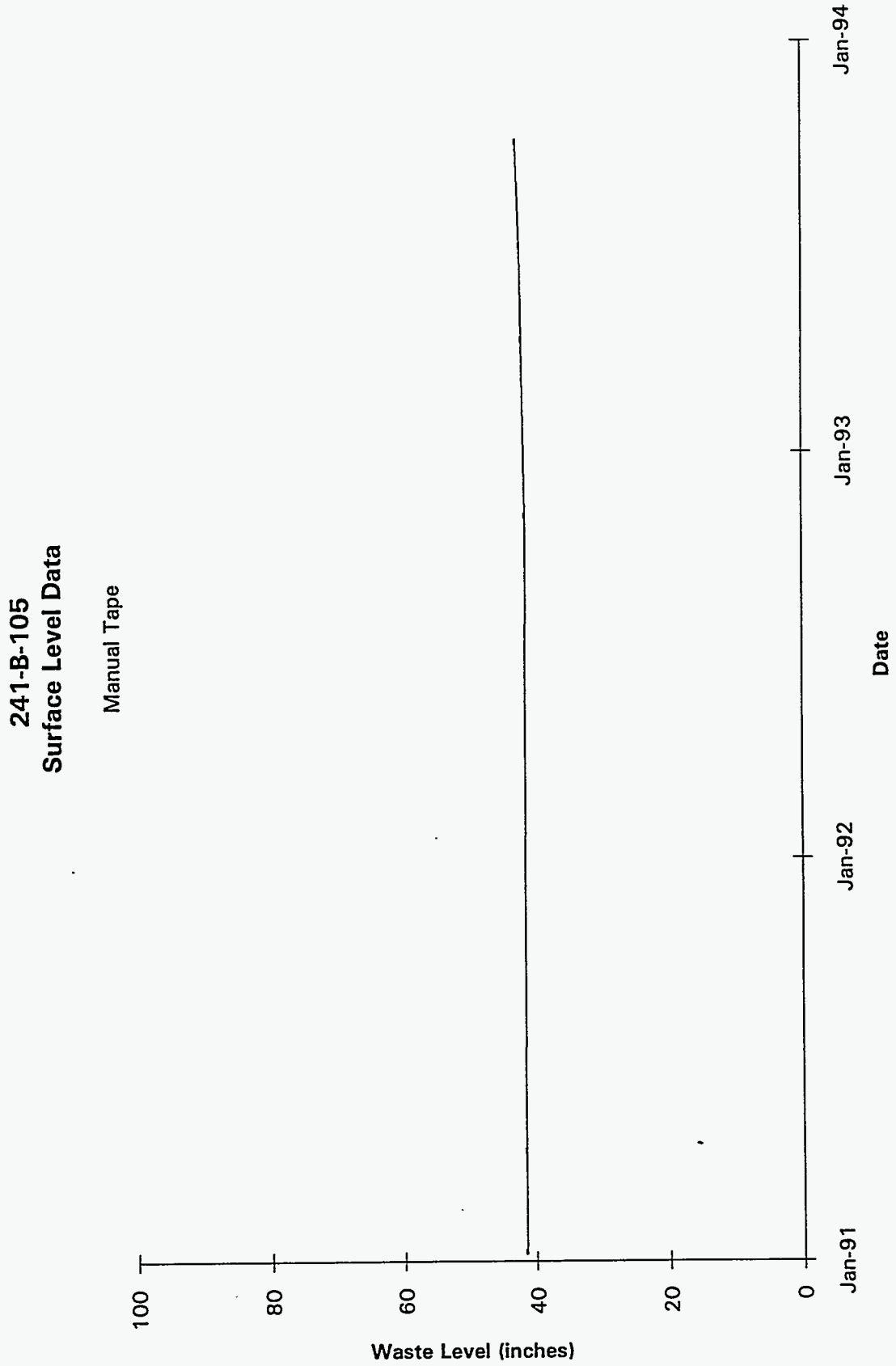


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-104
Surface Level Data

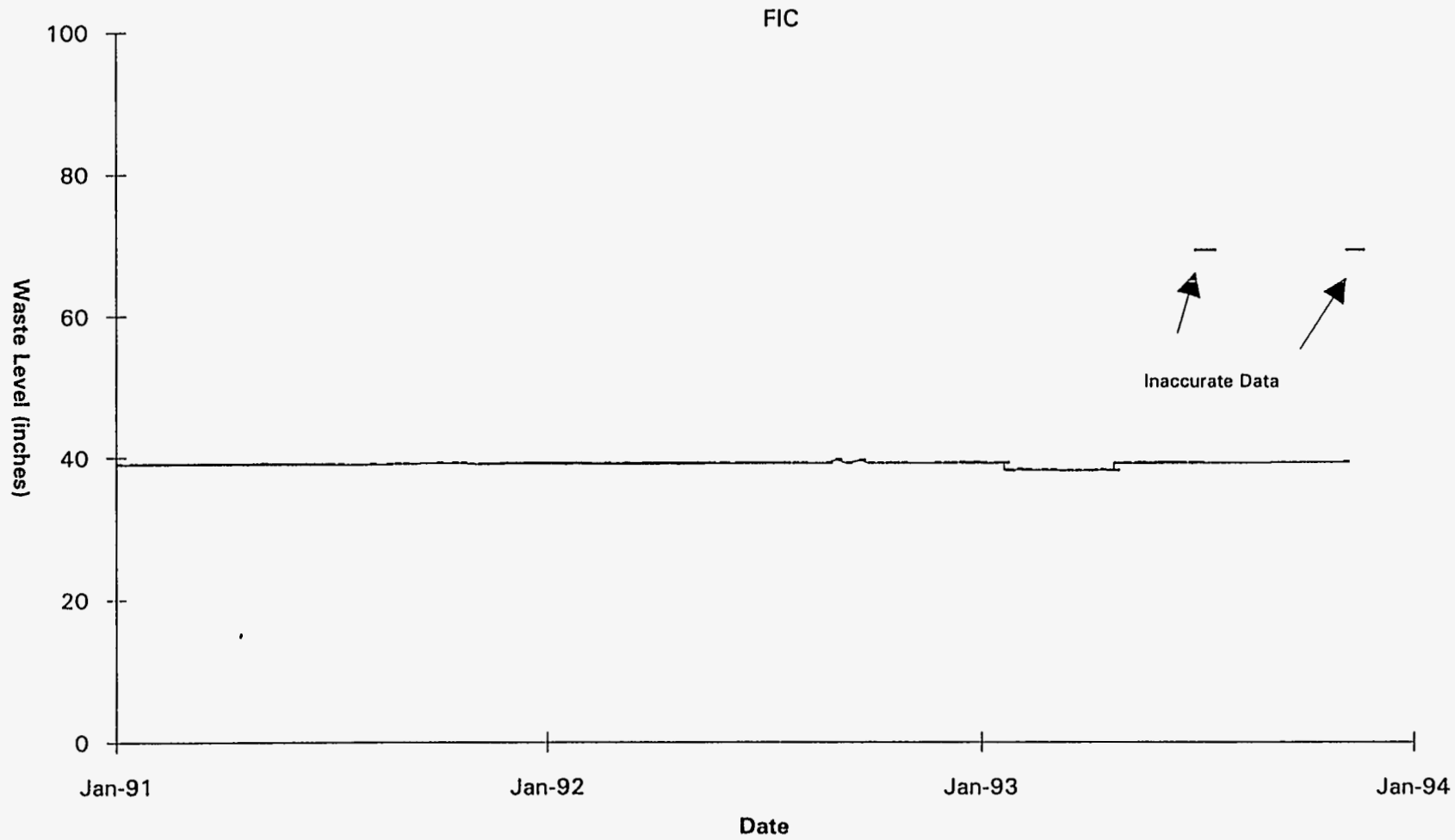


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

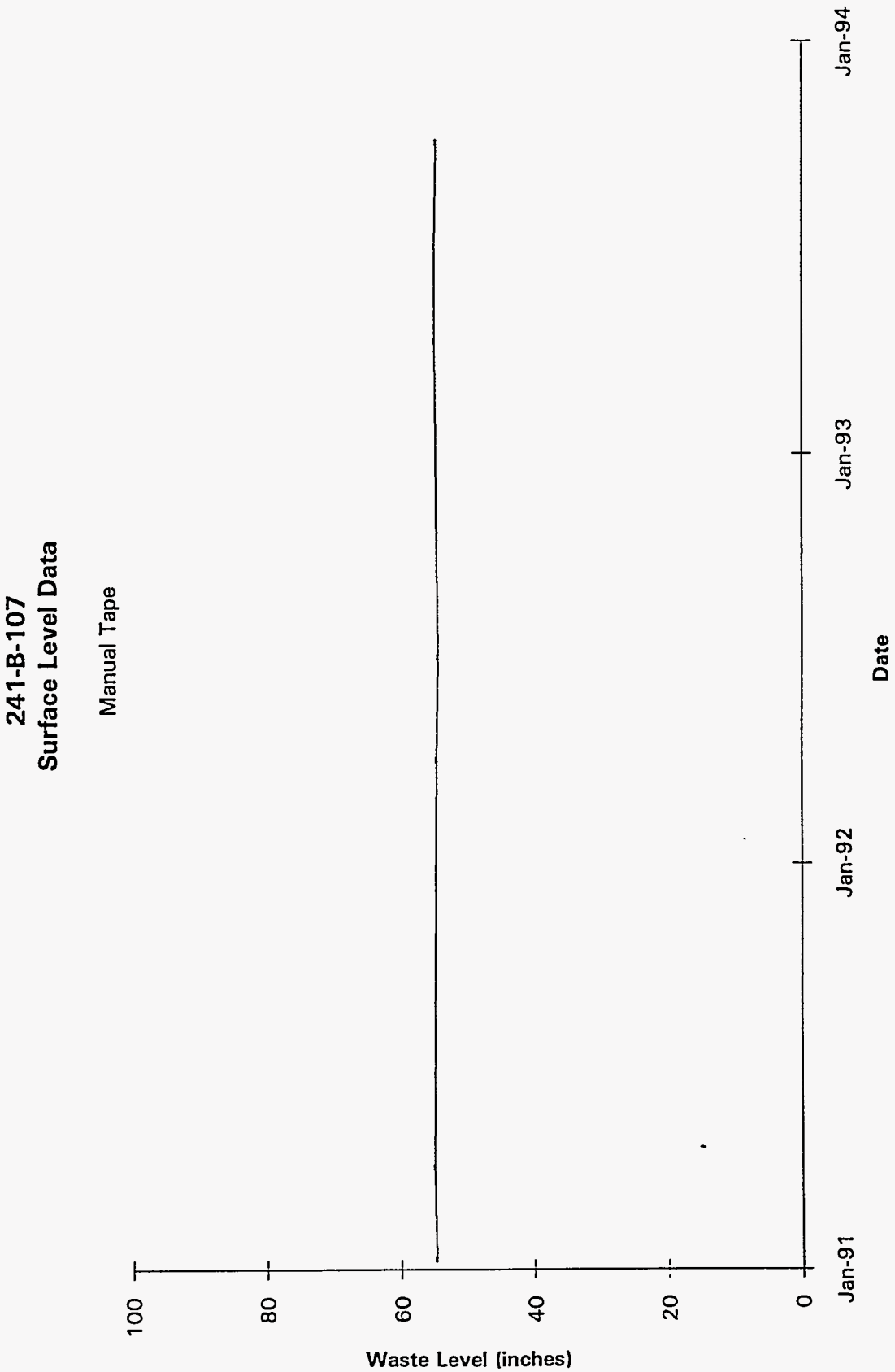


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-106
Surface Level Data

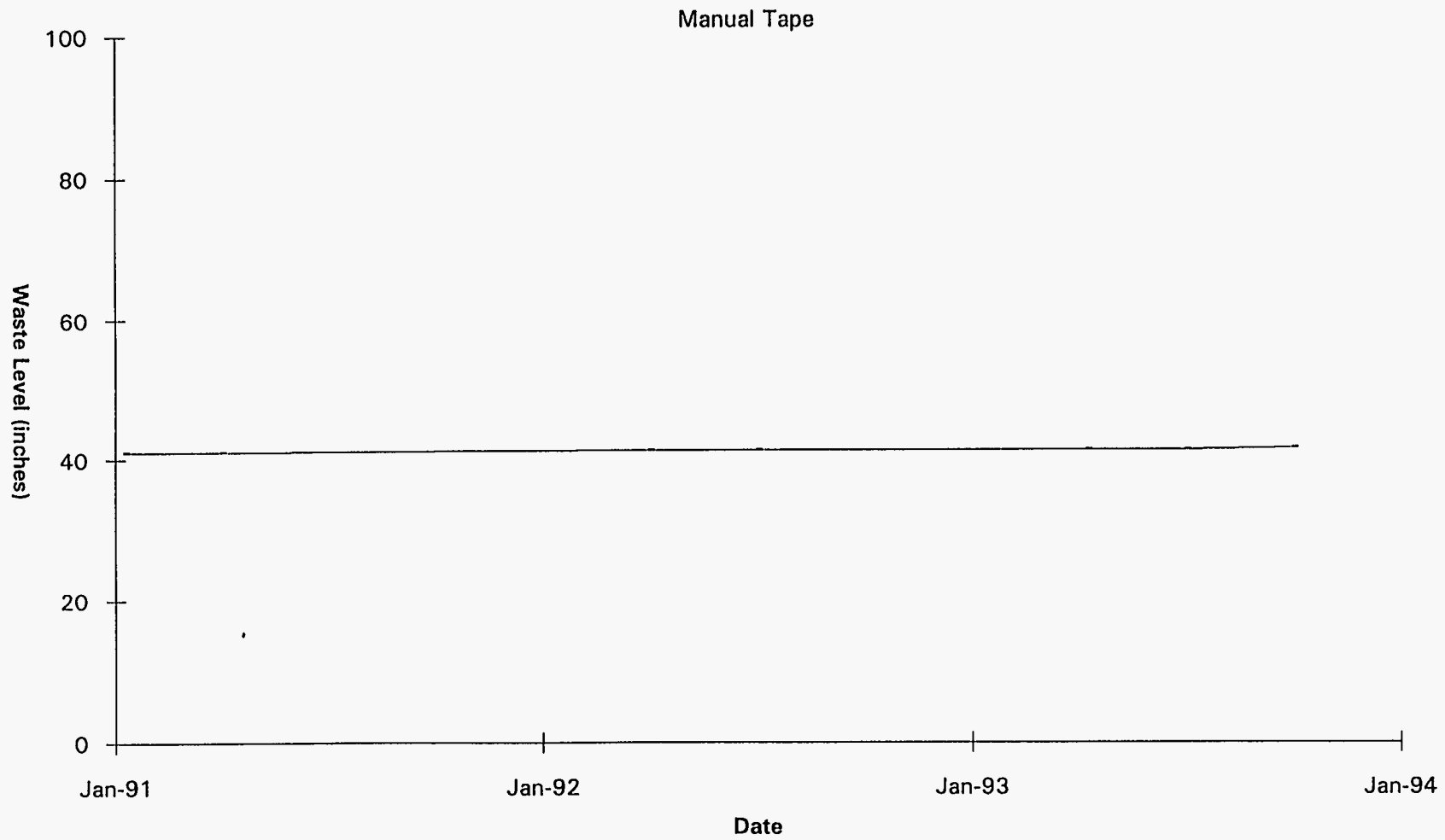


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

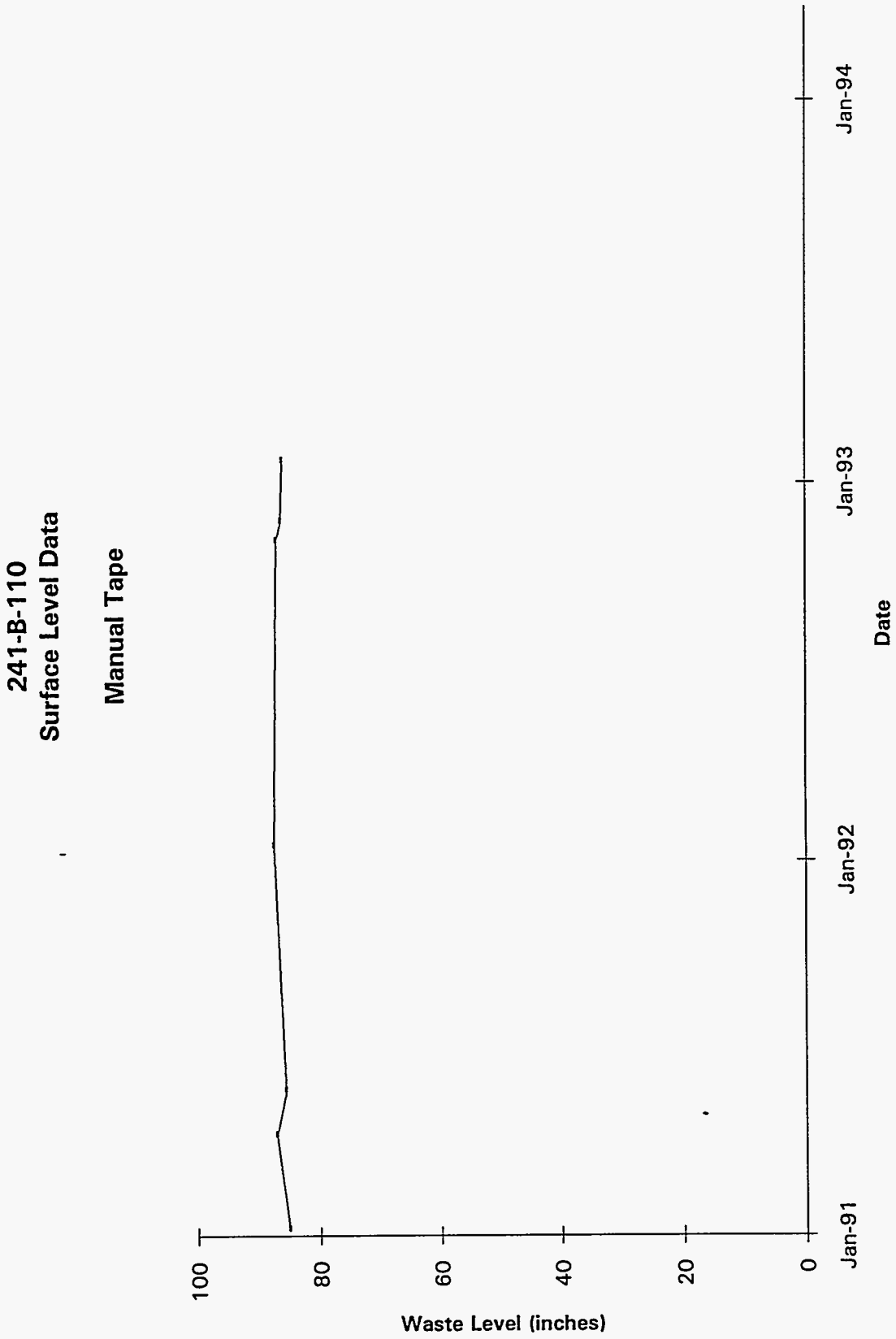


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-109
Surface Level Data

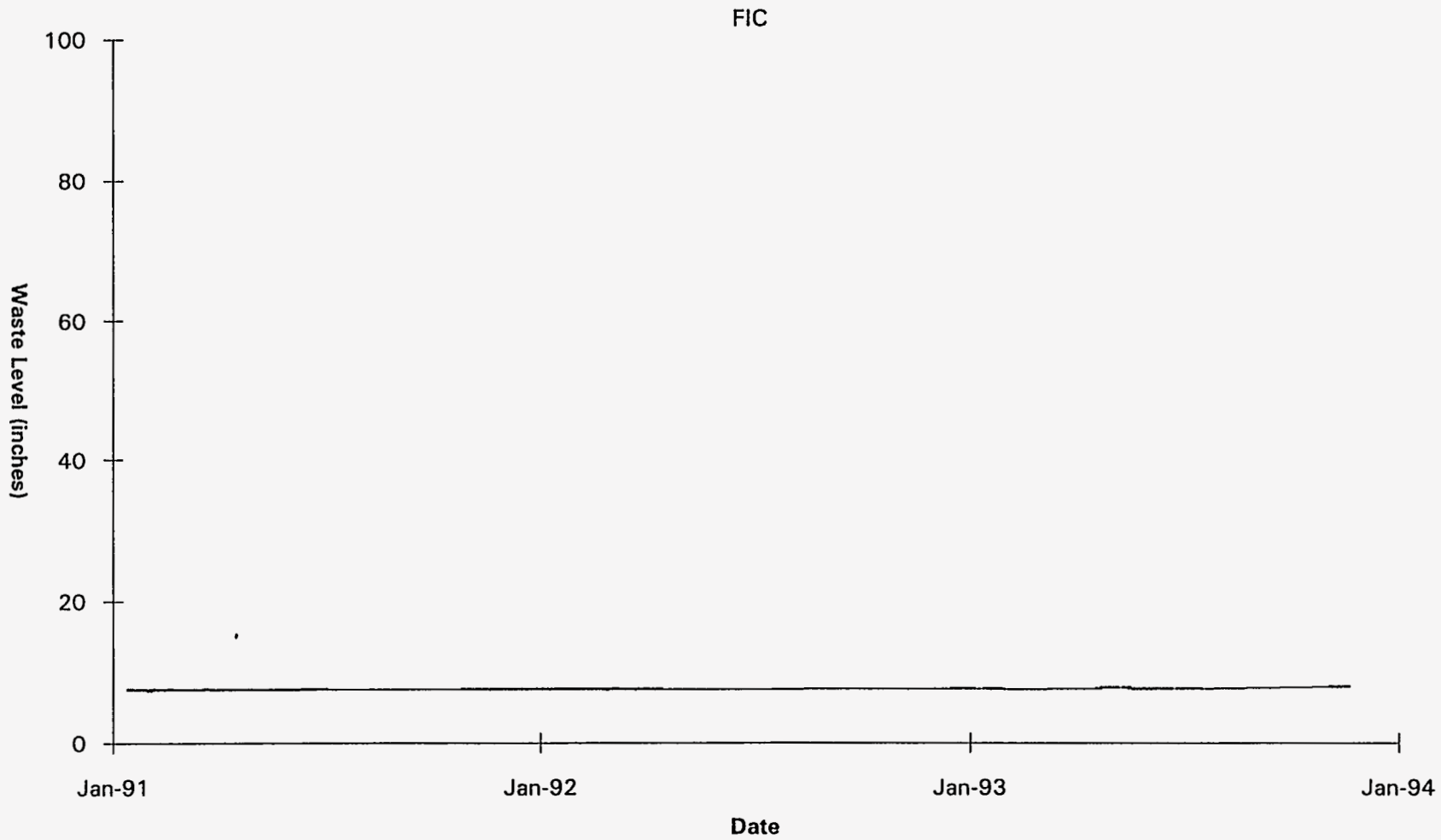


Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.



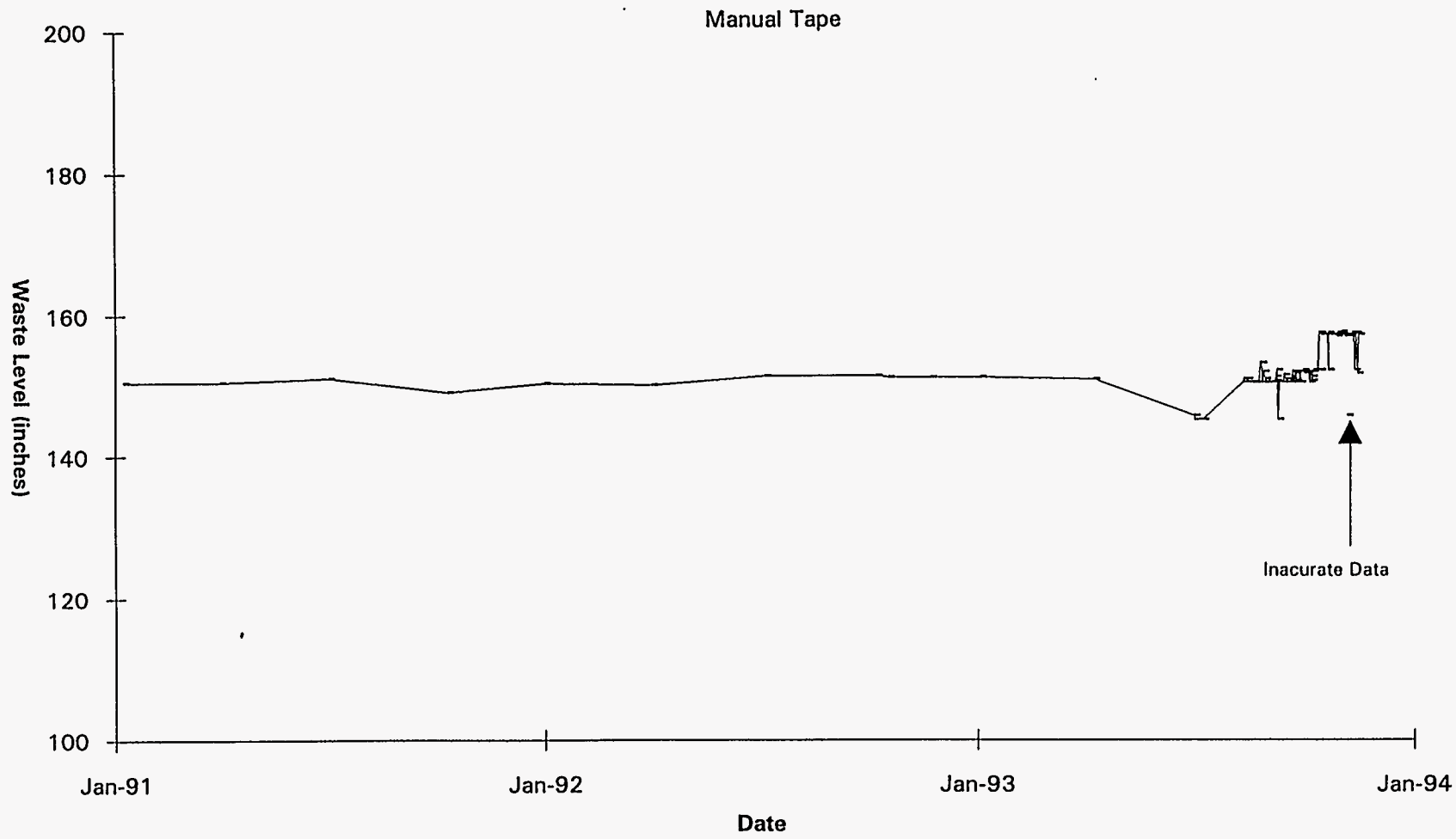
Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-112
Surface Level Data



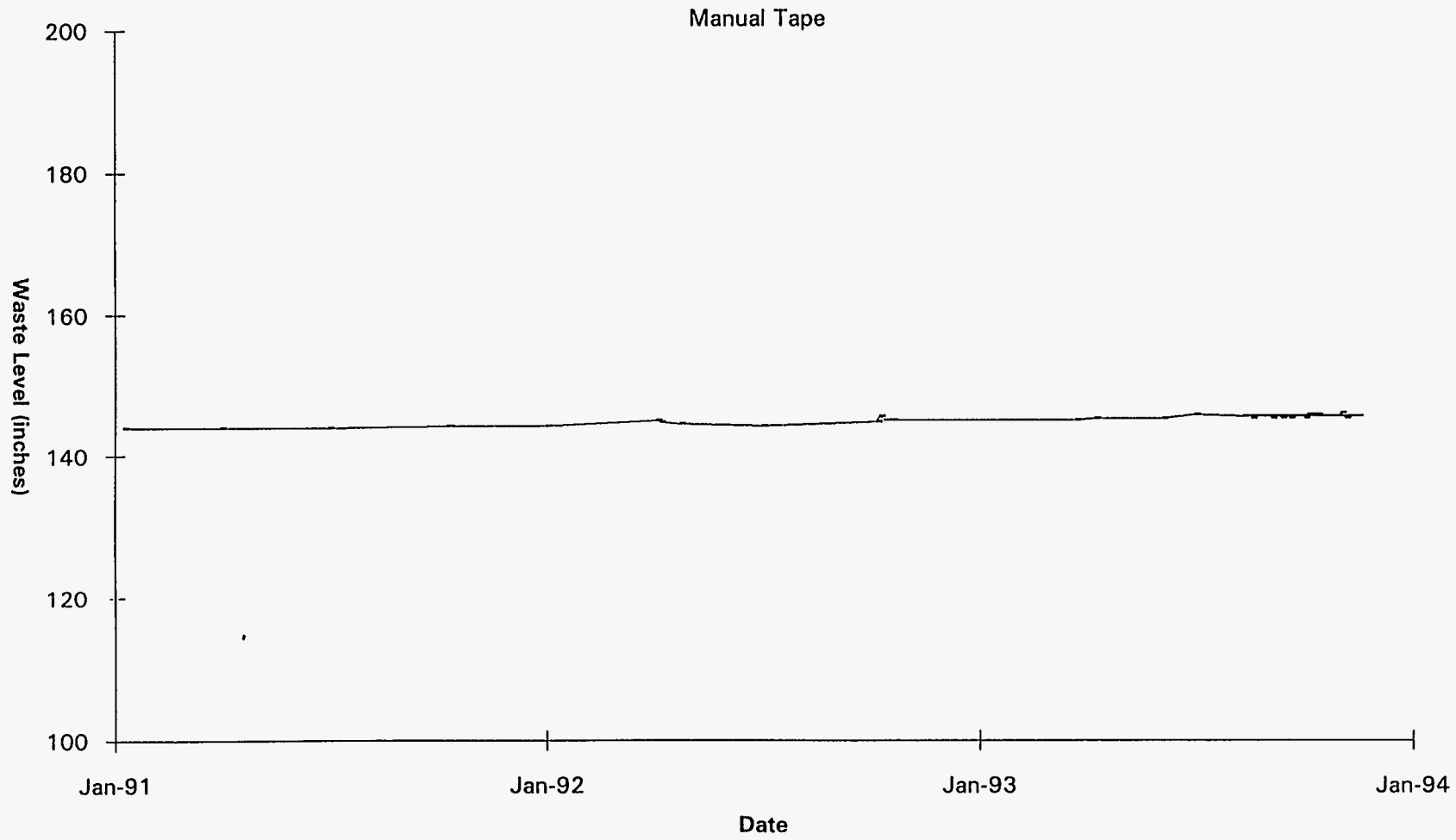
Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-201
Surface Level Data



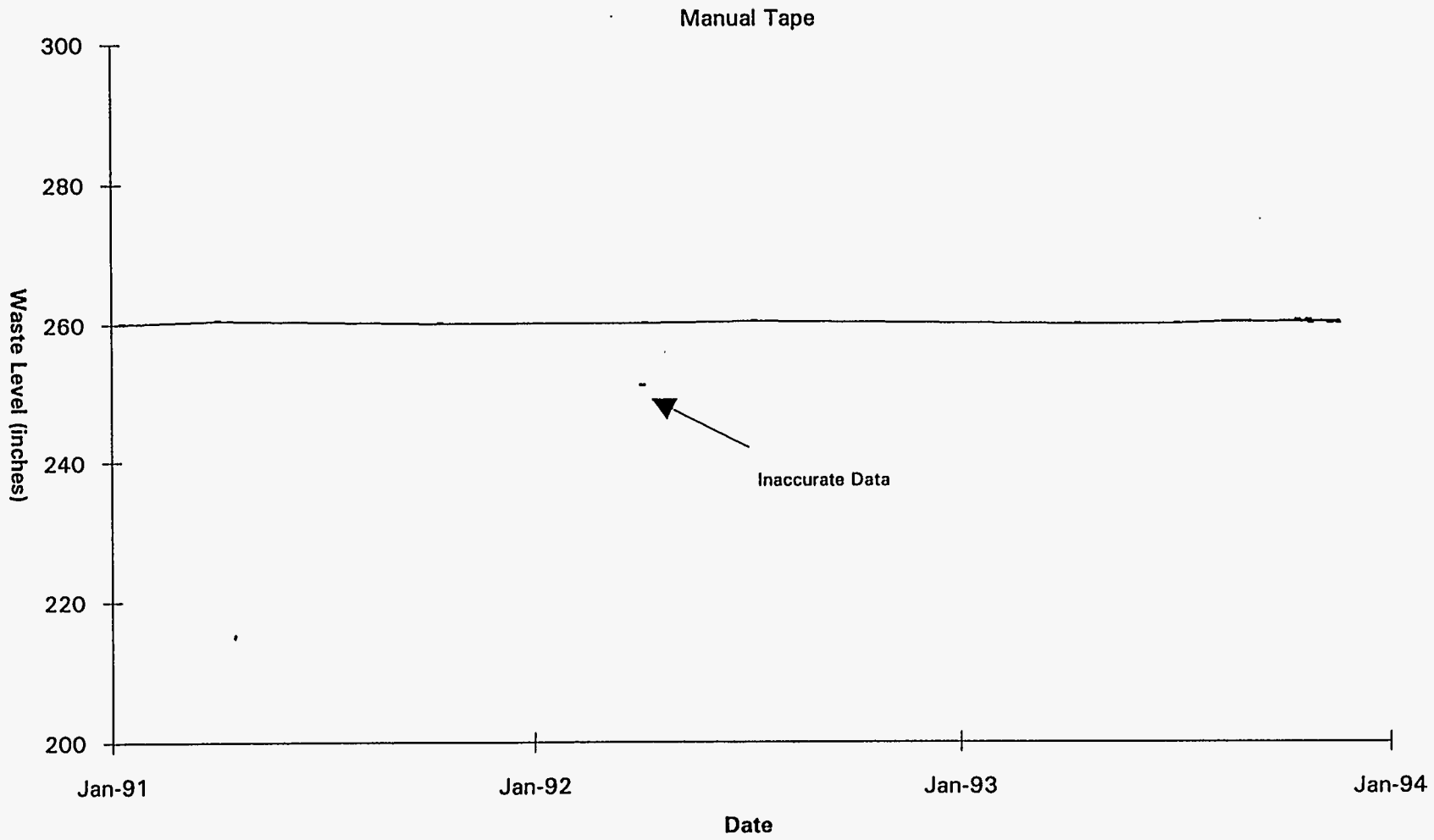
Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-202
Surface Level Data



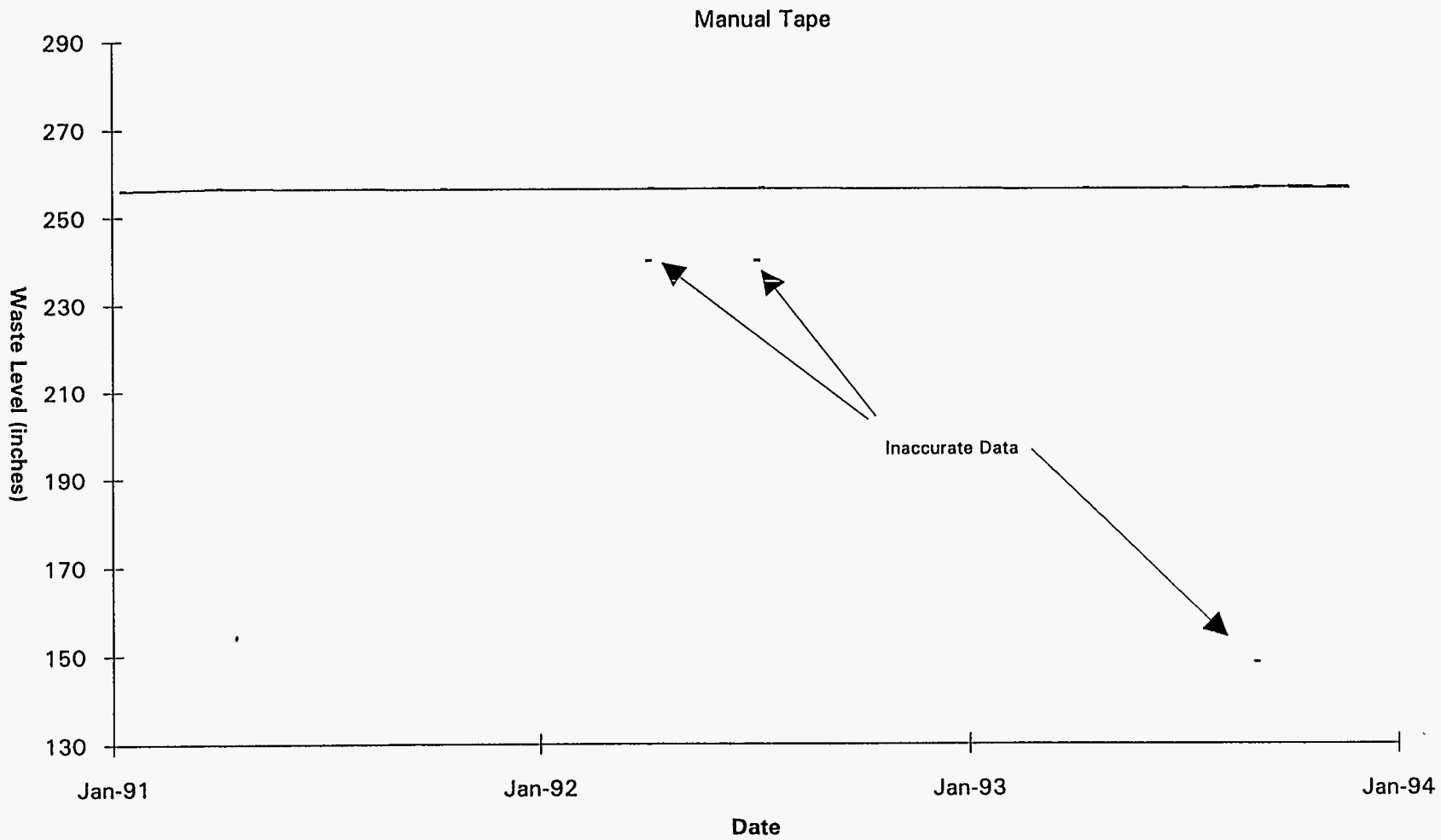
Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-203
Surface Level Data



Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

241-B-204
Surface Level Data



Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Surface Level Data					
FIC					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	13	7	3	7
91	1	14	7	4	7
91	1	15	7	3	7
91	1	16	7	4	7.1
91	1	17	7	4	7.1
91	1	18	7	4	7
91	1	22	7	4	7.1
91	1	23	7	4	7
91	1	24	7	4	7
91	1	25	7	3	7.1
91	1	26	7	3	7.1
91	1	27	7	3	7.1
91	1	28	7	10	7
91	1	29	7	2	7.1
91	1	30	7	10	7.1
91	1	31	7	2	7.1
91	2	1	7	2	7.1
91	2	2	7	4	7.1
91	2	3	7	3	7.1
91	2	4	7	3	7.1
91	2	5	7	4	7
91	2	6	7	4	7.1
91	2	7	7	4	7
91	2	8	7	4	7
91	2	9	7	4	7.1
91	2	10	7	3	7
91	2	11	7	4	7.1
91	2	12	7	4	7
91	2	13	7	4	7
91	2	14	7	4	7.1
91	2	15	7	3	7.1
91	2	16	7	2	7.1
91	2	17	7	2	7.1
91	2	18	7	3	7
91	2	19	7	2	7.1
91	2	20	7	3	7.1
91	2	21	7	2	7.1
91	2	22	7	2	7.1
91	2	23	7	2	7.1
91	2	24	7	3	7
91	2	25	7	3	7
91	2	26	7	3	7.1
91	2	27	7	2	7
91	2	28	7	2	7.1
91	3	1	7	2	7
91	3	2	7	2	7

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	3	3	7	3	7.1
91	3	4	7	3	7.1
91	3	5	7	3	7.1
91	3	6	7	2	7.1
91	3	7	7	2	7.1
91	3	8	7	2	7.1
91	3	9	7	2	7.1
91	3	10	7	2	7
91	3	11	7	2	7
91	3	12	7	3	7.1
91	3	13	7	3	7
91	3	14	7	3	7.1
91	3	15	7	3	7.1
91	3	16	7	3	7
91	3	17	7	2	7.1
91	3	18	7	3	7.1
91	3	19	7	3	7.1
91	3	20	7	2	7.1
91	3	21	7	3	7.1
91	3	22	7	2	7.1
91	3	23	7	3	7.1
91	3	24	7	3	7.1
91	3	25	7	3	7.1
91	3	26	7	3	7.1
91	3	27	7	3	7.1
91	3	28	7	3	7.1
91	3	29	7	3	7.1
91	3	30	7	3	7.1
91	3	31	7	3	7.1
91	4	1	7	3	7.1
91	4	2	7	3	7.1
91	4	3	7	3	7.1
91	4	4	7	3	7.1
91	4	5	7	3	7.1
91	4	6	7	3	7.1
91	4	7	7	3	7.1
91	4	8	7	4	7.1
91	4	9	7	3	7
91	4	10	7	3	7
91	4	11	7	3	7.1
91	4	12	7	3	7
91	4	13	7	4	7
91	4	14	7	3	7
91	4	15	7	3	7
91	4	16	7	10	7
91	4	17	7	3	7
91	4	18	7	6	7
91	4	19	7	5	7

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	4	20	7	6	7
91	4	21	7	5	7
91	4	22	7	6	7
91	4	23	7	6	7
91	4	24	6	6	7
91	4	25	7	5	7
91	4	26	7	5	7
91	4	27	7	5	7
91	4	28	7	6	7
91	4	29	7	5	7
91	4	30	7	6	7
91	5	1	7	5	7
91	5	2	7	5	7
91	5	3	7	6	7
91	5	4	7	5	7
91	5	5	7	5	7
91	5	6	7	5	7
91	5	7	7	5	7.1
91	5	8	7	5	7.1
91	5	9	7	5	7
91	5	10	7	5	7
91	5	11	7	5	7
91	5	12	7	5	7
91	5	13	7	5	7
91	5	14	7	5	7
91	5	15	6	5	7
91	5	16	7	6	7
91	5	17	7	6	7
91	5	18	7	6	7
91	5	19	7	5	7
91	5	20	6	6	7
91	5	21	7	6	7
91	5	22	7	5	7
91	5	23	7	5	7
91	5	24	7	5	7
91	5	25	7	5	7
91	5	26	7	5	7
91	5	27	7	5	7
91	5	28	6	5	7
91	5	29	7	5	7
91	5	30	7	5	7
91	5	31	7	5	7
91	6	1	7	5	7
91	6	2	7	5	7
91	6	3	7	5	7
91	6	4	7	5	7
91	6	5	7	5	7
91	6	6	7	6	7

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	6	11	7	5	7
91	6	12	7	4	7
91	6	13	7	5	7
91	6	14	7	5	7
91	6	15	7	5	7
91	6	16	7	5	7
91	6	17	7	5	7
91	6	18	7	5	7.1
91	6	19	7	5	7.1
91	6	20	7	5	7.1
91	6	21	7	6	7.1
91	6	22	7	5	7.1
91	6	23	7	5	7
91	6	24	7	5	7.1
91	6	25	7	6	7
91	6	26	7	3	7.1
91	6	27	7	2	7.1
91	6	28	7	3	7.1
91	6	29	7	2	7.1
91	10	26	7	3	7.1
91	10	27	7	2	7.1
91	10	28	7	2	7.1
91	10	29	7	3	7.1
91	10	30	7	3	7.1
91	10	31	6	2	7.1
91	11	1	7	2	7.1
91	11	2	7	3	7.1
91	11	3	7	3	7.1
91	11	4	7	2	7.1
91	11	5	7	3	7.1
91	11	6	7	3	7.1
91	11	7	7	2	7.1
91	11	8	7	3	7.1
91	11	9	7	2	7.1
91	11	10	7	3	7.1
91	11	11	7	10	7.1
91	11	12	7	3	7.1
91	11	13	7	3	7.1
91	11	14	7	3	7.1
91	11	15	7	3	7.1
91	11	16	7	3	7.1
91	11	17	7	2	7.2
91	11	18	7	3	7.1
91	11	19	7	3	7.1
91	11	20	7	3	7.1
91	11	21	7	2	7.1
91	11	22	7	3	7.1
91	11	23	7	2	7.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	11	24	7	3	7.1
91	11	25	7	3	7.1
91	11	27	7	3	7.1
91	11	28	7	3	7.1
91	11	29	7	3	7.1
91	11	30	7	3	7.1
91	12	1	7	3	7.1
91	12	2	7	3	7.1
91	12	3	7	3	7.1
91	12	4	7	3	7.1
91	12	5	7	3	7.1
91	12	6	6	3	7.1
91	12	7	7	3	7.1
91	12	8	7	3	7.1
91	12	9	7	3	7.1
91	12	10	7	3	7.1
91	12	11	7	2	7.1
91	12	12	7	3	7.1
91	12	13	7	5	7.1
91	12	14	7	2	7.1
91	12	15	7	2	7.1
91	12	16	7	3	7.1
91	12	17	7	6	7.1
91	12	18	7	3	7.1
91	12	19	7	3	7.1
91	12	20	7	2	7.1
91	12	21	7	3	7.1
91	12	22	7	5	7.1
91	12	23	7	6	7.1
91	12	24	7	3	7.1
91	12	25	7	3	7.1
91	12	26	7	3	7.1
91	12	27	7	3	7.1
91	12	28	7	2	7.1
91	12	29	7	3	7.1
91	12	30	7	3	7.1
91	12	31	7	3	7.1
92	1	1	7	3	7.1
92	1	2	7	2	7.1
92	1	3	7	4	7.1
92	1	4	7	3	7.1
92	1	5	7	3	7.1
92	1	6	7	3	7.1
92	1	7	7	4	7.1
92	1	8	7	3	7.1
92	1	9	7	3	7.1
92	1	10	7	4	7.1
92	1	11	7	4	7.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	1	15	7	3	7
92	1	16	7	4	7.1
92	1	17	7	4	7
92	1	18	7	4	7
92	1	19	7	3	7
92	1	20	7	3	7.1
92	1	21	7	3	7.1
92	1	22	7	6	7
92	1	23	7	3	7.1
92	1	24	7	2	7
92	1	25	7	3	7
92	1	26	7	10	7.1
92	1	27	7	2	7.1
92	1	28	7	3	7
92	1	29	7	3	7
92	1	30	5	3	7.1
92	1	31	7	3	7.1
92	2	1	7	2	7
92	2	2	7	3	7
92	2	3	7	3	7
92	2	4	7	3	7
92	2	5	7	2	7
92	2	8	7	4	7
92	2	9	7	3	7
92	2	10	7	4	7
92	2	11	7	3	7
92	2	12	7	3	7
92	2	13	7	3	7
92	2	14	7	3	7
92	2	15	7	3	7
92	2	16	7	3	7
92	2	17	7	3	7
92	2	18	6	2	7
92	2	19	7	3	7
92	2	20	7	3	7
92	2	21	7	3	7
92	2	22	7	3	7
92	2	23	7	3	7
92	2	24	7	3	7
92	2	25	7	4	7
92	2	26	7	3	7
92	2	27	7	4	7
92	2	28	7	4	7
92	2	29	7	3	7
92	3	1	7	3	7
92	3	2	7	3	7
92	3	3	7	4	7
92	3	4	7	4	7

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	3	5	7	3	7
92	3	6	7	3	7
92	3	7	7	2	7
92	3	8	7	2	7
92	3	9	7	2	7
92	3	10	7	3	7
92	3	11	7	3	7
92	3	12	7	3	7
92	3	13	7	3	7
92	3	14	7	3	7
92	3	15	7	6	7
92	3	16	7	3	7
92	3	17	7	3	7.1
92	3	18	7	3	7
92	3	19	7	3	7.1
92	3	20	7	2	7
92	3	21	7	3	7
92	3	22	7	2	7
92	3	23	7	2	7
92	3	24	7	2	7
92	3	25	7	3	7.1
92	3	26	7	3	7.1
92	3	27	7	2	7.1
92	3	28	7	3	7
92	3	29	7	3	7
92	3	30	7	3	7.1
92	3	31	7	3	7
92	4	1	7	3	7.1
92	4	2	7	3	7
92	4	3	7	3	7
92	4	4	7	3	7
92	4	5	7	3	7
92	4	6	7	3	7.1
92	4	7	7	3	7
92	4	8	7	10	7
92	4	9	7	3	7
92	4	10	7	3	7.1
92	4	11	7	3	7
92	4	12	7	4	7.1
92	4	13	7	3	7.1
92	4	14	7	3	7
92	4	15	7	2	7.1
92	4	16	7	3	7
92	4	17	7	3	7.1
92	4	18	7	2	7
92	4	19	7	2	7
92	4	20	7	3	7.1
92	4	21	7	3	7.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	4	22	7	2	7.1
92	4	23	7	3	7
92	4	24	7	3	7
92	4	25	7	4	7
92	4	26	7	3	7
92	4	27	7	4	7
92	4	28	7	3	7
92	4	29	7	3	7
92	4	30	7	3	7
92	5	1	7	3	7.1
92	5	2	6	3	7
92	5	3	0	3	7
92	5	4	7	3	7.1
92	5	5	7	4	7
92	5	6	7	3	7
92	5	7	7	4	7
92	5	8	3	3	7
92	5	9	4	4	7
92	5	14	7	3	7.1
92	5	27	6	3	7.1
92	5	28	7	2	7.1
92	5	29	7	2	7
92	5	30	7	3	7.1
92	6	9	7	3	7
92	6	10	7	3	7.1
92	6	11	7	3	7.1
92	6	12	7	5	7.1
92	6	13	7	5	7.1
92	6	15	7	3	7.1
92	6	16	7	3	7.1
92	6	17	7	3	7.1
92	6	18	7	3	7.1
92	6	19	7	2	7.1
92	6	20	7	2	7.1
92	6	21	7	3	7.1
92	6	22	7	3	7.1
92	6	23	7	3	7.1
92	6	24	7	3	7.1
92	6	25	7	3	7.1
92	6	26	7	2	7.1
92	6	27	7	3	7.1
92	6	28	7	6	7.1
92	6	29	7	6	7.1
92	6	30	7	6	7.1
92	7	3	7	6	7.1
92	7	4	7	6	7.1
92	7	5	7	6	7.1
92	7	6	7	6	7.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	7	7	7	6	7.1
92	7	8	7	6	7.1
92	7	9	7	6	7.1
92	7	10	7	6	7.1
92	7	11	7	6	7.1
92	7	12	7	6	7.1
92	7	13	7	6	7.1
92	7	14	7	6	7.1
92	7	15	7	6	7.1
92	7	16	7	6	7.1
92	7	17	7	6	7.1
92	7	18	7	6	7.1
92	7	19	7	6	7.1
92	7	20	6	6	7.1
92	12	15	7	3	7.2
92	12	16	7	4	7.1
92	12	17	7	3	7.1
92	12	18	7	3	7.1
92	12	19	7	3	7.1
92	12	20	7	4	7.1
92	12	21	7	4	7.1
92	12	23	7	4	7.1
92	12	24	7	3	7.1
92	12	25	7	3	7.1
92	12	26	7	3	7.1
92	12	27	7	3	7.1
92	12	28	7	3	7.1
92	12	30	7	3	7.1
92	12	31	7	3	7.1
93	1	1	7	4	7.1
93	1	12	7	6	7.1
93	1	13	7	6	7.1
93	1	14	7	3	7.1
93	1	15	7	3	7.1
93	1	17	7	2	7.1
93	1	18	7	2	7.1
93	1	19	7	2	7.1
93	1	20	7	2	7.1
93	1	21	7	2	7.1
93	1	22	7	4	7.1
93	1	23	7	3	7.1
93	1	24	7	3	7.1
93	1	25	7	3	7.1
93	1	26	7	4	7.1
93	4	18	7	6	7.1
93	4	19	7	6	7.1
93	4	22	7	6	7.1
93	4	23	7	6	7.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	4	24	6	6	7.1
93	4	25	7	6	7.1
93	4	26	7	6	7.1
93	4	27	7	6	7.1
93	4	28	7	3	7.1
93	4	29	7	3	7.1
93	4	30	7	6	7.1
93	5	1	7	5	7.1
93	5	2	7	6	7.1
93	5	3	7	6	7.1
93	5	11	7	6	7.1
93	5	12	7	6	7.1
93	5	13	7	6	7.1
93	5	15	7	6	7.1
93	5	16	7	5	7.1
93	5	17	7	3	7.1
93	5	18	7	3	7.1
93	5	19	7	3	7.1
93	5	20	7	3	7.1
93	5	22	7	3	7.1
93	5	23	7	4	7.1
93	5	24	7	3	7.1
93	5	25	7	3	7.1
93	5	26	7	3	7.1
93	5	27	7	3	7.1
93	5	28	7	3	7.1
93	5	29	7	5	7.1
93	5	30	7	5	7.1
93	5	31	7	6	7.1
93	6	1	7	6	7.1
93	6	2	7	6	7.1
93	6	3	7	6	7.1
93	6	4	7	6	7.1
93	6	5	7	6	7.1
93	6	6	7	5	7.1
93	6	7	7	5	7.1
93	6	8	7	5	7.1
93	6	9	7	5	7.1
93	6	10	7	4	7.1
93	6	11	7	5	7.1
93	6	12	7	5	7.1
93	6	13	7	4	7.1
93	6	14	7	5	7.1
93	6	15	7	5	7.1
93	6	16	7	5	7.1
93	6	17	7	5	7.1
93	6	18	7	6	7.1
93	6	25	7	3	7.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	6	26	7	3	7.1
93	6	27	7	4	7.1
93	6	28	7	3	7.1
93	6	29	7	4	7.1
93	6	30	7	3	7.1
93	7	1	7	6	7.1
93	7	2	7	6	7.1
93	7	3	7	3	7.1
93	7	4	7	4	7.1
93	7	5	7	3	7.1
93	7	6	7	3	7.1
93	7	7	7	4	7.1
93	7	8	7	4	7.1
93	7	12	7	2	7.1
93	7	13	1	2	7.1
93	11	3	7	6	7
93	11	5	7	6	7.2
93	11	6	7	6	7.1
93	11	7	7	6	7.1
93	11	8	7	6	7.2
93	11	9	7	3	7.1
93	11	10	7	4	7.2
93	11	11	7	4	7.2
93	11	12	7	4	7.1
93	11	13	7	4	7.2
93	11	14	7	3	7.1
93	11	15	7	4	7.1
93	11	16	7	3	7.2

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	8	1	20	131.75
91	4	1	15	2	132
92	7	2	15	33	132
93	4	8	0	44	131.75
93	6	4	14	50	131.75
93	7	1	14	41	131.75
93	10	1	20	56	132

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	7	14	33	41.5
91	4	9	19	32	41.5
92	11	3	10	42	41.25
93	4	8	0	44	41.75
93	7	1	14	41	42
93	10	1	20	56	42.5

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Surface Level Data					
FIC					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	1	10	10	39
91	1	13	7	3	39
91	1	18	7	4	39
91	1	21	10	10	39
91	1	25	7	3	39
91	1	26	7	3	39
91	1	27	7	3	39
91	1	28	7	10	39
91	1	29	7	2	39
91	1	30	7	10	39
91	1	31	7	2	39
91	2	1	7	2	39
91	2	2	7	4	39
91	2	3	7	3	39
91	2	4	7	3	39
91	2	5	7	4	39
91	2	6	7	4	39
91	2	7	7	4	39
91	2	8	7	4	39
91	2	9	7	4	39
91	2	10	7	3	39
91	2	11	7	4	39
91	2	12	7	4	39
91	2	13	7	4	39
91	2	14	7	4	39
91	2	15	7	3	39
91	2	16	7	2	39
91	2	17	7	2	39
91	2	18	7	3	39
91	2	19	7	2	39
91	2	20	7	3	39
91	2	21	7	2	39
91	2	22	7	2	39
91	2	23	7	2	39
91	2	24	7	3	39
91	2	25	7	3	39
91	2	26	7	3	39
91	2	27	7	2	39
91	2	28	7	2	39
91	3	1	7	2	39
91	3	2	7	2	39
91	3	3	7	3	39
91	3	4	7	3	39
91	3	5	7	3	39
91	3	6	7	2	39
91	3	7	7	2	39

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	3	8	7	2	39
91	3	9	7	2	39
91	3	10	7	2	39
91	3	11	7	2	39
91	3	12	7	3	39
91	3	13	7	3	39
91	3	14	7	3	39
91	3	15	7	3	39
91	3	16	7	3	39
91	3	17	7	2	39
91	3	18	7	3	39
91	3	19	7	3	39
91	3	20	7	2	39
91	3	21	7	3	39
91	3	22	7	2	39
91	3	23	7	3	39
91	3	24	7	3	39
91	3	25	7	3	39
91	3	26	7	3	39
91	3	27	7	3	39
91	3	28	7	3	39
91	3	29	7	3	39
91	3	30	7	3	39
91	3	31	7	3	39
91	4	1	7	3	39
91	4	2	7	3	39
91	4	3	7	3	39
91	4	4	7	3	39
91	4	5	7	3	39
91	4	6	7	3	39
91	4	7	7	3	39
91	4	8	7	4	39
91	4	9	7	3	39
91	4	10	7	3	39
91	4	11	7	3	39
91	4	12	7	3	39
91	4	13	7	4	39
91	4	14	7	3	39
91	4	15	7	3	39
91	4	16	7	10	39
91	4	17	7	3	39
91	4	18	7	6	39
91	4	19	7	5	39
91	4	20	7	6	39
91	4	21	7	5	39
91	4	22	7	6	39
91	4	23	7	6	39
91	4	24	6	6	39

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	4	25	7	5	39
91	4	26	7	5	39
91	4	27	7	5	39
91	4	28	7	6	39
91	4	29	7	5	39
91	4	30	7	6	39
91	5	1	7	5	39
91	5	2	7	5	39
91	5	3	7	6	39
91	5	4	7	5	39.1
91	5	5	7	5	39.1
91	5	6	7	5	39
91	5	7	7	5	39
91	5	8	7	5	39
91	5	9	7	5	39
91	5	10	7	5	39
91	5	11	7	5	39
91	5	12	7	5	39
91	5	13	7	5	39
91	5	14	7	5	39
91	5	15	6	5	39
91	5	16	7	6	39
91	5	17	7	6	39
91	5	18	7	6	39
91	5	19	7	5	39
91	5	20	6	6	39
91	5	21	7	6	39
91	5	22	7	5	39
91	5	23	7	5	39
91	5	24	7	5	39
91	5	25	7	5	39
91	5	26	7	5	39
91	5	27	7	5	39
91	5	28	6	5	39
91	5	29	7	5	39
91	5	30	7	5	39
91	5	31	7	5	39
91	6	1	7	5	39
91	6	2	7	5	39
91	6	3	7	5	39
91	6	4	7	5	39
91	6	5	7	5	39
91	6	6	7	6	39
91	6	11	7	5	39
91	6	12	7	4	39
91	6	13	7	5	39
91	6	14	7	5	39
91	6	15	7	5	39

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	6	16	7	5	39
91	6	17	7	5	39
91	6	18	7	5	39
91	6	19	7	5	39
91	6	20	7	5	39
91	6	21	7	6	39
91	6	22	7	5	39
91	6	23	7	5	39
91	6	24	7	5	39
91	6	25	7	6	39
91	6	26	7	3	39
91	6	27	7	2	39
91	6	28	7	3	39
91	6	29	7	2	39
91	7	1	10	6	39
91	7	9	10	6	39
91	8	5	10	6	39
91	8	19	10	6	39
91	8	26	10	6	39.1
91	9	2	10	6	39.1
91	10	1	10	6	39.2
91	10	14	10	6	39.2
91	10	21	10	6	39.2
91	11	5	10	6	39
91	11	7	7	2	39
91	11	8	7	3	39
91	11	9	7	2	39
91	11	10	7	3	39
91	11	11	7	10	39
91	11	12	7	3	39
91	11	13	7	3	39
91	11	14	7	3	39
91	11	15	7	3	39
91	11	16	7	3	39
91	11	17	7	2	39
91	11	18	7	3	39
91	11	19	7	3	39
91	11	20	7	3	39
91	11	21	7	2	39
91	11	22	7	3	39
91	11	23	7	2	39.1
91	11	24	7	3	39.1
91	11	25	7	3	39.1
91	11	27	7	3	39.1
91	11	28	7	3	39.1
91	11	29	7	3	39.1
91	11	30	7	3	39.1
91	12	1	7	3	39.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	12	2	7	3	39.1
91	12	3	7	3	39.1
91	12	4	7	3	39.1
91	12	5	7	3	39.1
91	12	6	6	3	39.1
91	12	7	7	3	39.1
91	12	8	7	3	39.1
91	12	9	7	3	39.1
91	12	10	7	3	39.1
91	12	11	7	2	39.1
91	12	12	7	3	39.1
91	12	13	7	5	39.1
91	12	14	7	2	39.1
91	12	15	7	2	39.1
91	12	16	7	3	39.1
91	12	17	7	6	39.1
91	12	18	7	3	39.1
91	12	19	7	3	39.1
91	12	20	7	2	39.1
91	12	21	7	3	39.1
91	12	22	7	5	39.1
91	12	23	7	6	39.1
91	12	24	7	3	39.1
91	12	25	7	3	39.1
91	12	26	7	3	39.1
91	12	27	7	3	39.1
91	12	28	7	2	39.1
91	12	29	7	3	39.1
91	12	30	7	3	39.1
91	12	31	7	3	39.1
92	1	1	7	3	39.1
92	1	2	7	2	39.1
92	1	3	7	4	39.1
92	1	4	7	3	39.1
92	1	5	7	3	39.1
92	1	6	7	3	39.1
92	1	7	7	4	39.1
92	1	8	7	3	39.1
92	1	9	7	3	39.1
92	1	10	7	4	39.1
92	1	11	7	4	39.1
92	1	15	7	3	39.1
92	1	16	7	4	39
92	1	17	7	4	39
92	1	18	7	4	39
92	1	19	7	3	39.1
92	1	20	7	3	39.1
92	1	21	7	3	39.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	1	22	7	6	39.1
92	1	23	7	3	39.1
92	1	24	7	2	39.1
92	1	25	7	3	39.1
92	1	26	7	10	39.1
92	1	27	7	2	39.1
92	1	28	7	3	39.1
92	1	29	7	3	39.1
92	1	30	5	3	39.1
92	1	31	7	3	39
92	2	1	7	2	39
92	2	2	7	3	39
92	2	3	7	3	39.1
92	2	4	7	3	39
92	2	5	7	2	39
92	2	8	7	4	39
92	2	9	7	3	39
92	2	10	7	4	39
92	2	11	7	3	39
92	2	12	7	3	39
92	2	13	7	3	39
92	2	14	7	3	39
92	2	15	7	3	39
92	2	16	7	3	39
92	2	17	7	3	39
92	2	18	6	2	39
92	2	19	7	3	39.1
92	2	20	7	3	39
92	2	21	7	3	39
92	2	22	7	3	39
92	2	23	7	3	39
92	2	24	7	3	39
92	2	25	7	4	39
92	2	26	7	3	39
92	2	27	7	4	39
92	2	28	7	4	39
92	2	29	7	3	39
92	3	1	7	3	39
92	3	2	7	3	39
92	3	3	7	4	39
92	3	4	7	4	39
92	3	5	7	3	39
92	3	6	7	3	39
92	3	7	7	2	39.1
92	3	8	7	2	39
92	3	9	7	2	39
92	3	10	7	3	39
92	3	11	7	3	39

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	3	12	7	3	39
92	3	13	7	3	39
92	3	14	7	3	39
92	3	15	7	6	39
92	3	16	7	3	39
92	3	17	7	3	39
92	3	18	7	3	39
92	3	19	7	3	39
92	3	20	7	2	39
92	3	21	7	3	39
92	3	22	7	2	39.1
92	3	23	7	2	39
92	3	24	7	2	39
92	3	25	7	3	39.1
92	3	26	7	3	39.1
92	3	27	7	2	39.1
92	3	28	7	3	39
92	3	29	7	3	39
92	3	30	7	3	39.1
92	3	31	7	3	39.1
92	4	1	7	3	39
92	4	2	7	3	39.1
92	4	3	7	3	39.1
92	4	4	7	3	39.1
92	4	5	7	3	39.1
92	4	6	7	3	39.1
92	4	7	7	3	39.1
92	4	8	7	10	39.1
92	4	9	7	3	39.1
92	4	10	7	3	39.1
92	4	11	7	3	39.1
92	4	12	7	4	39.1
92	4	13	7	3	39.1
92	4	14	7	3	39.1
92	4	15	7	2	39.1
92	4	16	7	3	39.1
92	4	17	7	3	39.1
92	4	18	7	2	39.1
92	4	19	7	2	39.1
92	4	20	7	3	39
92	4	21	7	3	39.1
92	4	22	7	2	39
92	4	23	7	3	39
92	4	24	7	3	39.1
92	4	25	7	4	39.1
92	4	26	7	3	39
92	4	27	7	4	39.1
92	4	28	7	3	39

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	4	29	7	3	39
92	4	30	7	3	39.1
92	5	1	7	3	39
92	5	2	6	3	39
92	5	3	0	3	39
92	5	4	7	3	39
92	5	5	7	4	39.1
92	5	6	7	3	39.1
92	5	7	7	4	39.1
92	5	8	3	3	39.1
92	5	9	4	4	39
92	5	14	7	3	39.1
92	5	18	10	3	39.1
92	5	27	6	3	39.1
92	5	28	7	2	39.1
92	5	29	7	2	39.1
92	5	30	7	3	39.1
92	6	9	7	3	39.1
92	6	10	7	3	39.1
92	6	11	7	3	39.1
92	6	12	7	5	39.1
92	6	13	7	5	39.1
92	6	15	7	3	39.1
92	6	16	7	3	39.1
92	6	17	7	3	39.1
92	6	18	7	3	39.1
92	6	19	7	2	39.1
92	6	20	7	2	39.1
92	6	21	7	3	39.1
92	6	22	7	3	39.1
92	6	23	7	3	39.1
92	6	24	7	3	39.1
92	6	25	7	3	39.1
92	6	26	7	2	39.1
92	6	27	7	3	39.1
92	6	28	7	6	39.1
92	6	29	7	6	39.1
92	6	30	7	6	39.1
92	7	3	7	6	39.1
92	7	4	7	6	39.1
92	7	5	7	6	39.1
92	7	6	7	6	39.1
92	7	7	7	6	39.1
92	7	8	7	6	39.1
92	7	9	7	6	39.1
92	7	10	7	6	39.1
92	7	11	7	6	39.1
92	7	12	7	6	39.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	7	13	7	6	39.1
92	7	14	7	6	39.1
92	7	15	7	6	39.1
92	7	16	7	6	39.1
92	7	17	7	6	39.1
92	7	18	7	6	39.1
92	7	19	7	6	39.1
92	7	20	6	6	39.1
92	7	27	10	6	39.1
92	8	3	10	3	39.1
92	8	24	10	3	39.1
92	9	1	10	2	39.6
92	9	10	10	2	39.1
92	9	21	10	2	39.5
92	9	28	10	2	39.1
92	10	6	10	3	39.1
92	10	13	10	3	39.1
92	10	19	10	3	39.1
92	10	26	10	3	39.1
92	11	23	10	3	39.1
92	12	1	10	3	39.1
92	12	7	10	3	39.1
92	12	14	10	3	39.15
92	12	15	7	3	39.1
92	12	16	7	4	39.1
92	12	17	7	3	39.1
92	12	18	7	3	39.1
92	12	19	7	3	39.1
92	12	20	7	4	39.1
92	12	21	7	4	39.1
92	12	23	7	4	39.1
92	12	24	7	3	39.1
92	12	25	7	3	39.1
92	12	26	7	3	39.2
92	12	27	7	3	39.1
92	12	28	7	3	39.1
92	12	30	7	3	39.1
93	1	1	7	4	39.1
93	1	12	7	6	39.1
93	1	13	7	6	39.1
93	1	14	7	3	39.1
93	1	15	7	3	39.1
93	1	17	7	2	39.1
93	1	18	7	2	39.1
93	1	19	7	2	39.1
93	1	20	7	2	39.1
93	1	20	10	2	38.1
93	1	21	7	2	38.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	1	22	7	4	38
93	1	23	7	3	38
93	1	24	7	3	38
93	1	25	7	3	38
93	2	1	10	4	38.15
93	2	4	10	4	38.1
93	2	8	10	4	38.1
93	2	22	10	4	38.1
93	3	1	10	4	38.1
93	3	15	10	4	38.05
93	3	22	10	4	38.05
93	3	29	10	4	38.05
93	4	1	10	4	38
93	4	5	10	4	38.05
93	4	12	10	4	38.1
93	4	18	7	6	38
93	4	19	7	6	38
93	4	22	7	6	38
93	4	23	7	6	38
93	4	23	14	6	39
93	4	24	6	6	39
93	4	25	7	6	39
93	4	26	7	6	39
93	4	27	7	6	39
93	4	28	7	3	39
93	4	29	7	3	39
93	4	30	7	6	39
93	5	1	7	5	39
93	5	2	7	6	39
93	5	3	7	6	39
93	5	11	7	6	39
93	5	12	7	6	39
93	5	13	7	6	39.1
93	5	15	7	6	39.1
93	5	16	7	5	39
93	5	17	7	3	39
93	5	18	7	3	39
93	5	19	7	3	39
93	5	20	7	3	39
93	5	22	7	3	39
93	5	23	7	4	39
93	5	24	7	3	39
93	5	25	7	3	39
93	5	26	7	3	39
93	5	27	7	3	39.1
93	5	28	7	3	39.1
93	5	29	7	5	39
93	5	30	7	5	39

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	5	31	7	6	39.1
93	6	1	7	6	39.1
93	6	2	7	6	39.1
93	6	3	7	6	39.1
93	6	4	7	6	39.1
93	6	5	7	6	39.1
93	6	6	7	5	39.1
93	6	7	7	5	39.1
93	6	8	7	5	39.1
93	6	9	7	5	39.1
93	6	10	7	4	39.1
93	6	11	7	5	39
93	6	12	7	5	39.1
93	6	13	7	4	39.1
93	6	14	7	5	39.1
93	6	15	7	5	39.1
93	6	16	7	5	39.1
93	6	17	7	5	39.1
93	6	18	7	6	39.1
93	6	25	7	3	39.1
93	6	26	7	3	39.1
93	6	27	7	4	39
93	6	28	7	3	39.1
93	6	29	7	4	39.1
93	6	30	7	3	*69.1
93	7	1	7	6	39.1
93	7	2	7	6	39.1
93	7	3	7	3	39.1
93	7	4	7	4	*69.1
93	7	5	7	3	*69.1
93	7	6	7	3	*69.1
93	7	7	7	4	*69.1
93	7	8	7	4	*69.1
93	7	12	7	2	*69.1
93	7	13	1	2	*69.1
93	11	3	7	6	39.2
93	11	5	7	6	*69.1
93	11	6	7	6	*69.1
93	11	7	7	6	*69.1
93	11	8	7	6	*69.1
93	11	9	7	3	*69.1
93	11	10	7	4	*69.1
93	11	11	7	4	*69
93	11	12	7	4	*69.1
93	11	13	7	4	*69.1
93	11	14	7	3	*69.1
93	11	15	7	4	*69.1
93	11	16	7	3	*69.1

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	8	1	20	54.75
91	4	1	15	2	55
92	4	1	14	49	54.5
92	7	2	15	33	54.25
93	4	8	0	44	54.75
93	7	1	14	41	54.75
93	10	1	20	56	54.5

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	8	1	20	41
91	4	1	15	2	41
92	4	1	14	49	41.25
92	7	2	15	33	41.25
93	4	8	0	44	41.25
93	7	1	14	41	41.25
93	10	1	20	56	41.5

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

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Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	7	14	33	85
91	4	9	19	32	87
91	5	22	14	42	85.5
91	5	22	15	2	85.5
92	1	15	n/a	n/a	87.25
92	11	4	n/a	n/a	86.75
92	11	23	n/a	n/a	86
93	1	20	n/a	n/a	85.75

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Surface Level Data					
FIC					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	13	7	3	7.4
91	1	14	7	4	7.5
91	1	15	7	3	7.4
91	1	16	7	4	7.4
91	1	17	7	4	7.4
91	1	18	7	4	7.4
91	1	22	7	4	7.4
91	1	23	7	4	7.4
91	1	24	7	4	7.4
91	1	25	7	3	7.4
91	1	26	7	3	7.4
91	1	27	7	3	7.4
91	1	28	7	10	7.4
91	1	29	7	2	7.4
91	1	30	7	10	7.3
91	1	31	7	2	7.4
91	2	1	7	2	7.4
91	2	2	7	4	7.5
91	2	3	7	3	7.4
91	2	4	7	3	7.4
91	2	5	7	4	7.4
91	2	6	7	4	7.4
91	2	7	7	4	7.4
91	2	8	7	4	7.4
91	2	9	7	4	7.4
91	2	10	7	3	7.4
91	2	11	7	4	7.4
91	2	12	7	4	7.4
91	2	13	7	4	7.4
91	2	14	7	4	7.4
91	2	15	7	3	7.4
91	2	16	7	2	7.4
91	2	17	7	2	7.5
91	2	18	7	3	7.4
91	2	19	7	2	7.4
91	2	20	7	3	7.4
91	2	21	7	2	7.4
91	2	22	7	2	7.4
91	2	23	7	2	7.4
91	2	24	7	3	7.4
91	2	25	7	3	7.4
91	2	26	7	3	7.4
91	2	27	7	2	7.4
91	2	28	7	2	7.4
91	3	1	7	2	7.4
91	3	2	7	2	7.4

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	3	3	7	3	7.4
91	3	4	7	3	7.4
91	3	5	7	3	7.4
91	3	6	7	2	7.4
91	3	7	7	2	7.4
91	3	8	7	2	7.4
91	3	9	7	2	7.4
91	3	10	7	2	7.4
91	3	11	7	2	7.4
91	3	12	7	3	7.4
91	3	13	7	3	7.4
91	3	14	7	3	7.4
91	3	15	7	3	7.4
91	3	16	7	3	7.4
91	3	17	7	2	7.4
91	3	18	7	3	7.4
91	3	19	7	3	7.5
91	3	20	7	2	7.4
91	3	21	7	3	7.4
91	3	22	7	2	7.4
91	3	23	7	3	7.4
91	3	24	7	3	7.4
91	3	25	7	3	7.4
91	3	26	7	3	7.4
91	3	27	7	3	7.4
91	3	28	7	3	7.4
91	3	29	7	3	7.4
91	3	30	7	3	7.4
91	3	31	7	3	7.4
91	4	1	7	3	7.4
91	4	2	7	3	7.4
91	4	3	7	3	7.4
91	4	4	7	3	7.4
91	4	5	7	3	7.4
91	4	6	7	3	7.4
91	4	7	7	3	7.4
91	4	8	7	4	7.4
91	4	9	7	3	7.4
91	4	10	7	3	7.4
91	4	11	7	3	7.4
91	4	12	7	3	7.4
91	4	13	7	4	7.4
91	4	14	7	3	7.4
91	4	15	7	3	7.4
91	4	16	7	10	7.4
91	4	17	7	3	7.4
91	4	18	7	6	7.4
91	4	19	7	5	7.4

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	4	20	7	6	7.4
91	4	21	7	5	7.4
91	4	22	7	6	7.4
91	4	23	7	6	7.4
91	4	24	6	6	7.4
91	4	25	7	5	7.4
91	4	26	7	5	7.4
91	4	27	7	5	7.4
91	4	28	7	6	7.4
91	4	29	7	5	7.4
91	4	30	7	6	7.4
91	5	1	7	5	7.4
91	5	2	7	5	7.4
91	5	3	7	6	7.4
91	5	4	7	5	7.4
91	5	5	7	5	7.4
91	5	6	7	5	7.4
91	5	7	7	5	7.4
91	5	8	7	5	7.4
91	5	9	7	5	7.4
91	5	10	7	5	7.4
91	5	11	7	5	7.4
91	5	12	7	5	7.4
91	5	13	7	5	7.4
91	5	14	7	5	7.4
91	5	15	6	5	7.4
91	5	16	7	6	7.4
91	5	17	7	6	7.4
91	5	18	7	6	7.4
91	5	19	7	5	7.4
91	5	20	6	6	7.4
91	5	21	7	6	7.4
91	5	22	7	5	7.4
91	5	23	7	5	7.4
91	5	24	7	5	7.4
91	5	25	7	5	7.4
91	5	26	7	5	7.4
91	5	27	7	5	7.4
91	5	28	6	5	7.4
91	5	29	7	5	7.4
91	5	30	7	5	7.4
91	5	31	7	5	7.4
91	6	1	7	5	7.4
91	6	2	7	5	7.4
91	6	3	7	5	7.4
91	6	4	7	5	7.4
91	6	5	7	5	7.4
91	6	6	7	6	7.4

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	6	11	7	5	7.5
91	6	12	7	4	7.4
91	6	13	7	5	7.4
91	6	14	7	5	7.4
91	6	15	7	5	7.5
91	6	16	7	5	7.5
91	6	17	7	5	7.4
91	6	18	7	5	7.4
91	6	19	7	5	7.5
91	6	20	7	5	7.5
91	6	21	7	6	7.5
91	6	22	7	5	7.5
91	6	23	7	5	7.5
91	6	24	7	5	7.5
91	6	25	7	6	7.5
91	6	26	7	3	7.5
91	6	27	7	2	7.5
91	6	28	7	3	7.5
91	6	29	7	2	7.5
91	10	26	7	3	7.5
91	10	27	7	2	7.5
91	10	28	7	2	7.5
91	10	29	7	3	7.5
91	10	30	7	3	7.5
91	10	31	6	2	7.5
91	11	1	7	2	7.5
91	11	2	7	3	7.5
91	11	3	7	3	7.5
91	11	4	7	2	7.5
91	11	5	7	3	7.5
91	11	6	7	3	7.5
91	11	7	7	2	7.5
91	11	8	7	3	7.5
91	11	9	7	2	7.5
91	11	10	7	3	7.5
91	11	11	7	10	7.5
91	11	12	7	3	7.5
91	11	13	7	3	7.5
91	11	14	7	3	7.5
91	11	15	7	3	7.5
91	11	16	7	3	7.5
91	11	17	7	2	7.5
91	11	18	7	3	7.5
91	11	19	7	3	7.5
91	11	20	7	3	7.5
91	11	21	7	2	7.5
91	11	22	7	3	7.5
91	11	23	7	2	7.5

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
91	11	24	7	3	7.5
91	11	25	7	3	7.5
91	11	27	7	3	7.5
91	11	28	7	3	7.5
91	11	29	7	3	7.5
91	11	30	7	3	7.5
91	12	1	7	3	7.5
91	12	2	7	3	7.5
91	12	3	7	3	7.5
91	12	4	7	3	7.5
91	12	5	7	3	7.5
91	12	6	6	3	7.5
91	12	7	7	3	7.5
91	12	8	7	3	7.5
91	12	9	7	3	7.5
91	12	10	7	3	7.5
91	12	11	7	2	7.5
91	12	12	7	3	7.5
91	12	13	7	5	7.5
91	12	14	7	2	7.5
91	12	15	7	2	7.5
91	12	16	7	3	7.5
91	12	17	7	6	7.5
91	12	18	7	3	7.5
91	12	19	7	3	7.5
91	12	20	7	2	7.5
91	12	21	7	3	7.5
91	12	22	7	5	7.5
91	12	23	7	6	7.5
91	12	24	7	3	7.5
91	12	25	7	3	7.5
91	12	26	7	3	7.5
91	12	27	7	3	7.5
91	12	28	7	2	7.5
91	12	29	7	3	7.5
91	12	30	7	3	7.5
91	12	31	7	3	7.5
92	1	1	7	3	7.5
92	1	2	7	2	7.5
92	1	3	7	4	7.5
92	1	4	7	3	7.5
92	1	5	7	3	7.5
92	1	6	7	3	7.5
92	1	7	7	4	7.5
92	1	8	7	3	7.5
92	1	9	7	3	7.5
92	1	10	7	4	7.5
92	1	11	7	4	7.5

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	1	15	7	3	7.5
92	1	16	7	4	7.5
92	1	17	7	4	7.5
92	1	18	7	4	7.5
92	1	19	7	3	7.5
92	1	20	7	3	7.5
92	1	21	7	3	7.5
92	1	22	7	6	7.5
92	1	23	7	3	7.5
92	1	24	7	2	7.5
92	1	25	7	3	7.5
92	1	26	7	10	7.5
92	1	27	7	2	7.5
92	1	28	7	3	7.5
92	1	29	7	3	7.5
92	1	30	5	3	7.5
92	1	31	7	3	7.5
92	2	1	7	2	7.5
92	2	2	7	3	7.5
92	2	3	7	3	7.5
92	2	4	7	3	7.5
92	2	5	7	2	7.5
92	2	8	7	4	7.5
92	2	9	7	3	7.5
92	2	10	7	4	7.5
92	2	11	7	3	7.5
92	2	12	7	3	7.5
92	2	13	7	3	7.5
92	2	14	7	3	7.5
92	2	15	7	3	7.5
92	2	16	7	3	7.5
92	2	17	7	3	7.5
92	2	18	6	2	7.5
92	2	19	7	3	7.5
92	2	20	7	3	7.5
92	2	21	7	3	7.5
92	2	22	7	3	7.5
92	2	23	7	3	7.5
92	2	24	7	3	7.4
92	2	25	7	4	7.5
92	2	26	7	3	7.5
92	2	27	7	4	7.5
92	2	28	7	4	7.5
92	2	29	7	3	7.5
92	3	1	7	3	7.5
92	3	2	7	3	7.5
92	3	3	7	4	7.6
92	3	4	7	4	7.5

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	3	5	7	3	7.5
92	3	6	7	3	7.5
92	3	7	7	2	7.5
92	3	8	7	2	7.5
92	3	9	7	2	7.5
92	3	10	7	3	7.5
92	3	11	7	3	7.5
92	3	12	7	3	7.5
92	3	13	7	3	7.5
92	3	14	7	3	7.5
92	3	15	7	6	7.5
92	3	16	7	3	7.5
92	3	17	7	3	7.5
92	3	18	7	3	7.5
92	3	19	7	3	7.5
92	3	20	7	2	7.5
92	3	21	7	3	7.5
92	3	22	7	2	7.5
92	3	23	7	2	7.5
92	3	24	7	2	7.5
92	3	25	7	3	7.5
92	3	26	7	3	7.5
92	3	27	7	2	7.5
92	3	28	7	3	7.5
92	3	29	7	3	7.5
92	3	30	7	3	7.5
92	3	31	7	3	7.5
92	4	1	7	3	7.5
92	4	2	7	3	7.5
92	4	3	7	3	7.5
92	4	4	7	3	7.5
92	4	5	7	3	7.5
92	4	6	7	3	7.5
92	4	7	7	3	7.5
92	4	8	7	10	7.5
92	4	9	7	3	7.5
92	4	10	7	3	7.5
92	12	15	7	3	7.6
92	12	16	7	4	7.6
92	12	17	7	3	7.6
92	12	18	7	3	7.6
92	12	19	7	3	7.6
92	12	20	7	4	7.6
92	12	21	7	4	7.6
92	12	23	7	4	7.6
92	12	24	7	3	7.6
92	12	25	7	3	7.6
92	12	26	7	3	7.6

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
92	12	27	7	3	7.6
92	12	28	7	3	7.6
92	12	30	7	3	7.6
92	12	31	7	3	7.6
93	1	1	7	4	7.6
93	1	12	7	6	7.6
93	1	13	7	6	7.6
93	1	14	7	3	7.6
93	1	15	7	3	7.5
93	1	17	7	2	7.5
93	1	18	7	2	7.6
93	1	19	7	2	7.5
93	1	20	7	2	7.6
93	1	21	7	2	7.5
93	1	22	7	4	7.6
93	1	23	7	3	7.5
93	1	24	7	3	7.6
93	1	25	7	3	7.5
93	1	26	7	4	7.5
93	4	18	7	6	7.6
93	4	19	7	6	7.6
93	4	22	7	6	7.7
93	4	23	7	6	7.7
93	4	24	6	6	7.7
93	4	25	7	6	7.7
93	4	26	7	6	7.7
93	4	27	7	6	7.7
93	4	28	7	3	7.7
93	4	29	7	3	7.7
93	4	30	7	6	7.7
93	5	1	7	5	7.7
93	5	2	7	6	7.7
93	5	3	7	6	7.7
93	5	11	7	6	7.7
93	5	12	7	6	7.7
93	5	13	7	6	7.7
93	5	15	7	6	7.6
93	5	16	7	5	7.6
93	5	17	7	3	7.6
93	5	18	7	3	7.6
93	5	19	7	3	7.5
93	5	20	7	3	7.5
93	5	22	7	3	7.5
93	5	23	7	4	7.5
93	5	24	7	3	7.6
93	5	25	7	3	7.5
93	5	26	7	3	7.6
93	5	27	7	3	7.5

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	5	28	7	3	7.5
93	5	29	7	5	7.5
93	5	30	7	5	7.5
93	5	31	7	6	7.5
93	6	1	7	6	7.5
93	6	2	7	6	7.6
93	6	3	7	6	7.6
93	6	4	7	6	7.5
93	6	5	7	6	7.6
93	6	6	7	5	7.6
93	6	7	7	5	7.6
93	6	8	7	5	7.6
93	6	9	7	5	7.6
93	6	10	7	4	7.6
93	6	11	7	5	7.6
93	6	12	7	5	7.6
93	6	13	7	4	7.5
93	6	14	7	5	7.5
93	6	15	7	5	7.6
93	6	16	7	5	7.6
93	6	17	7	5	7.5
93	6	18	7	6	7.6
93	6	25	7	3	7.6
93	6	26	7	3	7.6
93	6	27	7	4	7.6
93	6	28	7	3	7.6
93	6	29	7	4	7.6
93	6	30	7	3	7.6
93	7	1	7	6	7.6
93	7	2	7	6	7.6
93	7	3	7	3	7.6
93	7	4	7	4	7.6
93	7	5	7	3	7.6
93	7	6	7	3	7.6
93	7	7	7	4	7.6
93	7	8	7	4	7.6
93	7	12	7	2	7.6
93	7	13	1	2	7.6
93	11	3	7	6	7.9
93	11	5	7	6	7.8
93	11	6	7	6	7.8
93	11	7	7	6	7.8
93	11	8	7	6	7.8
93	11	9	7	3	7.8
93	11	10	7	4	7.9
93	11	11	7	4	7.9
93	11	12	7	4	7.9
93	11	13	7	4	7.9

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	11	14	7	3	7.9
93	11	15	7	4	7.9
93	11	16	7	3	7.9

Data obtained from WHC Surveillance Computer System Analysis (SACS), November 16, 1993.

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	8	1	20	150.5
91	4	1	15	24	150.5
91	7	2	15	24	151
91	10	11	15	24	149
92	1	1	16	11	150.25
92	4	1	14	49	150
92	7	6	16	47	151.25
92	10	9	16	11	151.25
92	10	19	14	11	151
92	11	23	16	11	151
93	1	4	15	44	151
93	4	8	0	44	150.75
93	7	1	14	41	145.5
93	7	1	16	41	145
93	7	6	11	2	145
93	7	8	13	5	145
93	8	11	17	46	150.25
93	8	12	15	18	150.75
93	8	13	15	18	150.75
93	8	14	15	18	150.75
93	8	15	13	37	150.25
93	8	16	13	37	150.25
93	8	17	13	37	150.25
93	8	18	13	37	150.25
93	8	19	13	37	150.25
93	8	20	13	37	150.25
93	8	21	13	37	150.25
93	8	22	14	21	150.25
93	8	23	12	28	150.25
93	8	24	15	50	150.25
93	8	25	17	5	153
93	8	26	15	58	153
93	8	27	17	27	150.25
93	8	28	17	27	151.75
93	8	29	17	1	150.75
93	8	30	17	1	150.25
93	8	31	14	39	150.25
93	9	1	16	38	150.25
93	9	2	16	38	150.25
93	9	3	16	38	150.25
93	9	4	16	38	150.25
93	9	5	16	38	150.25
93	9	6	16	38	150.25
93	9	7	10	38	151
93	9	7	16	38	150.5
93	9	8	14	38	152

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

*Inaccurate Data

Year	Month	Day	Hour	Minutes	Surface Level
93	9	9	14	38	145
93	9	10	14	38	150.25
93	9	11	14	38	150.25
93	9	12	14	38	150.25
93	9	13	14	38	150.25
93	9	14	14	38	151.25
93	9	15	14	38	150.75
93	9	16	14	38	150.75
93	9	17	14	38	150.25
93	9	18	14	38	150.25
93	9	19	14	38	150.25
93	9	20	14	38	150.25
93	9	21	14	38	151.75
93	9	22	14	38	150.25
93	9	23	14	38	151.5
93	9	24	14	38	150.5
93	9	25	14	38	151.75
93	9	26	14	38	151.75
93	9	27	14	38	150.25
93	9	28	16	38	151.75
93	9	29	16	38	151.75
93	9	30	21	35	152
93	10	1	20	50	151.5
93	10	2	22	58	151.75
93	10	3	21	8	151.75
93	10	4	23	24	151.75
93	10	5	13	46	150.25
93	10	6	19	1	151.75
93	10	7	11	30	151
93	10	7	20	30	150.5
93	10	8	20	30	151.75
93	10	9	21	15	152
93	10	10	22	18	152
93	10	12	0	19	152
93	10	13	21	54	157.25
93	10	14	14	49	*152
93	10	14	17	39	157.25
93	10	15	20	3	157
93	10	16	20	12	157
93	10	17	20	55	157
93	10	18	21	13	157
93	10	19	21	19	157
93	10	20	21	44	157
93	10	21	21	52	*152
93	10	21	23	40	157.25
93	10	23	20	54	157
93	10	26	21	32	157
93	10	27	21	20	157

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

*Inaccurate Data

Year	Month	Day	Hour	Minutes	Surface Level
93	10	28	15	22	156.75
93	10	29	15	44	157.25
93	10	30	14	23	157
93	10	31	13	13	157.25
93	11	1	15	44	157.35
93	11	3	16	58	157
93	11	4	17	35	156.75
93	11	5	14	31	156.75
93	11	6	14	15	*145.5
93	11	6	15	26	157
93	11	7	13	57	156.75
93	11	8	14	38	157
93	11	9	14	51	157
93	11	10	14	33	157.25
93	11	11	15	39	157.25
93	11	12	14	58	152
93	11	13	15	2	157.25
93	11	14	14	32	151.5
93	11	15	15	4	157

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

*Inaccurate Data

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	8	1	20	144
91	4	1	15	24	144
91	7	1	15	24	144
91	10	9	7	50	144.25
91	10	11	7	50	144.25
92	1	1	14	46	144.25
92	4	3	14	46	145
92	4	6	14	46	144.75
92	4	23	8	28	144.5
92	7	2	15	33	144.25
92	10	6	10	0	144.75
92	10	9	10	0	145.5
92	10	13	10	0	145
92	10	14	9	7	145
92	10	19	14	11	145
93	3	23	18	35	145
93	4	8	0	44	145.25
93	6	4	14	50	145.25
93	7	1	14	41	145.75
93	8	11	13	46	145.5
93	8	12	13	32	145.5
93	8	13	14	6	145.5
93	8	14	15	18	145.5
93	8	15	17	4	145.5
93	8	17	13	51	145.5
93	8	18	14	47	145.25
93	8	19	14	20	145.5
93	8	20	11	18	145.5
93	8	21	13	37	145.5
93	8	22	14	21	145.5
93	8	23	12	28	145.5
93	8	24	15	50	145.5
93	8	25	17	5	145.5
93	8	26	15	58	145.5
93	8	27	18	40	145.5
93	8	28	15	27	145.5
93	8	30	17	1	145.5
93	8	31	14	39	145.5
93	9	1	16	38	145.5
93	9	2	16	38	145.5
93	9	3	16	38	145.5
93	9	4	16	38	145.25
93	9	5	16	38	145.5
93	9	6	16	38	145.5
93	9	7	16	38	145.5
93	9	8	16	38	145.5

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	9	9	16	38	145.5
93	9	10	16	38	145.5
93	9	11	16	38	145.5
93	9	12	16	38	145.25
93	9	13	16	38	145.5
93	9	14	16	38	145.5
93	9	15	16	38	145.5
93	9	16	16	38	145.5
93	9	17	16	38	145.5
93	9	18	16	38	145.5
93	9	19	16	38	145.25
93	9	20	16	38	145.5
93	9	21	16	38	145.5
93	9	22	16	38	145.5
93	9	23	16	38	145.5
93	9	24	16	38	145.5
93	9	25	16	38	145.5
93	9	26	16	38	145.5
93	9	27	16	38	145.5
93	9	28	16	38	145.5
93	9	29	16	38	145.5
93	9	30	21	35	145.5
93	10	1	20	50	145.5
93	10	2	22	58	145.25
93	10	3	21	8	145.5
93	10	4	23	24	145.75
93	10	5	13	46	145.5
93	10	6	19	5	145.5
93	10	8	20	30	145.5
93	10	9	21	15	145.75
93	10	10	22	18	145.5
93	10	12	0	19	145.75
93	10	13	21	54	145.5
93	10	14	14	49	145.5
93	10	14	17	39	145.5
93	10	15	20	3	145.5
93	10	16	20	12	145.5
93	10	17	20	55	145.5
93	10	18	21	13	145.5
93	10	19	21	19	145.5
93	10	20	21	44	145.5
93	10	21	21	52	145.5
93	10	23	20	54	145.5
93	10	26	21	32	145.5
93	10	27	21	20	145.5
93	10	28	15	22	145.5
93	10	29	15	44	145.5
93	10	30	14	23	145.5

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Year	Month	Day	Hour	Minutes	Surface Level
93	10	31	13	13	145.5
93	11	1	15	44	146
93	11	3	16	58	145.5
93	11	4	17	35	145.5
93	11	5	14	31	145.25
93	11	6	14	17	145.5
93	11	7	13	57	145.5
93	11	8	14	38	145.5
93	11	9	14	51	145.5
93	11	10	14	33	145.5
93	11	11	15	39	145.5
93	11	12	14	58	145.5
93	11	13	15	2	145.5
93	11	14	14	32	145.5
93	11	15	15	4	145.5

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

Surface Level Data					
Manual Tape					
Year	Month	Day	Hour	Minutes	Surface Level
91	1	8	1	20	260
91	4	1	15	24	260.5
91	10	10	7	50	260
92	4	1	14	49	*251
92	4	1	19	49	*251
92	4	3	14	46	260
92	7	6	16	47	260.25
93	4	8	0	44	259.75
93	7	1	14	41	259.75
93	8	11	14	26	260
93	8	12	13	32	260
93	8	13	14	6	260
93	8	16	9	40	260
93	8	17	13	51	260
93	8	18	14	47	260
93	8	19	14	20	260
93	8	20	11	18	260
93	8	21	13	37	260
93	8	22	14	21	260
93	8	23	12	28	260
93	8	24	15	50	260
93	8	25	17	5	260
93	8	26	15	58	260
93	8	27	18	40	260
93	8	28	15	27	260
93	8	30	17	1	260
93	8	31	14	39	260
93	9	29	16	38	260
93	9	30	21	35	260
93	10	1	20	50	260
93	10	2	22	58	260
93	10	3	21	8	260
93	10	4	23	24	260
93	10	5	13	46	260
93	10	6	19	5	260
93	10	8	20	30	260
93	10	9	21	15	260
93	10	10	22	18	260
93	10	12	0	19	260.25
93	10	13	21	54	260
93	10	14	14	49	260
93	10	14	17	39	260
93	10	15	20	3	260
93	10	16	20	12	260
93	10	17	20	55	260
93	10	18	21	13	260

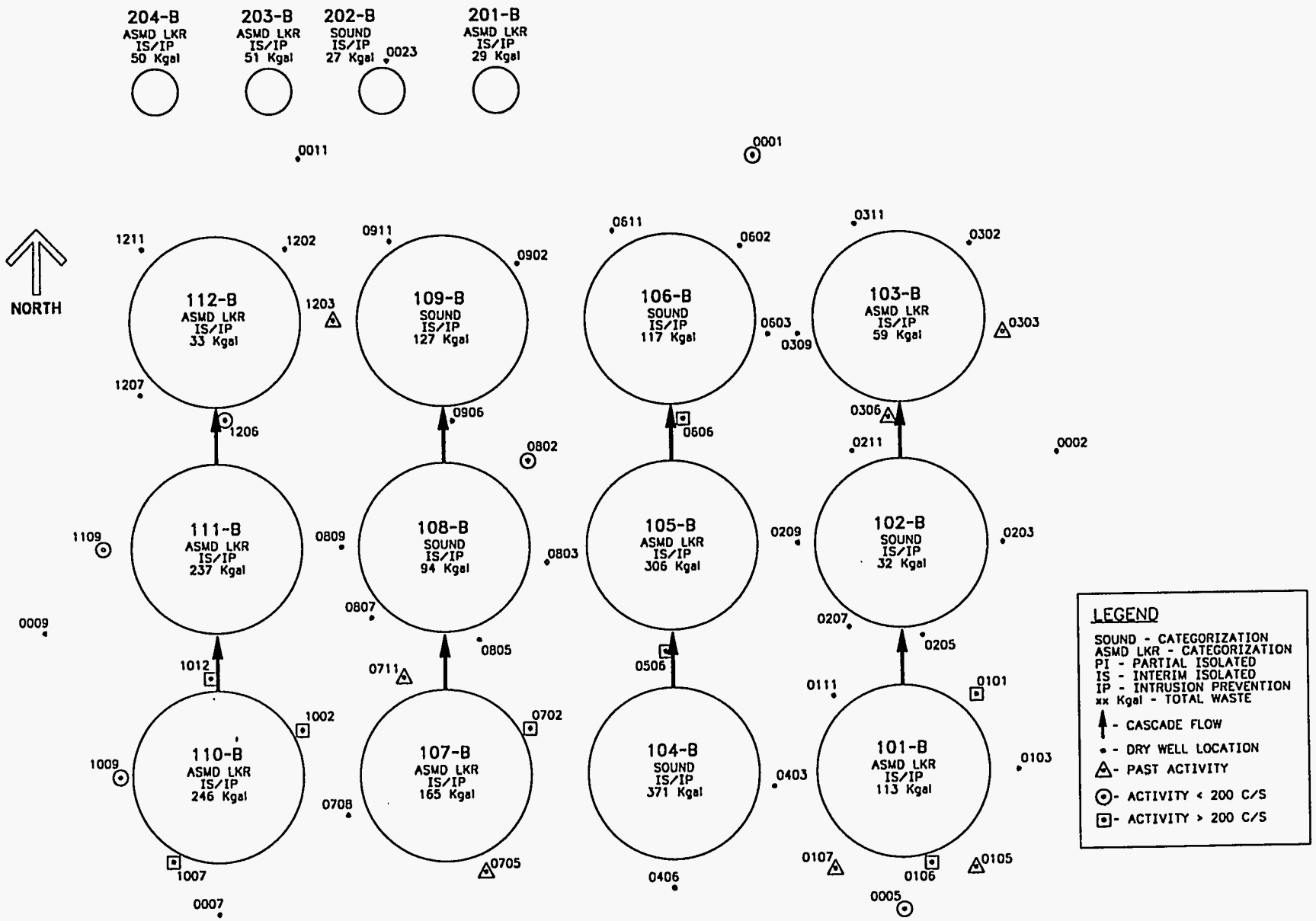
Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

*Inaccurate Data

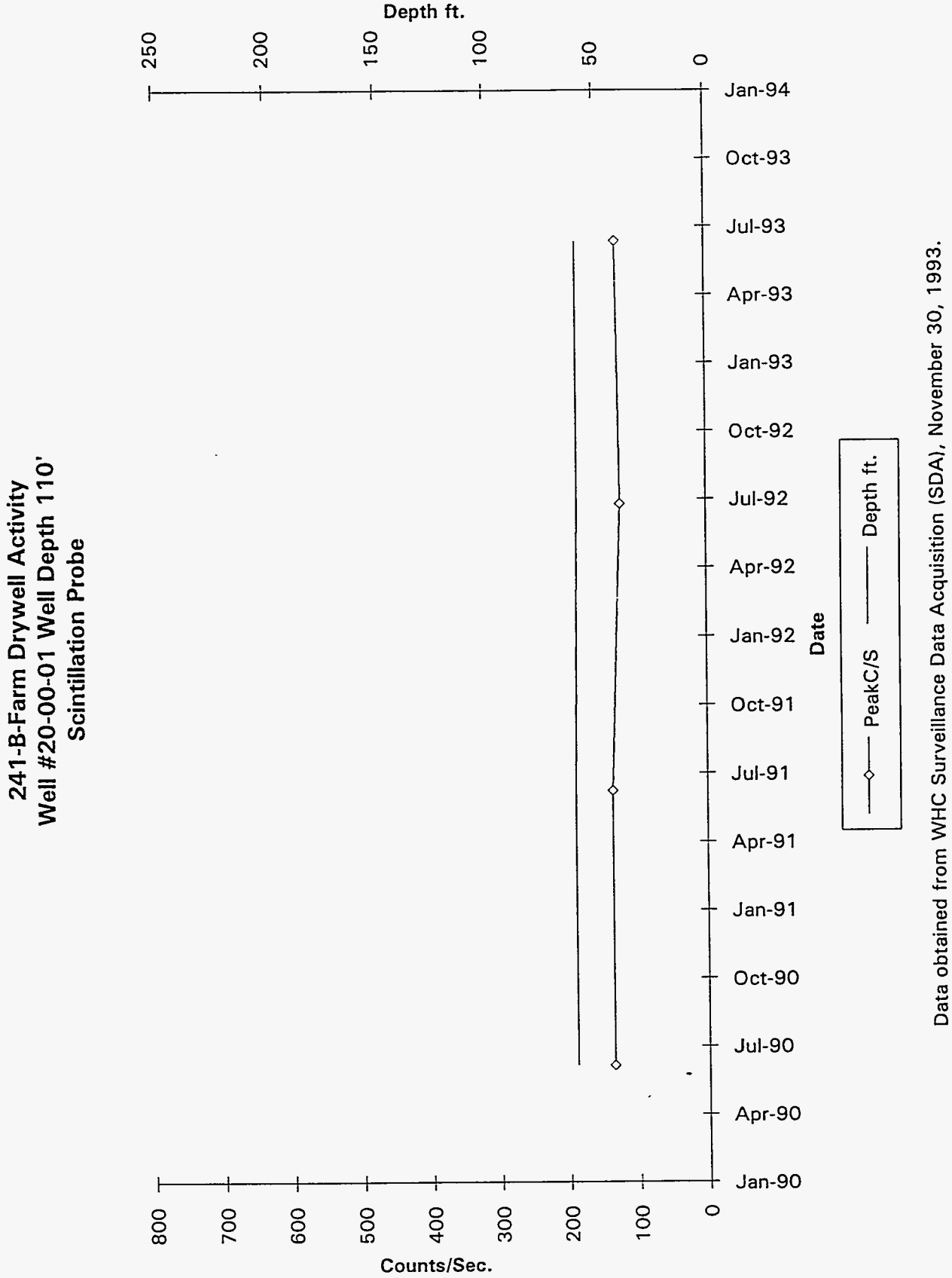
Year	Month	Day	Hour	Minutes	Surface Level
93	10	19	21	19	260
93	10	20	21	44	260
93	10	21	21	52	260.25
93	10	23	20	54	259.75
93	10	26	21	32	260
93	10	27	21	20	260
93	10	28	15	22	260
93	10	29	15	44	260
93	10	30	14	23	260
93	10	31	13	13	260
93	11	1	15	44	260
93	11	3	16	58	260
93	11	4	17	35	260
93	11	5	14	31	260
93	11	6	14	15	260
93	11	7	13	57	260
93	11	8	14	38	259.75
93	11	9	14	51	259.75
93	11	10	14	33	260
93	11	11	15	39	260
93	11	12	14	58	260
93	11	13	15	2	260
93	11	14	14	32	260
93	11	15	15	4	259.75

Data obtained from WHC Surveillance Analysis Computer System (SACS), November 16, 1993.

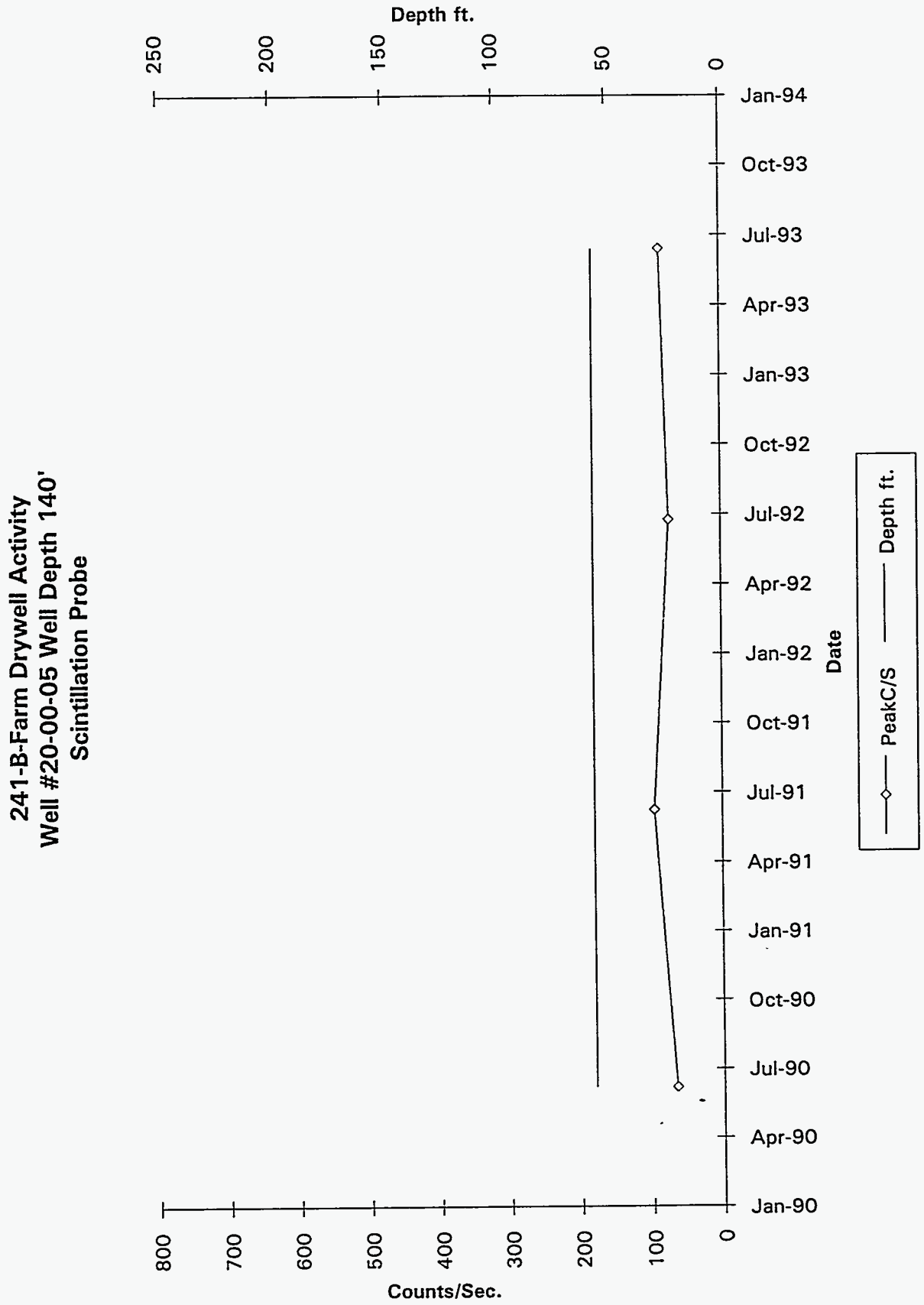
*Inaccurate Data


204-B
ASMD LKR
IS/IP
50 Kgal
203-B
ASMD LKR
IS/IP
51 Kgal
202-B
SOUND
IS/IP
27 Kgal
201-B
ASMD LKR
IS/IP
29 Kgal
NORTH
112-B
ASMD LKR
IS/IP
33 Kgal
109-B
SOUND
IS/IP
127 Kgal
106-B
SOUND
IS/IP
117 Kgal
103-B
ASMD LKR
IS/IP
59 Kgal
111-B
ASMD LKR
IS/IP
237 Kgal
108-B
SOUND
IS/IP
94 Kgal
105-B
ASMD LKR
IS/IP
306 Kgal
102-B
SOUND
IS/IP
32 Kgal
110-B
ASMD LKR
IS/IP
246 Kgal
107-B
ASMD LKR
IS/IP
165 Kgal
104-B
SOUND
IS/IP
371 Kgal
101-B
ASMD LKR
IS/IP
113 Kgal
LEGEND
SOUND - CATEGORIZATION
ASMD LKR - CATEGORIZATION
PI - PARTIAL ISOLATED
IS - INTERIM ISOLATED
IP - INTRUSION PREVENTION
xx Kgal - TOTAL WASTE
- CASCADE FLOW
- DRY WELL LOCATION
- PAST ACTIVITY
- ACTIVITY < 200 C/S
- ACTIVITY > 200 C/S

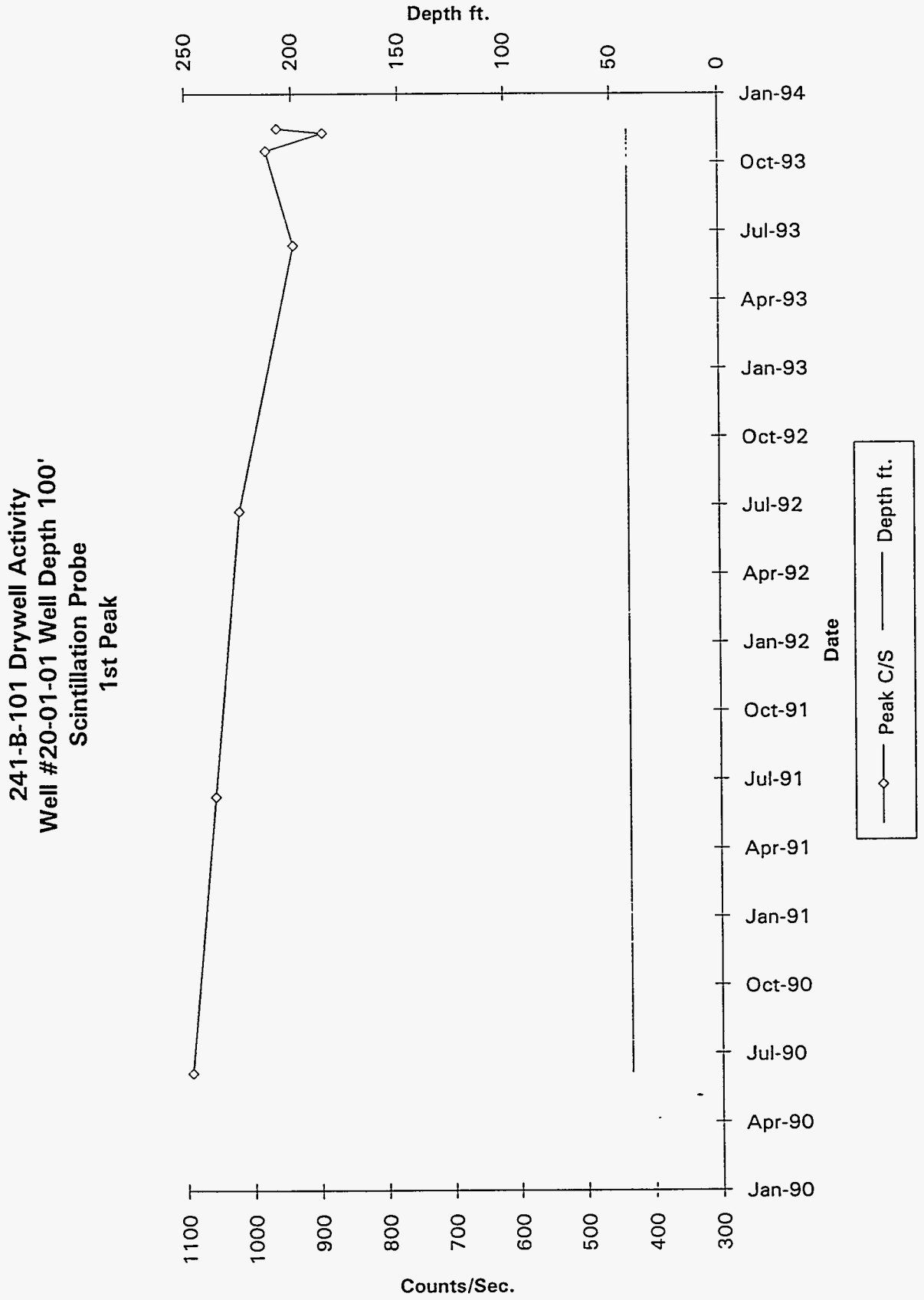
241-B FARM



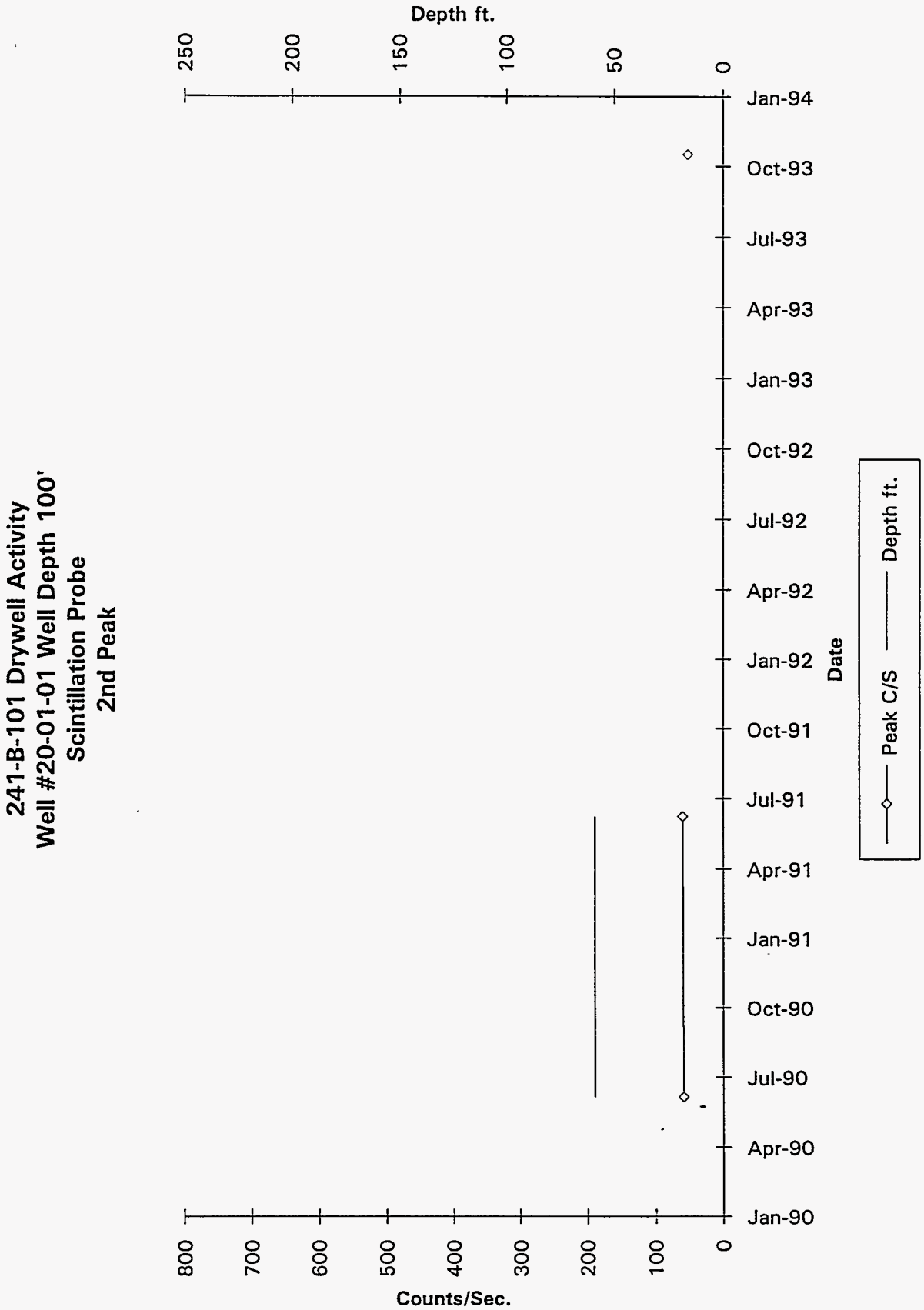
Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

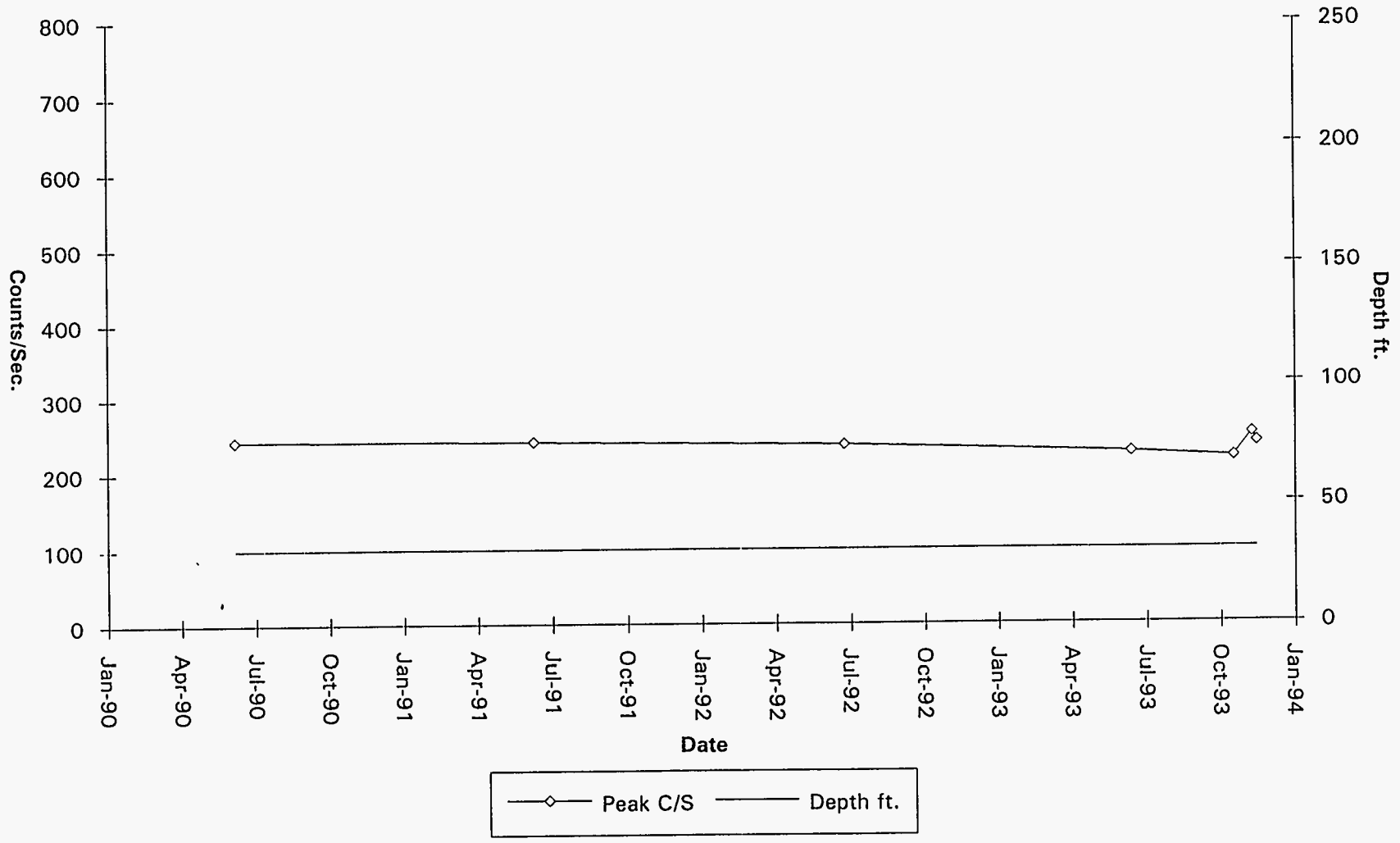


Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



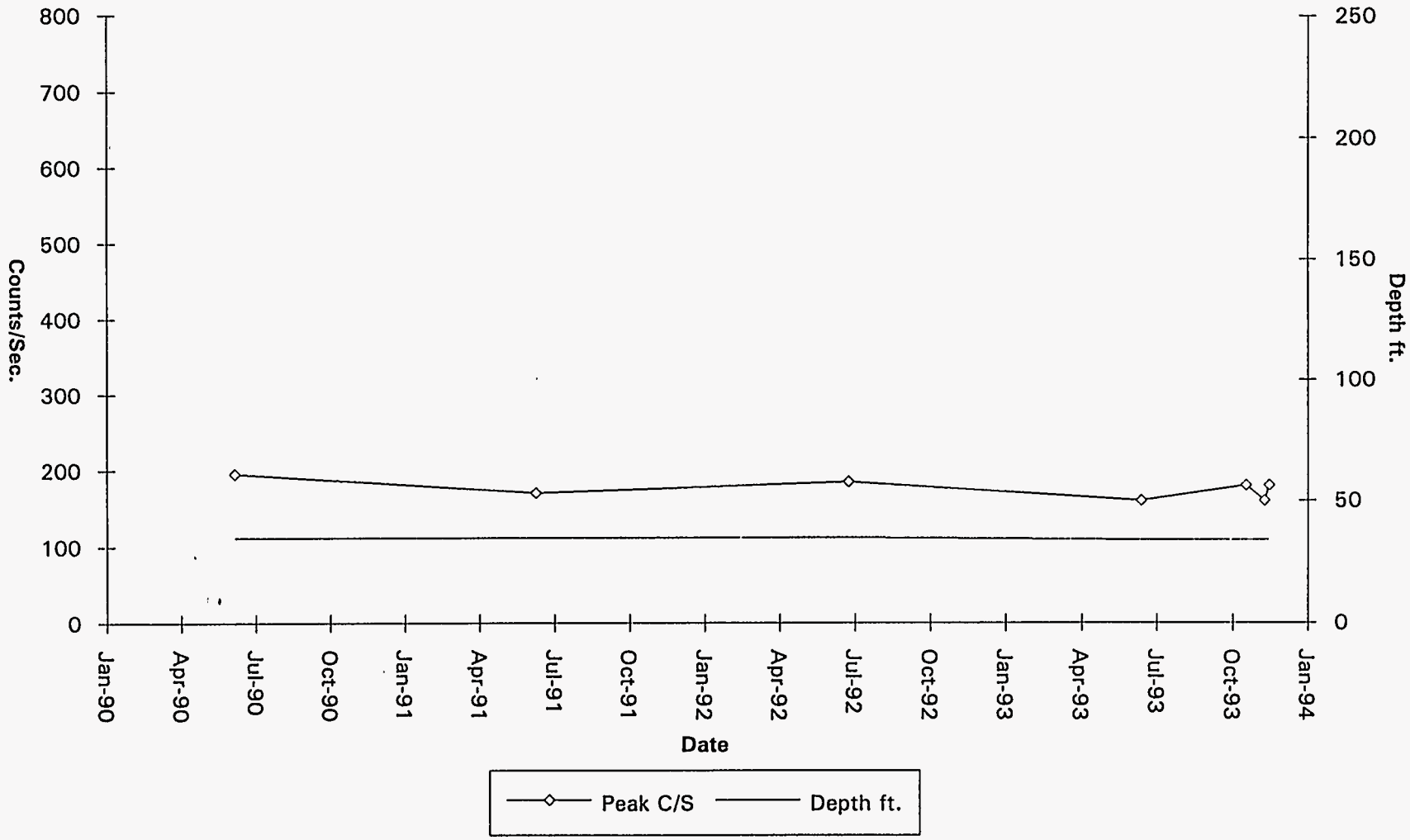
Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-101 Drywell Activity
Well #20-01-06 Well Depth 60'
Scintillation Probe 1st Peak

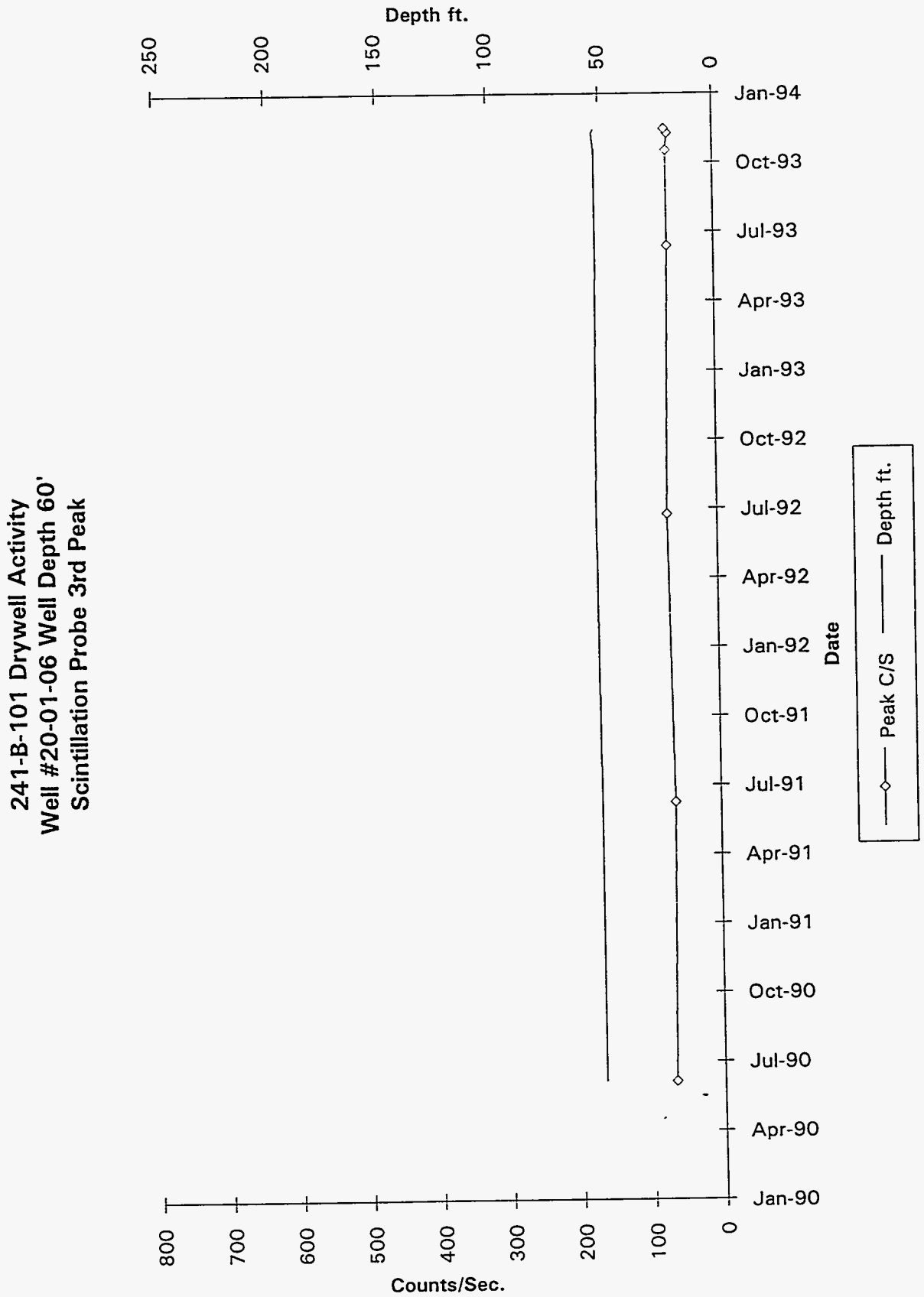


Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

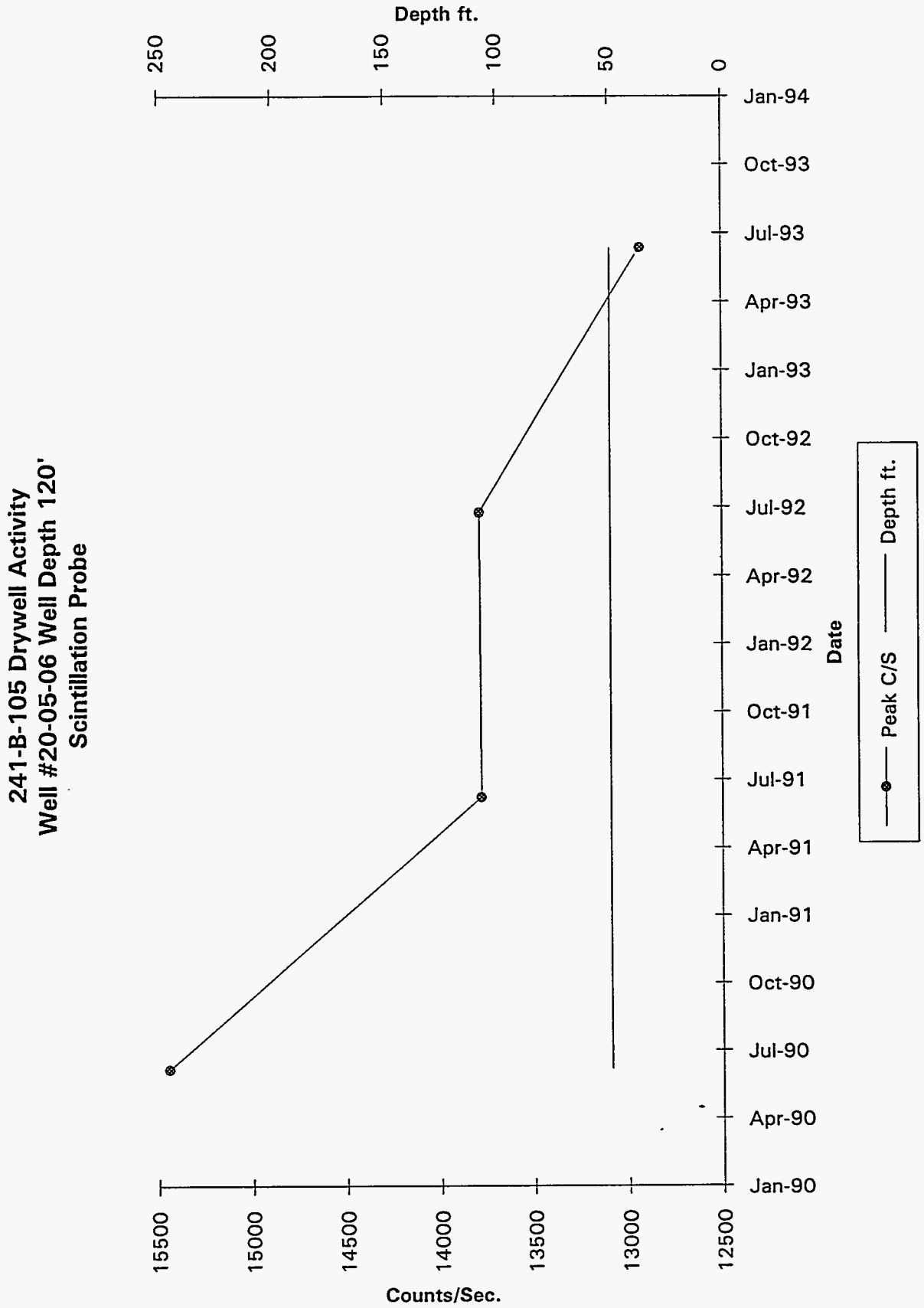
241-B-101 Drywell Activity
Well #20-01-06 Well Depth 60'
Scintillation Probe 2nd Peak



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



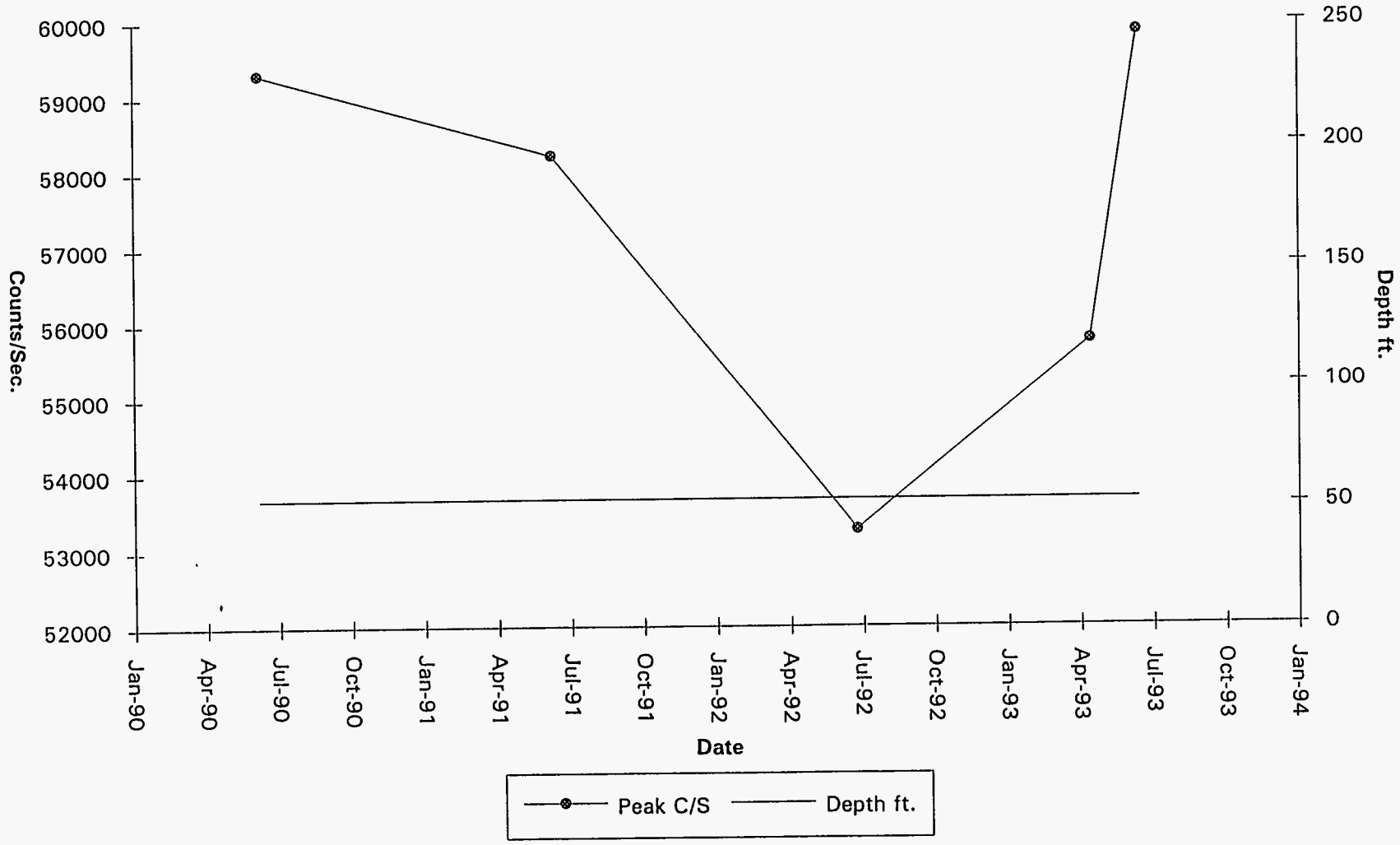
Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

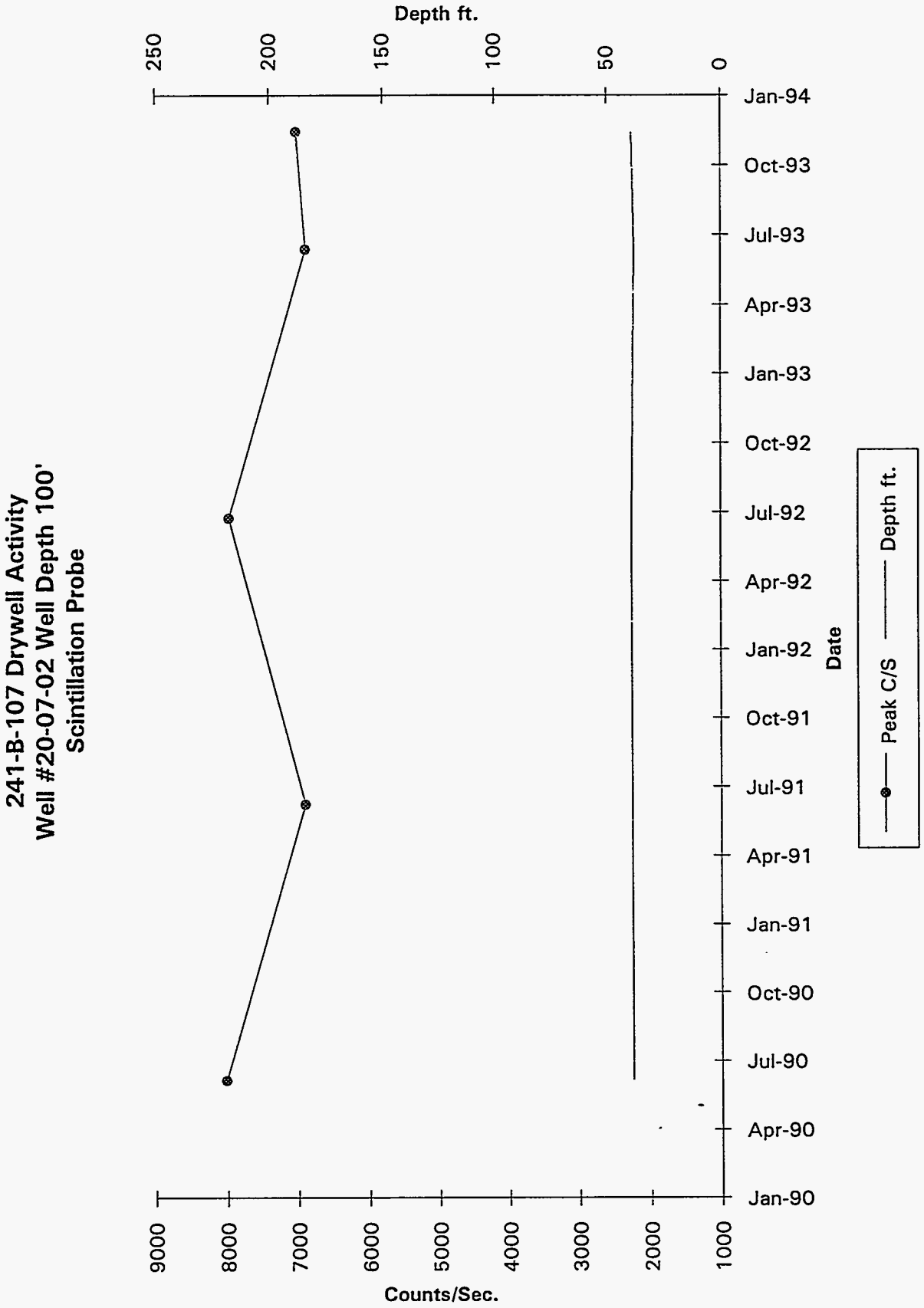
Graph not to scale with others.

241-B-106 Drywell Activity
Well #20-06-06 Well Depth 100'
Scintillation Probe



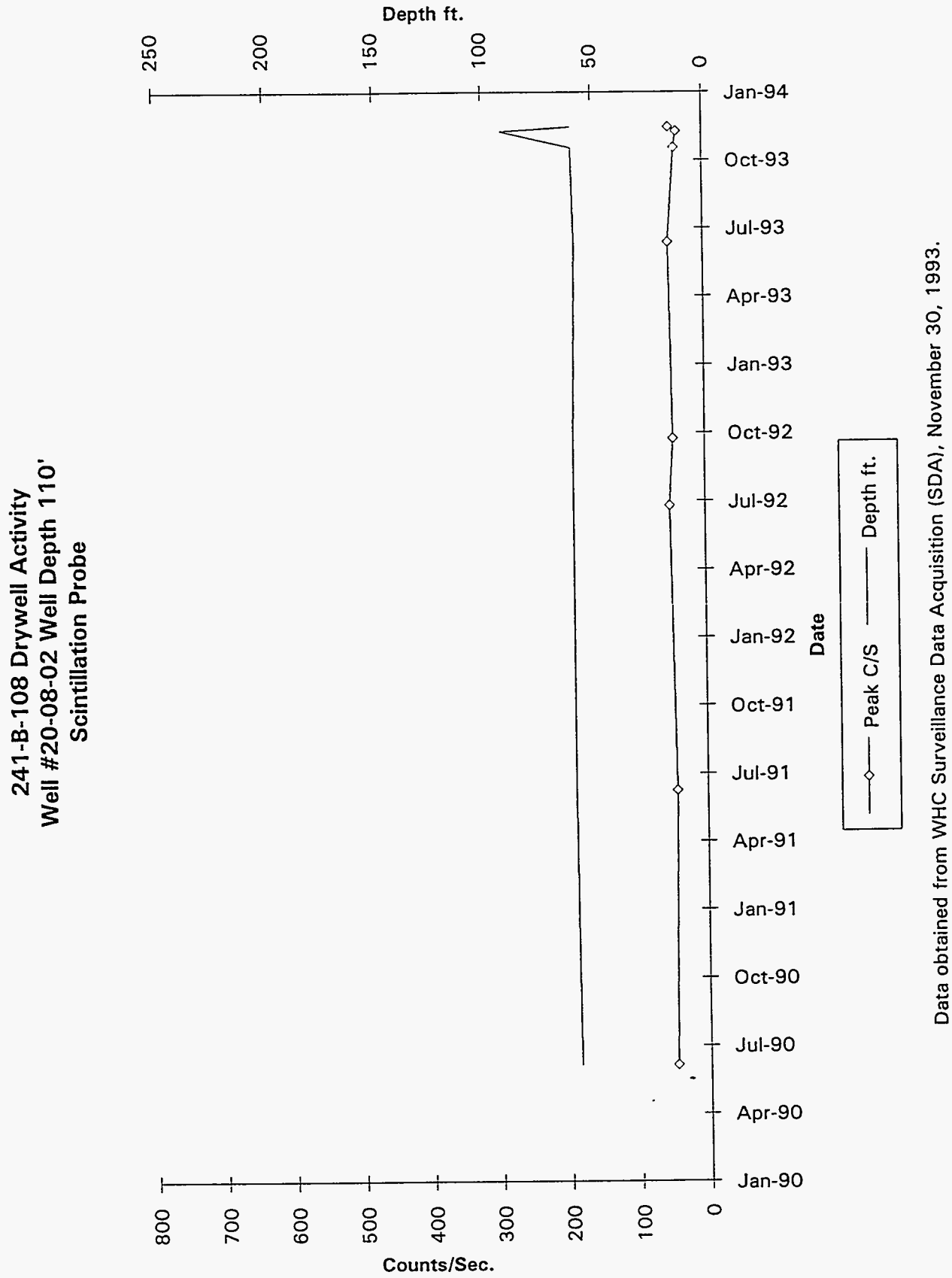
Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

Graph r cale with others.

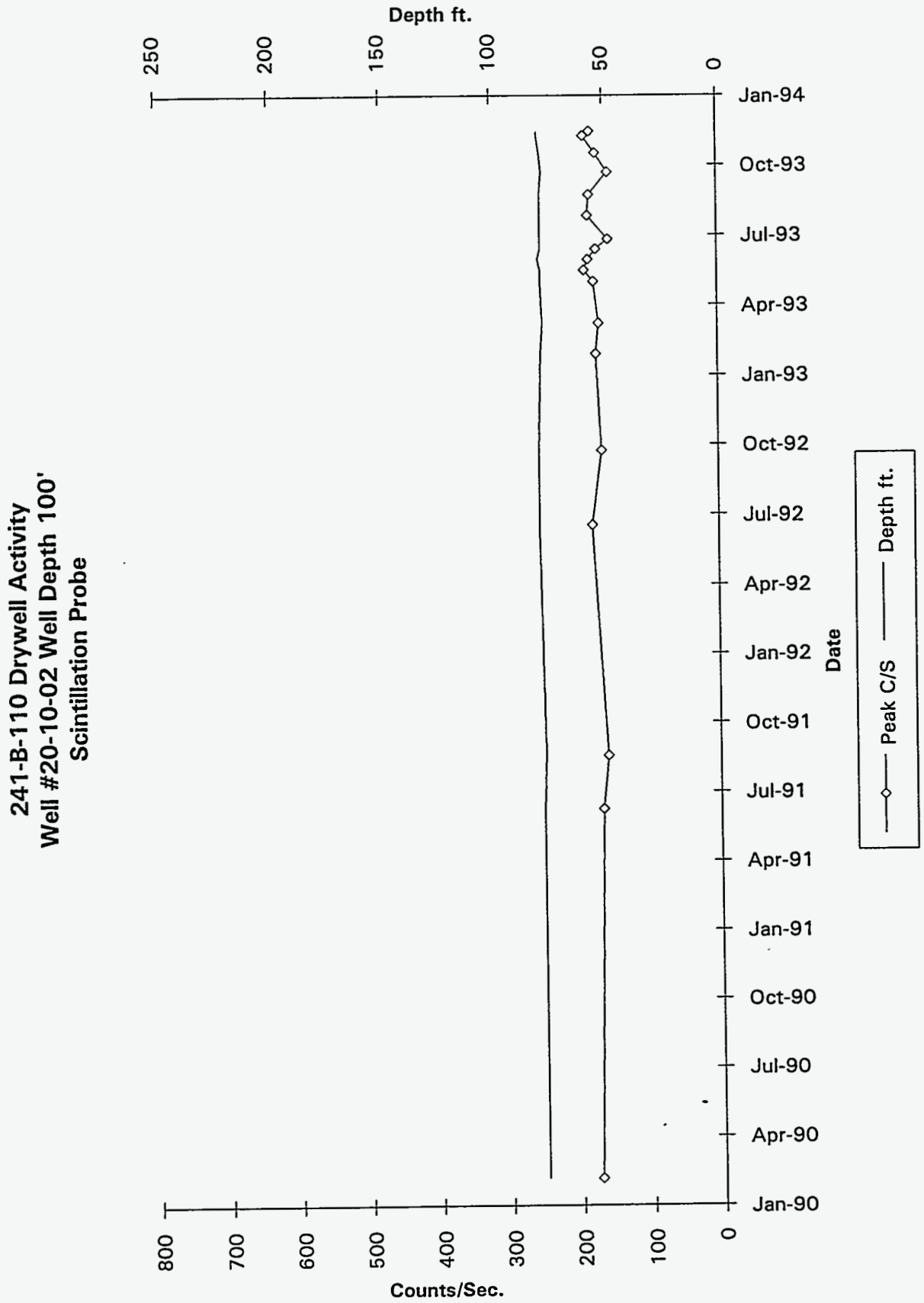


Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

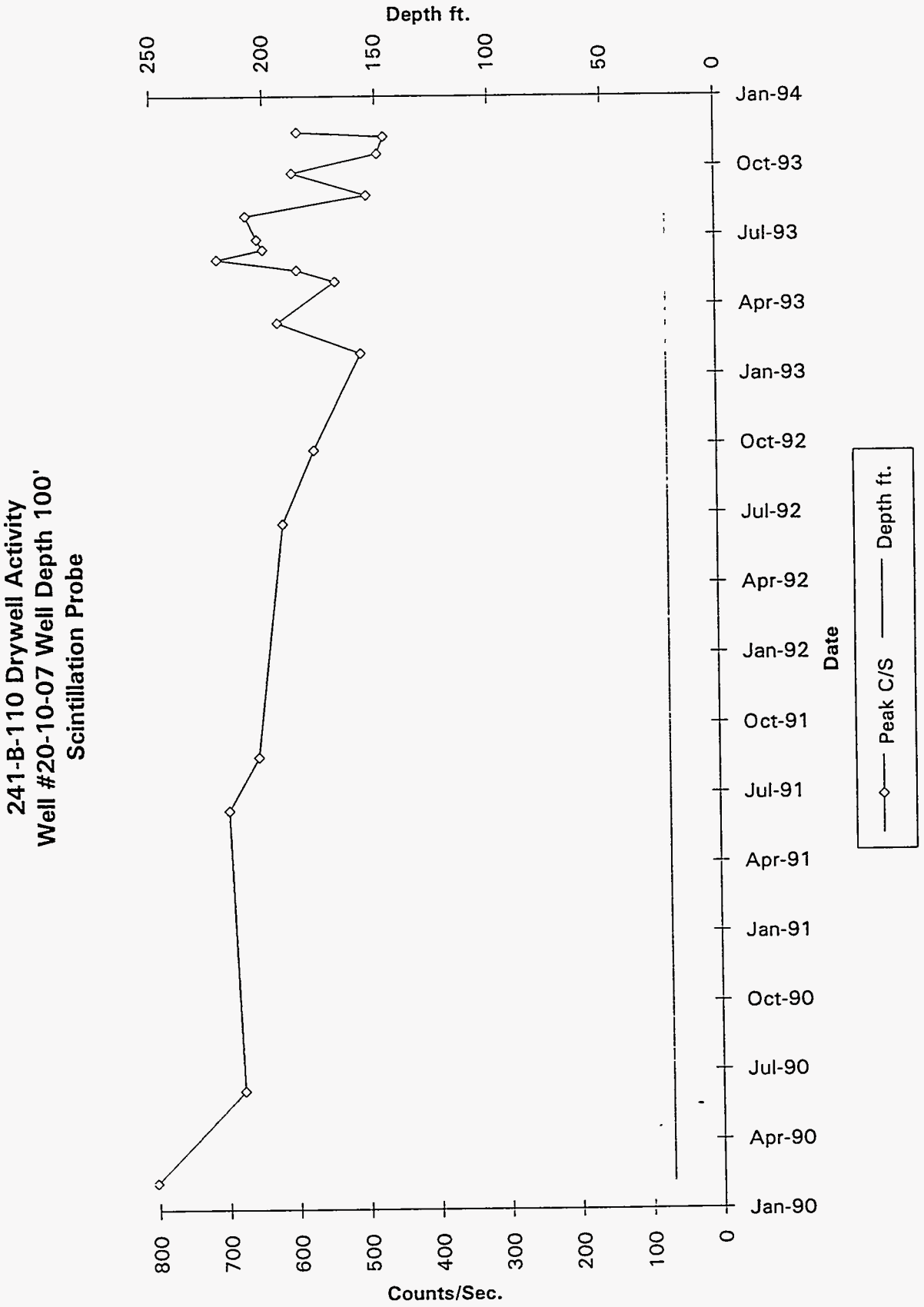
Graph not to scale with others.



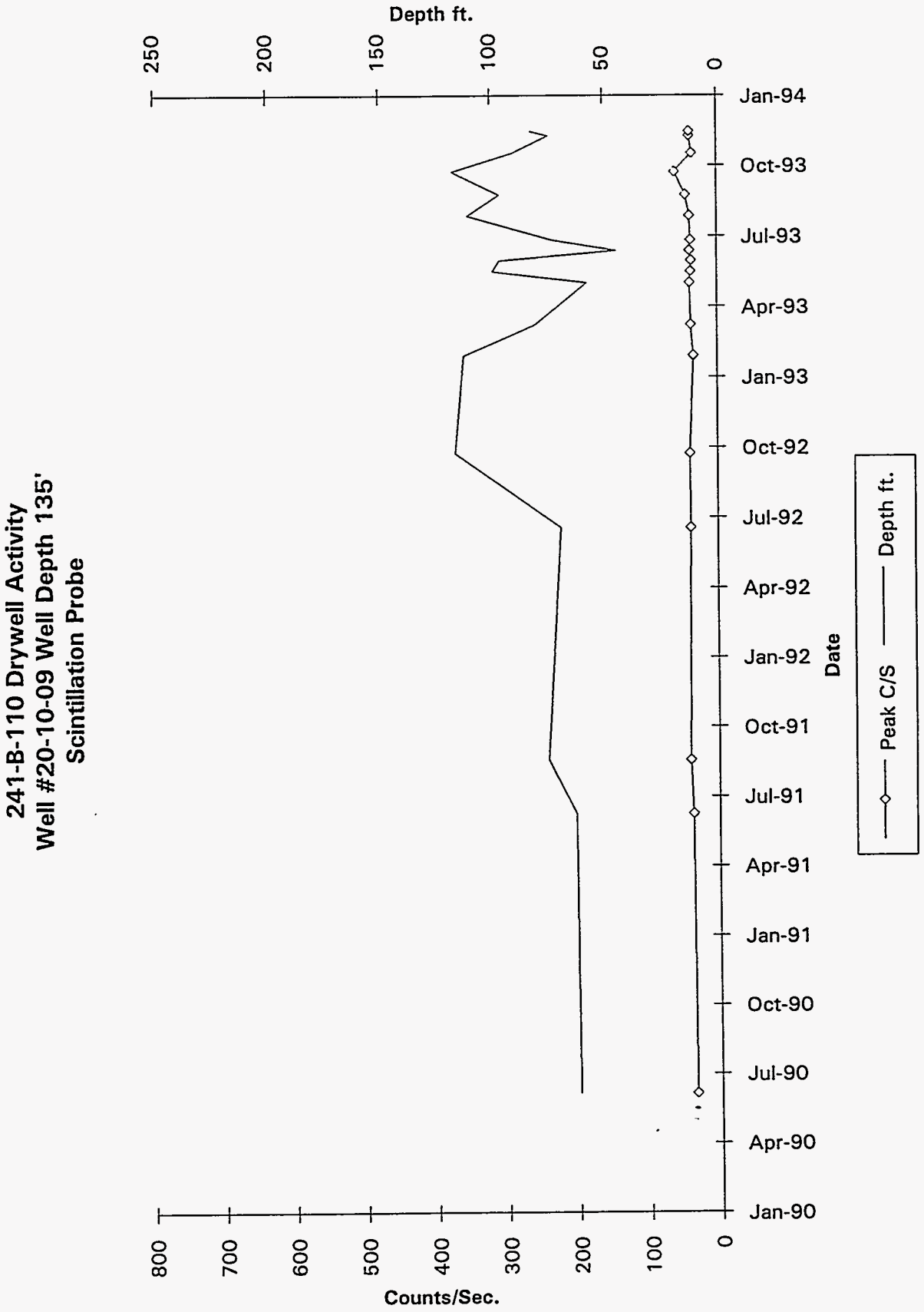
Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

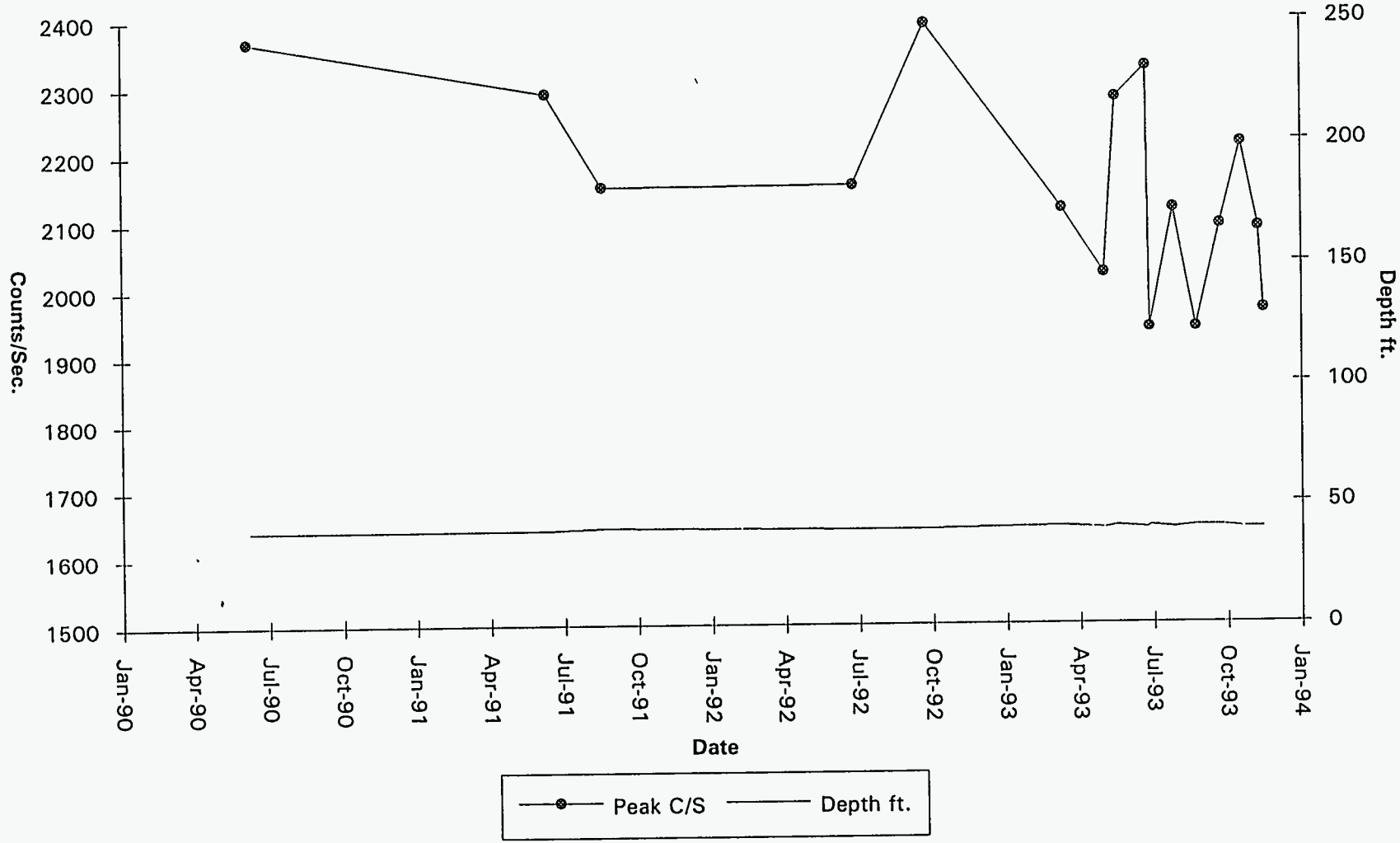


Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

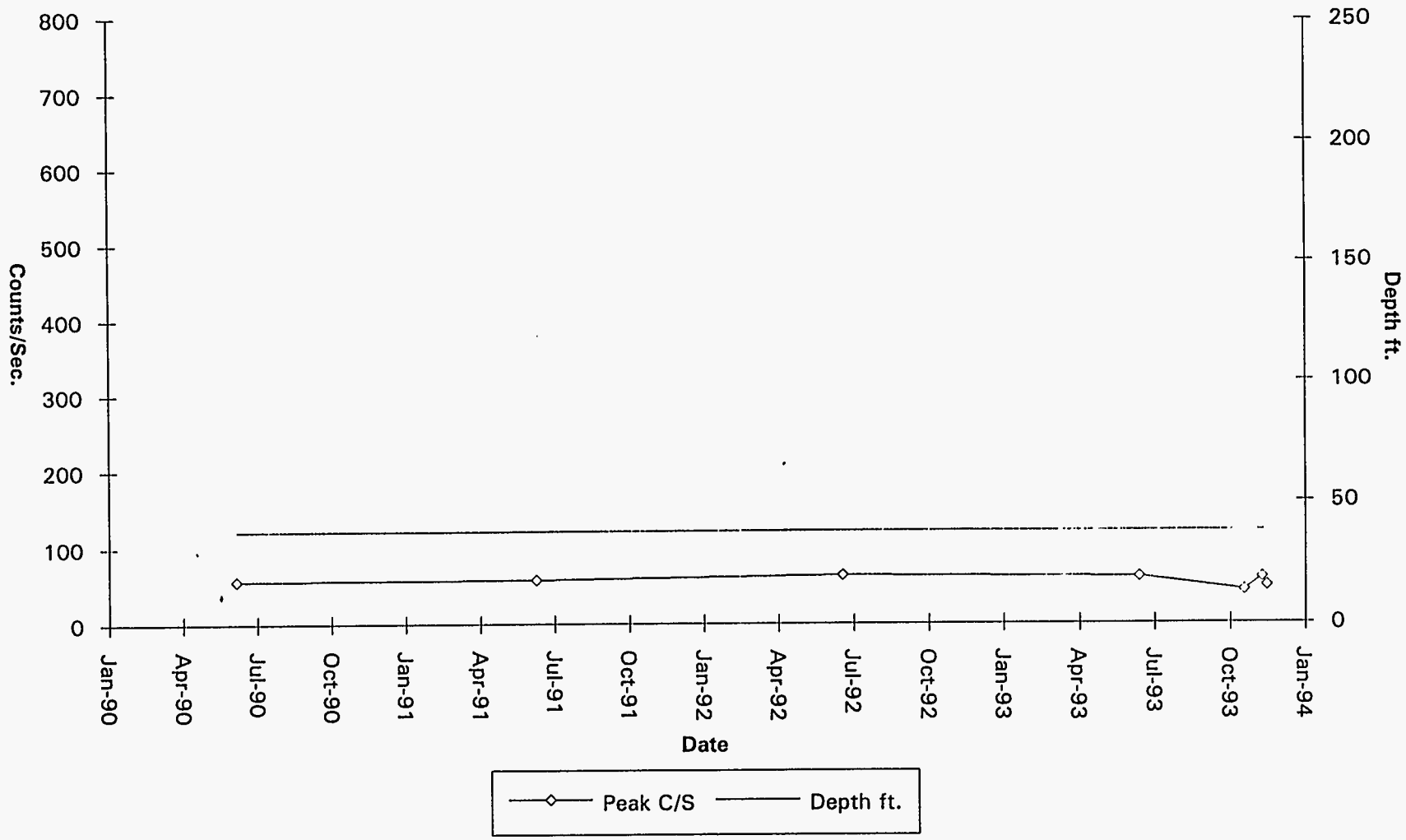
241-B-110 Drywell Activity
Well #20-10-12 Well Depth 120'
GM # 2 Probe



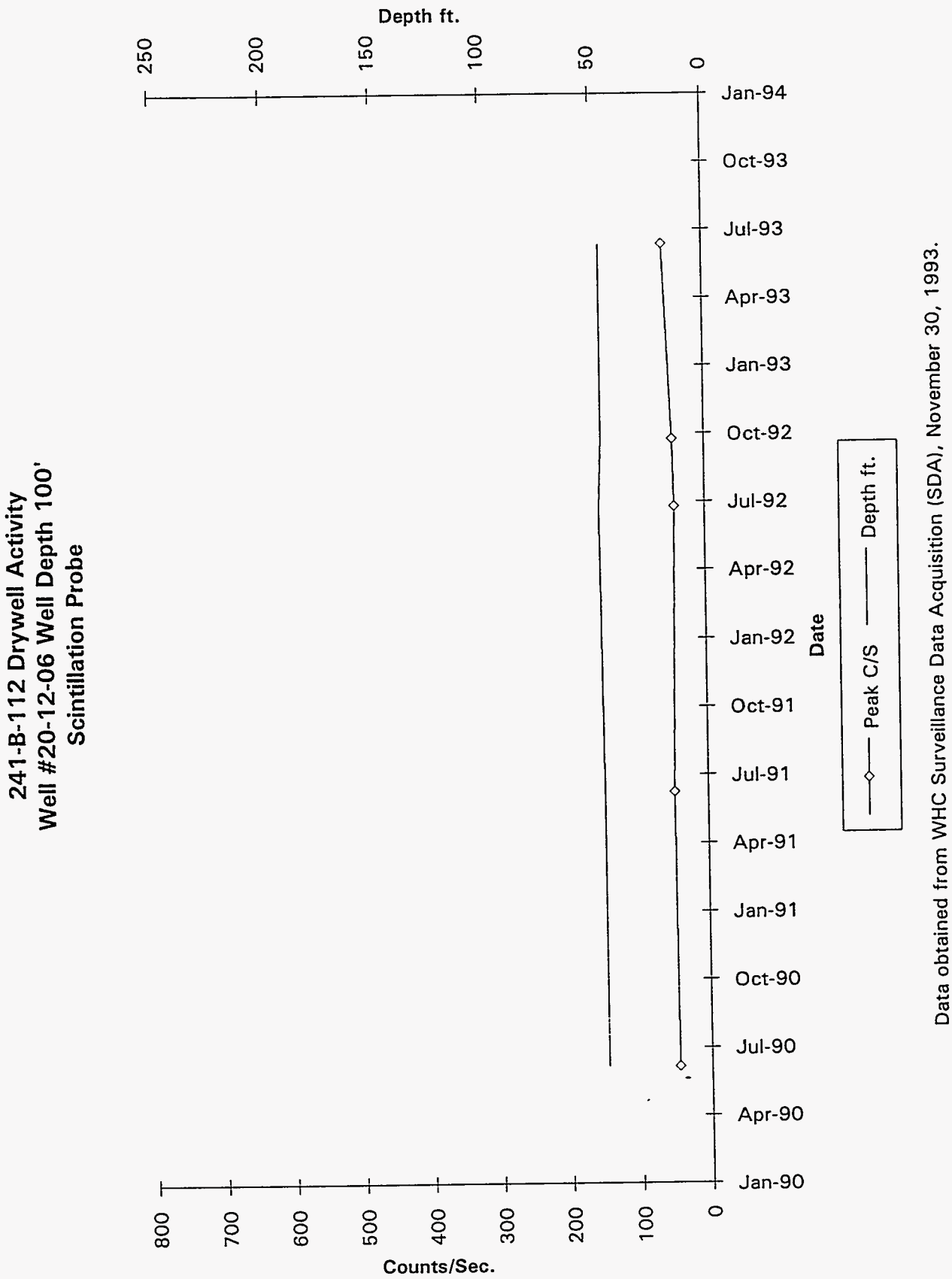
Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

Graph r cale with others.

241-B-111 Drywell Activity
Well #20-11-09 Well Depth 120'
Scintillation Probe



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.



Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-FARM DRYWELL ACTIVITY						
WELL #20-00-01 WELL DEPTH 110'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	136	59				
6/10/91	136	59				
*6/25/92	40	124				
6/26/92	123	58				
6/14/93	128	58				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-FARM DRYWELL ACTIVITY						
WELL #20-00-05 WELL DEPTH 140'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
*6/7/90	93	56				
6/8/90	66	56				
6/10/91	96	56				
6/25/92	73	56				
*6/14/93	85	55				
6/15/93	85	56				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-101 DRYWELL ACTIVITY						
WELL #20-01-01 WELL DEPTH 100'						
SCINTILLATION PROBE 1st Peak						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	1093	42				
6/10/91	1056	42				
6/25/92	1020	42				
6/14/93	937	42				
10/18/93	978	42				
*11/10/93	37	64				
11/10/93	893	42				
11/16/93	961	42				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-101 DRYWELL ACTIVITY						
WELL #20-01-01 WELL DEPTH 100'						
SCINTILLATION PROBE 2nd Peak						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	58	59				
6/10/91	60	59				
6/25/92						
6/14/93						
10/18/93	52	59				
11/10/93						
11/16/93						

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-101 DRYWELL ACTIVITY						
WELL #20-01-06 WELL DEPTH 60'						
SCINTILLATION PROBE 1st Peak						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	243	31				
6/10/91	242	31				
6/25/92	237	31				
6/14/93	226	31				
10/18/93	219	31				
11/10/93	250	31				
11/16/93	238	31				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-101 DRYWELL ACTIVITY						
WELL #20-01-06 WELL DEPTH 60'						
SCINTILLATION PROBE 2nd Peak						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	195	35				
6/10/91	170	35				
6/25/92	185	35				
6/14/93	160	34				
10/18/93	180	34				
11/10/93	160	34				
11/16/93	180	34				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-101 DRYWELL ACTIVITY						
WELL #20-01-06 WELL DEPTH 60'						
SCINTILLATION PROBE 3rd Peak						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	68	52				
6/10/91	64	52				
6/25/92	70	53				
6/14/93	65	52				
10/18/93	65	52				
11/10/93	63	53				
11/16/93	67	52				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-105 DRYWELL ACTIVITY						
WELL #20-05-06 WELL DEPTH 120'						
SHIELDED SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/8/90	15444	49				
6/10/91	13780	49				
6/26/92	13788	49				
6/14/93	12931	49				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-106 DRYWELL ACTIVITY						
WELL #20-06-06 WELL DEPTH 100'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	59309	52				
6/10/91	58231	52				
6/25/92	53265	52				
4/15/93	55769	52				
6/14/93	59860	52				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-107 DRYWELL ACTIVITY						
WELL #20-07-02 WELL DEPTH 100'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	8014	39				
6/10/91	6885	39				
6/25/92	7962	39				
6/14/93	6878	38				
11/16/93	7014	39				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-108 DRYWELL ACTIVITY						
WELL #20-08-02 WELL DEPTH 110'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	47	58				
6/10/91	44	59				
6/26/92	51	59				
9/24/92	45	59				
6/14/93	50	58				
*10/18/93	54	67				
10/19/93	40	59				
11/10/93	37	91				
11/16/93	48	59				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-110 DRYWELL ACTIVITY						
WELL #20-10-02 WELL DEPTH 100'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
*2/6/90	183	78				
2/6/90	174	78				
*6/9/90	187	77				
6/10/91	166	78				
8/20/91	158	77				
6/19/92	178	79				
9/24/92	164	79				
*1/28/93	473	68				
1/29/93	171	78				
3/10/93	167	77				
5/3/93	174	78				
5/18/93	187	78				
6/1/93	181	79				
*6/14/93	2113	93				
*6/14/93	7018	90				
6/15/93	170	78				
6/28/93	153	78				
7/29/93	181	78				
8/25/93	179	78				
9/23/93	153	77				
10/18/93	170	78				
11/10/93	187	79				
11/16/93	178	79				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-110 DRYWELL ACTIVITY						
WELL #20-10-07 WELL DEPTH 100'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
*2/6/90	838	22				
2/6/90	803	22				
6/7/90	678	22				
6/10/91	696	22				
8/20/91	653	22				
6/19/92	616	22				
9/24/92	570	22				
*1/28/93	587	83				
1/29/93	503	22				
3/10/93	621	22				
5/3/93	538	22				
5/18/93	592	22				
6/1/93	706	22				
6/14/93	641	22				
6/28/93	649	22				
7/29/93	665	22				
8/25/93	493	22				
9/23/93	598	22				
10/18/93	477	22				
11/10/93	468	22				
11/16/93	590	22				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-110 DRYWELL ACTIVITY						
WELL #20-10-09 WELL DEPTH 135'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	35	62				
6/10/91	37	63				
8/20/91	40	75				
6/19/92	38	69				
9/24/92	39	116				
1/29/93	33	112				
3/10/93	37	80				
5/3/93	38	57				
5/18/93	37	99				
6/1/93	36	96				
6/14/93	38	44				
6/28/93	37	72				
7/29/93	38	110				
8/25/93	44	96				
9/24/93	59	117				
10/18/93	35	90				
11/10/93	38	74				
11/16/93	38	82				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

241-B-110 DRYWELL ACTIVITY						
WELL #20-10-12 WELL DEPTH 120'						
GM #2 PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
*6/7/90	2148	39				
6/8/90	2368	39				
6/12/91	2291	39				
8/20/91	2152	40				
6/26/92	2155	39				
9/24/92	2393	39				
3/12/93	2119	40				
5/3/93	2023	39				
5/18/93	2283	40				
*6/24/93	1985	40				
6/25/93	2328	39				
6/28/93	1941	40				
7/28/93	2118	39				
8/25/93	1941	40				
*9/24/93	1987	39				
9/24/93	2094	40				
10/20/93	2215	39				
11/10/93	2090	39				
11/16/93	1968	39				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-111 DRYWELL ACTIVITY						
WELL #20-11-09 WELL DEPTH 120'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	56	38				
6/10/91	58	38				
6/19/92	63	38				
6/14/93	61	38				
*10/18/93	850	70				
10/19/93	43	38				
11/10/93	60	38				
11/16/93	49	38				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

*Suspect Data

241-B-112 DRYWELL ACTIVITY						
WELL #20-12-06 WELL DEPTH 100'						
SCINTILLATION PROBE						
Date	Peak C/S	Depth ft.		Date	Peak C/S	Depth ft.
6/7/90	46	46				
6/10/91	48	46				
6/26/92	43	47				
9/24/92	45	46				
6/14/93	57	46				

Data obtained from WHC Surveillance Data Acquisition (SDA), November 30, 1993.

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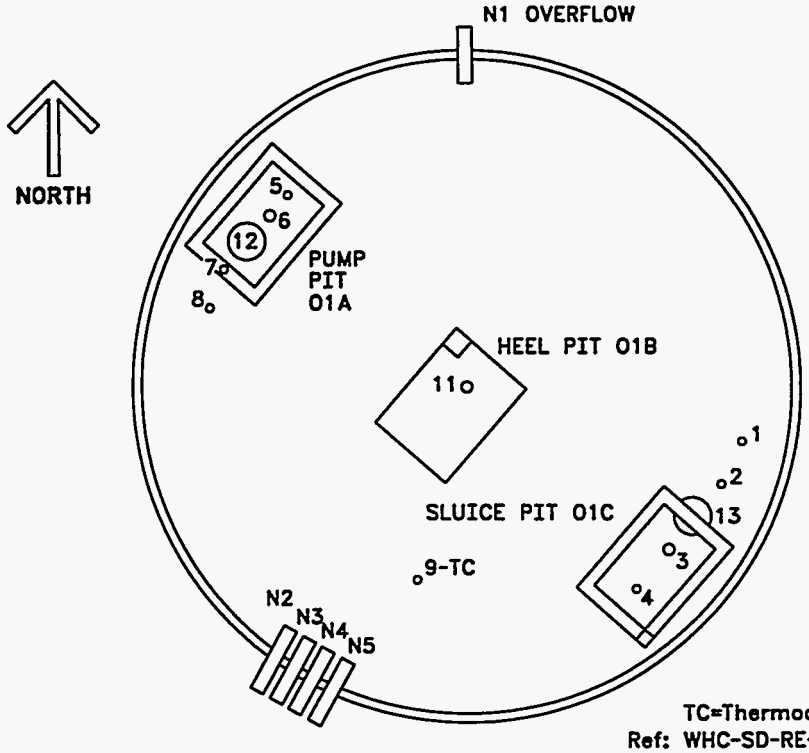
241-B-101		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	BREATHER FILTER
2	12"	FLANGE/B-222 OBSV PORT
3	12"	WC
4	4"	WC
5	4"	WC
6	12"	WC
7	12"	WC
8	4"	FIC, BM
9	4"	TEMPERATURE, BM
11	12"	(SALTWELL SCREEN & PUMP) WC
12	42"	BG
13	42"	BG, MH

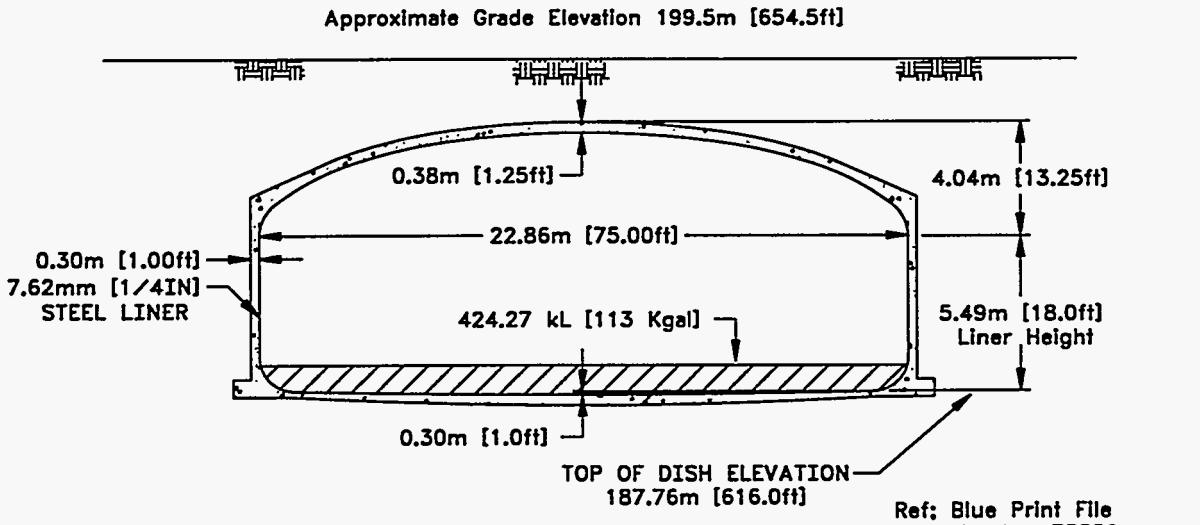
241-B-101

2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73276, Rev. 3

TANK RISER LOCATION

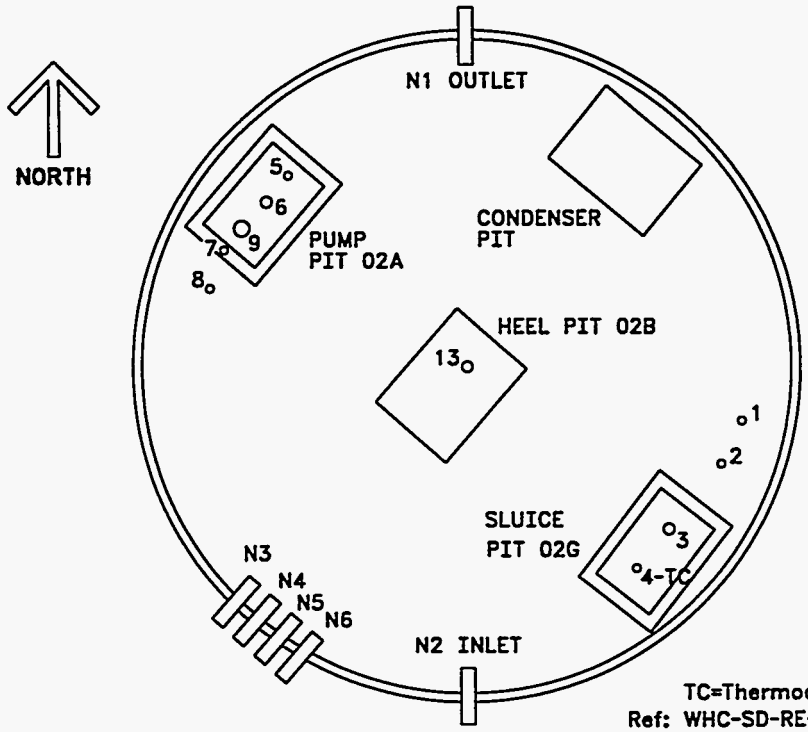


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-102		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	FIC
2	12"	BG
3	12"	SMP WC
4	4"	TEMPERATURE
5	4"	(RECIRCULATING DIP LEG) WC
6	12"	(SLUICING NOZZLE) WC
7	12"	FLANGE/INSTALL B-222 OBSV PORT
8	4"	BREATHER FILTER, G1 HOUSING
9	42"	MH
13	12"	(HEEL JET) WC

241-B-102

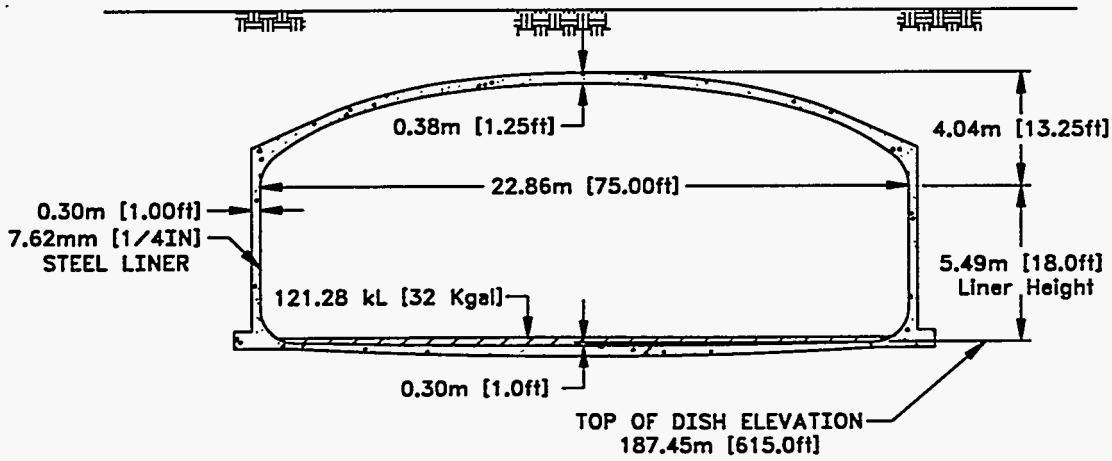
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73280, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 199m [652.8ft]



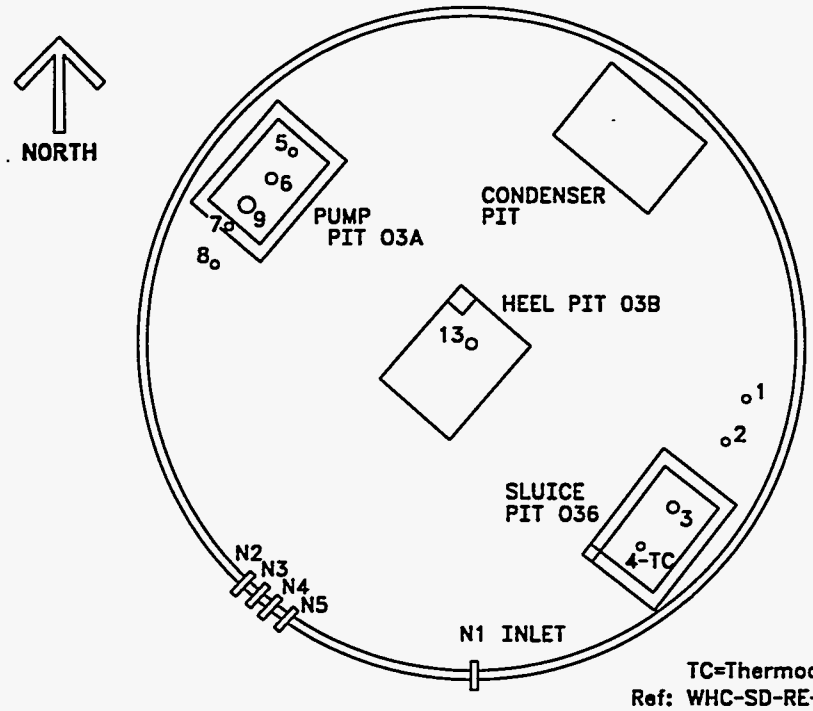
Ref: Blue Print File
Number 73550
Drawing 2

Merrick Maps of
200 Area's 89210406

241-B-103		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	FIC
2	12"	FLANGE/B-222 OBSV PORT
3	12"	(SLUICING RISER) WC
4	4"	TEMPERATURE
5	4"	(DIP LEG) WC
6	12"	(SLUICING RISER) WC
7	12"	FLANGE WC
8	4"	BREATHER FILTER, G1 HOUSING
9	42"	(SLUDGE PUMP) WC
13	12"	SALTWELL SCREEN WC

241-B-103

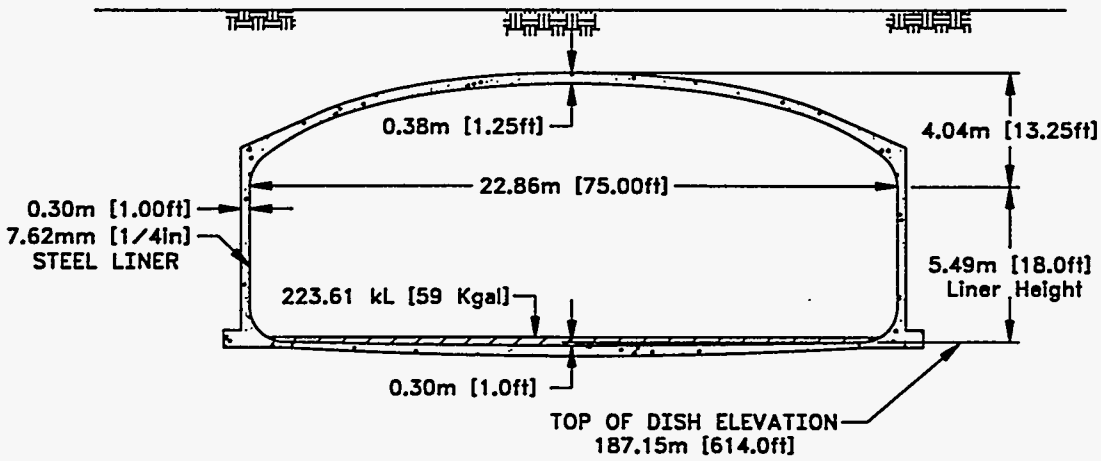
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73281, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [651.2ft]

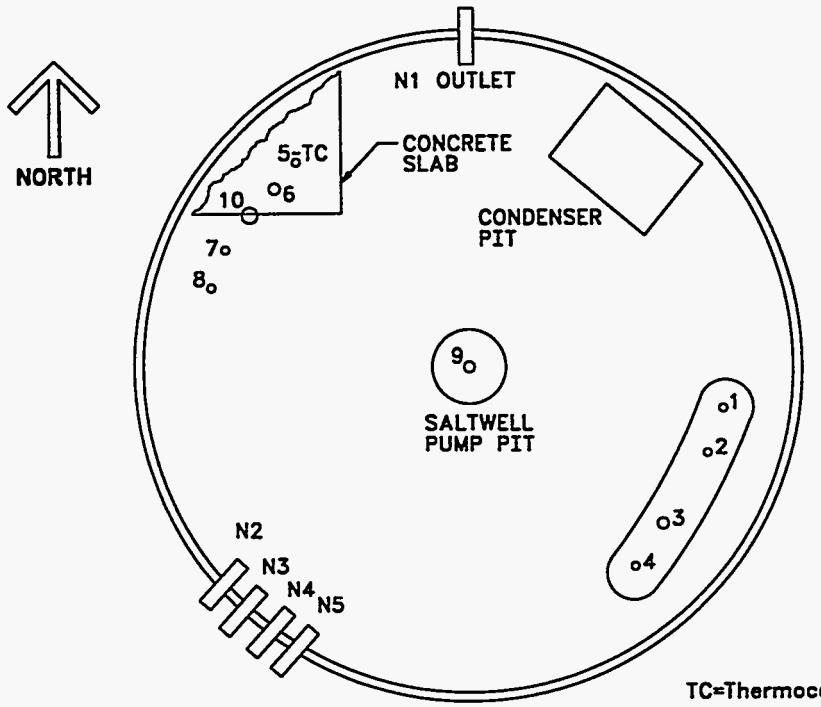


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-104		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	BG
2	12"	FLANGE WITH BALE, BM
3	12"	FLANGE
4	4"	BG
5	4"	TEMPERATURE PROBE, BM
6	12"	B-436 LOW
7	12"	BREATHER FILTER, G1 HOUSING OBSV PORT
8	4"	LIQUID LEVEL REEL
9	12"	SALTWELL SCREEN & PUMP WC
10	42"	BG, MH

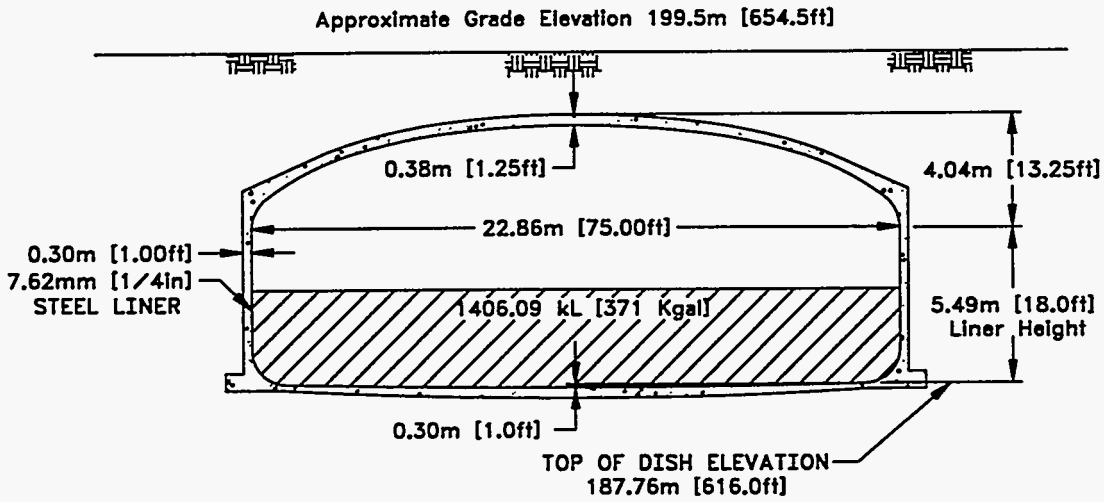
241-B-104

2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73282, Rev. 2

TANK RISER LOCATION

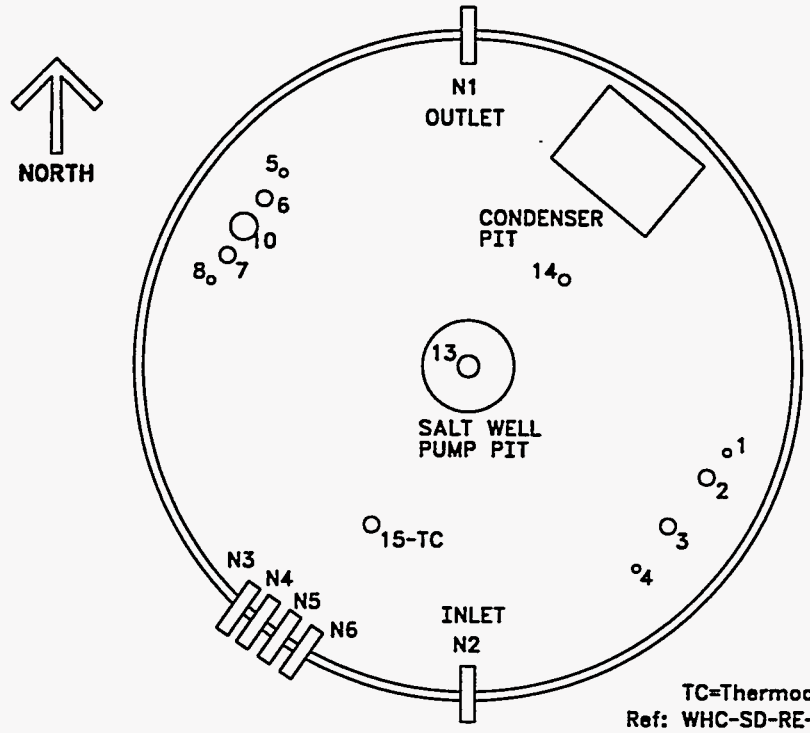


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-105		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	IN CAISSON
2	12"	PUMP/LEAVE AS IS FLANGE ONLY SHOWS
3	12"	FLANGE
4	4"	IN CAISSON
5	4"	B-436 LOW
6	12"	FLANGE
7	12"	FLANGE/B-222 OBSV PORT
8	4"	BREATHER FILTER, G1 HOUSING
10	42"	BG, MH
13	12"	SALTWELL SCREEN WC
14	4"	LIQUID LEVEL, BM
15	4"	TEMPERATURE

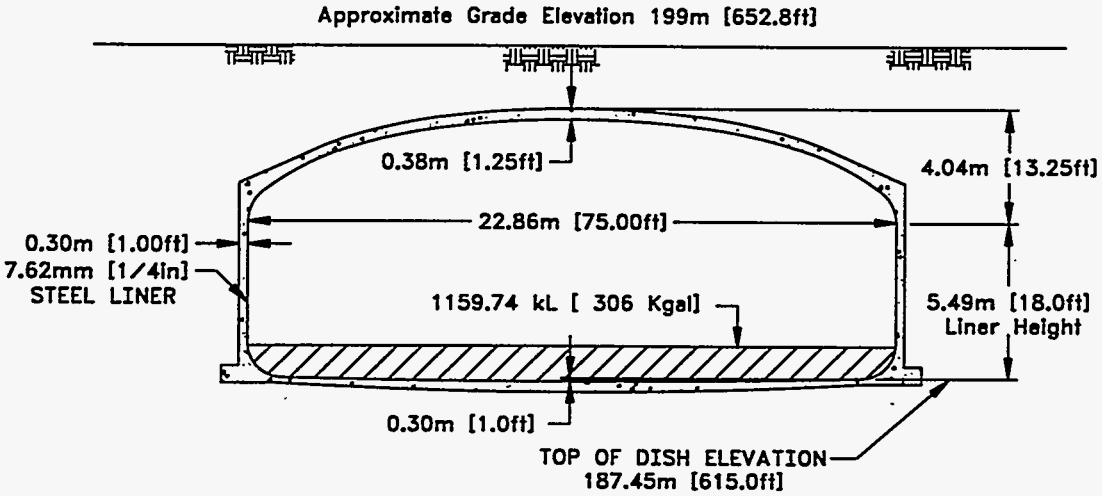
241-B-105

2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73283, Rev. 2

TANK RISER LOCATION

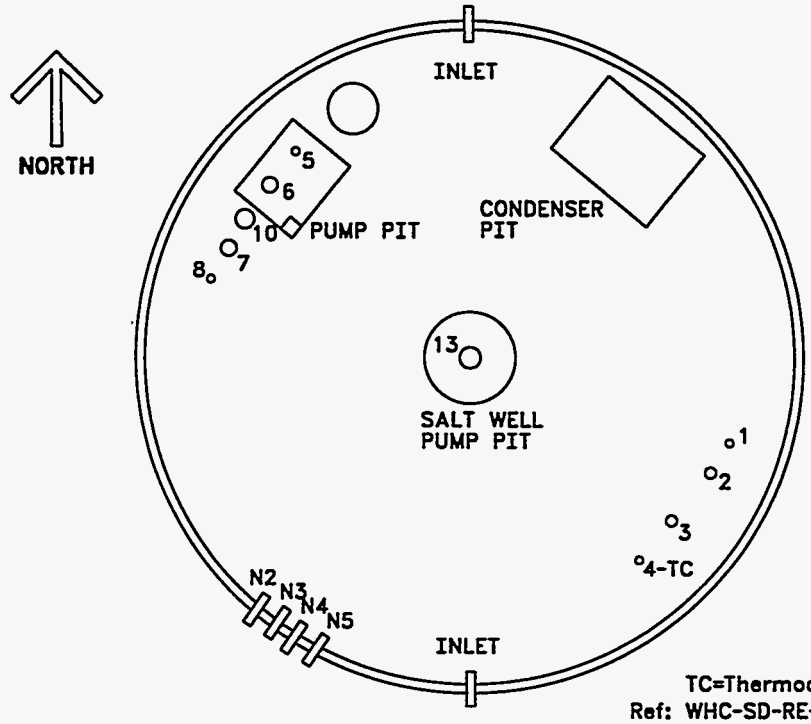


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-106		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	FIC
2	12"	BLIND FLANGE
3	12"	B-222 OBSV PORT
4	4"	TEMPERATURE PROBE
5	4"	WC
6	12"	TRANSFER PUMP WC
7	12"	FLANGE, BM
8	4"	BREATHER FILTER, G1 HOUSING
10	42"	BG, MH
13	12"	SALTWELL SCREEN & PUMP WC

241-B-106

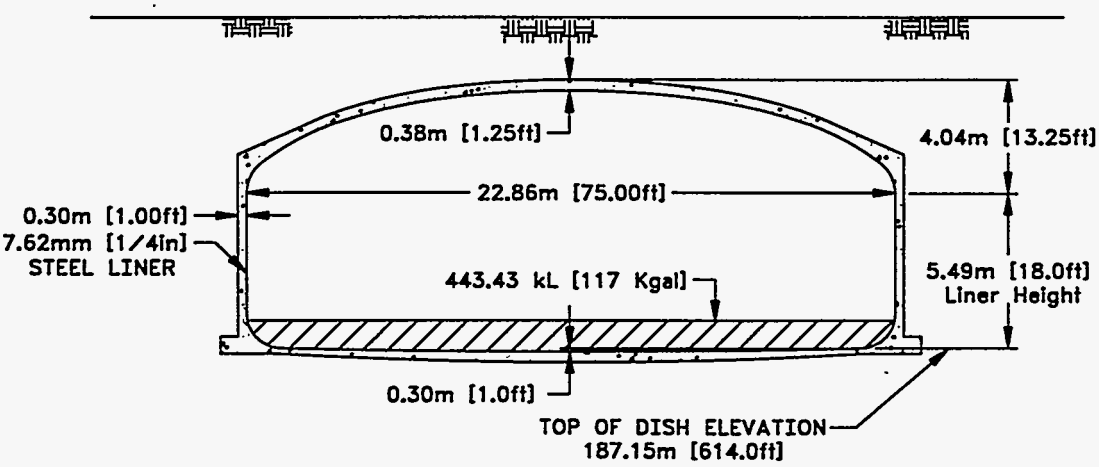
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73284, Rev. 2.

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [651.2ft]



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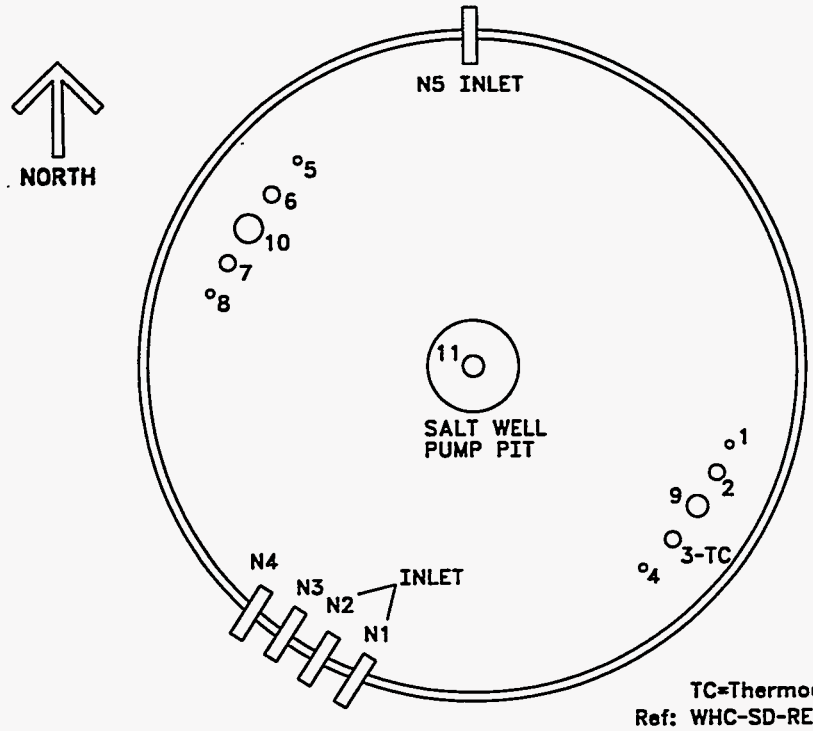
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-107		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	WEATHER COVERED
2	12"	FLANGE/B-222 OBSV PORT
3	12"	TEMPERATURE PROBE
4	4"	BREATHER FILTER, BM
5	4"	FLANGE
6	12"	FLANGE, SMP
7	4"	FLANGE WITH BALE
8	4"	LIQUID LEVEL REEL/REMAIN IN SERVICE, BM
9	42"	BG, MH
10	42"	BG, MH
11	12"	SALTWELL SCREEN WC

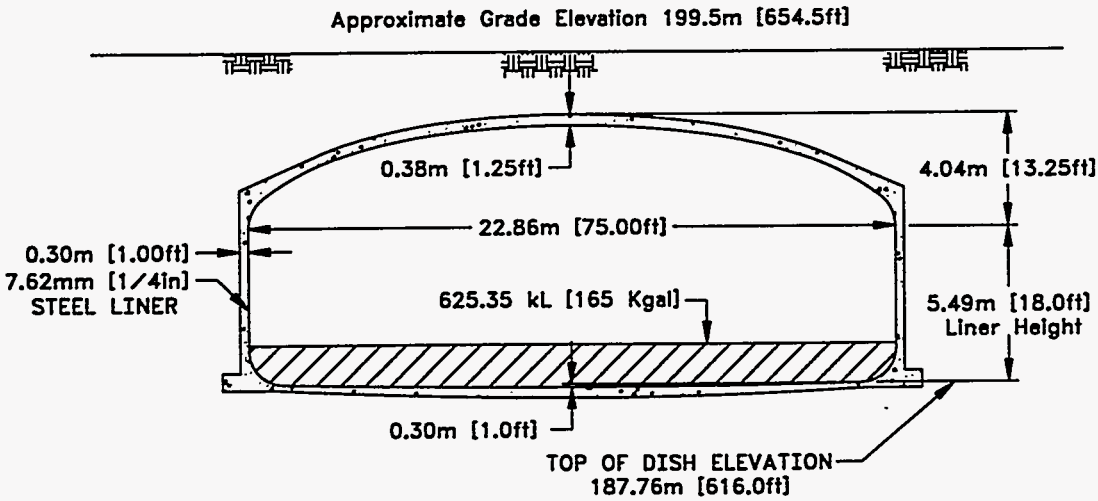
241-B-107

2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73278, Rev. 4

TANK RISER LOCATION

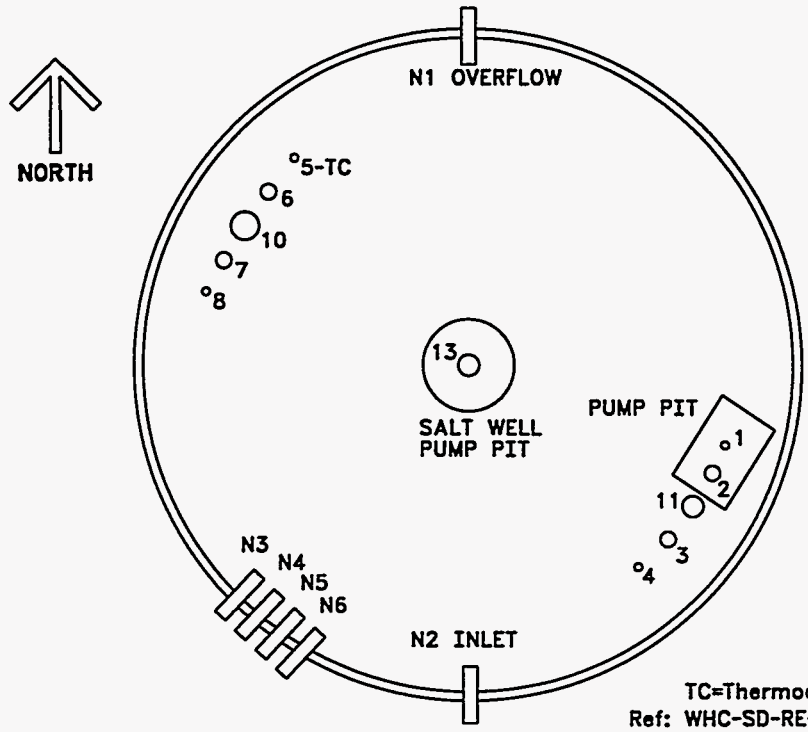


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-108		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	(TANK FILL) WC
2	12"	(PUMP) WC
3	12"	FLANGE, BM
4	4"	BREATHER FILTER, G1 HOUSING
5	4"	TEMPERATURE PROBE, BM
6	12"	FLANGE
7	12"	B-222 OBSV PORT
8	4"	FIC
10	42"	BG, MH
11	42"	BG, MH
13	12"	(SALTWELL SCREEN) WC

241-B-108

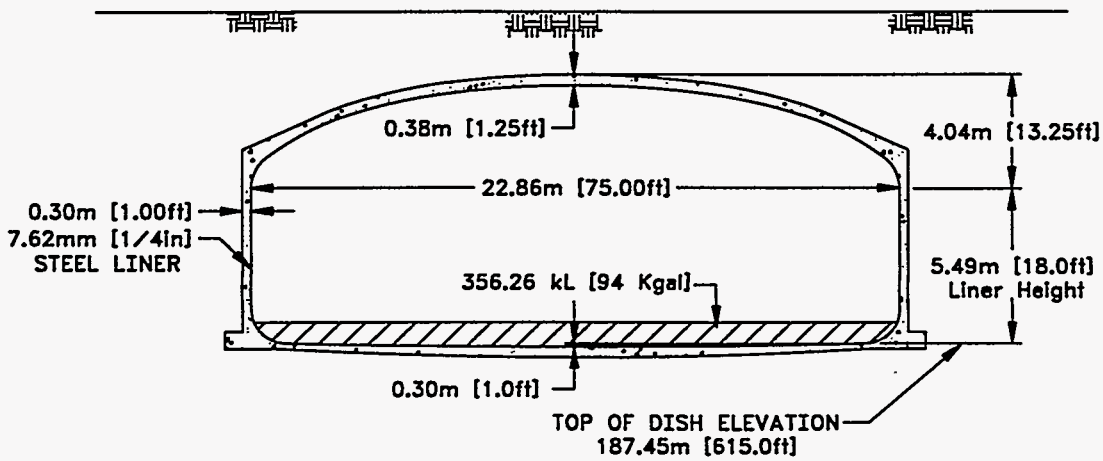
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73285, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 199m [652.8ft]

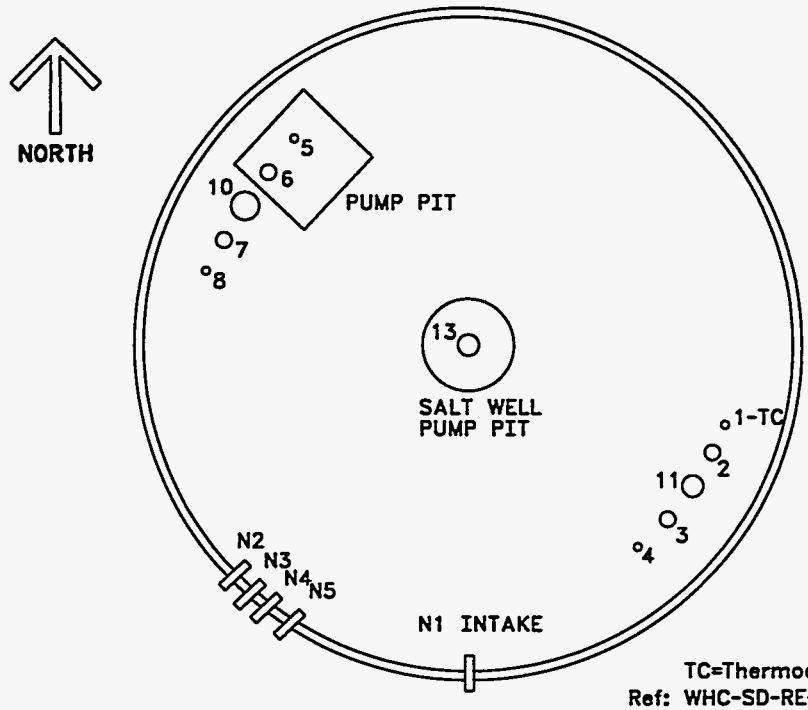


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-109		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	TEMPERATURE PROBE, BM
2	12"	FLANGE/B-222 OBSV PORT
3	12"	LIQUID LEVEL REEL
4	4"	BREATHER FILTER, G1 HOUSING
5	4"	(TANK FILL) WC
6	12"	(PUMP) WC
7	12"	FLANGE
8	4"	BG
10	42"	BG, MH
11	42"	BG, MH
13	12"	(SALTWELL SCREEN) WC

241-B-109

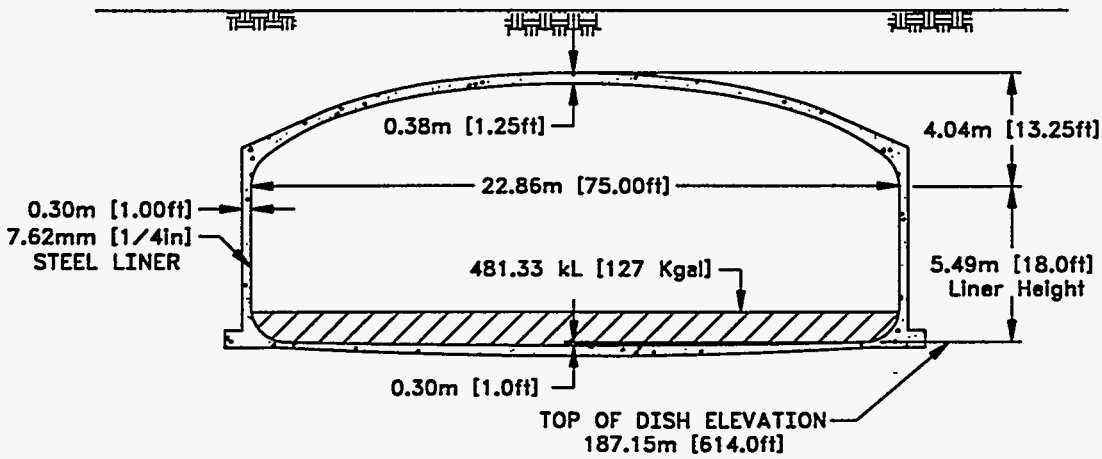
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73286, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [651.2ft]

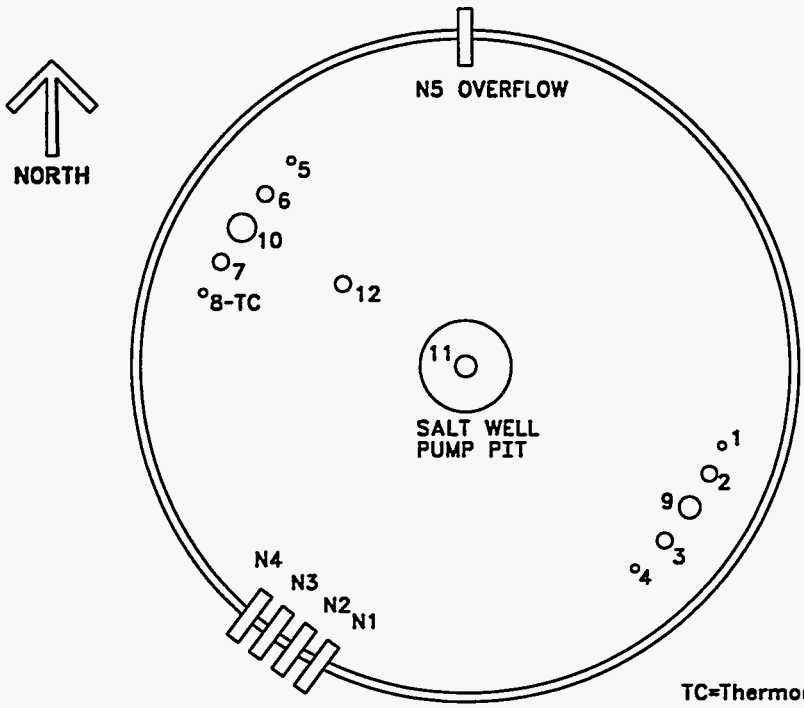


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-110		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	BREATHER FILTER
2	12"	BG, CAPPED LLW DIP TUBES
3	12"	FLANGE
4	4"	FLANGE
5	4"	LIQUID LEVEL REEL, BM
6	12"	FLANGE
7	12"	B-222 OBSV PORT
8	4"	TEMPERATURE PROBE
9	42"	BG, MH
10	42"	BG, MH
11	12"	(SALTWELL SCREEN) WC
12	4"	BG, CAPPED LLW DIP TUBES

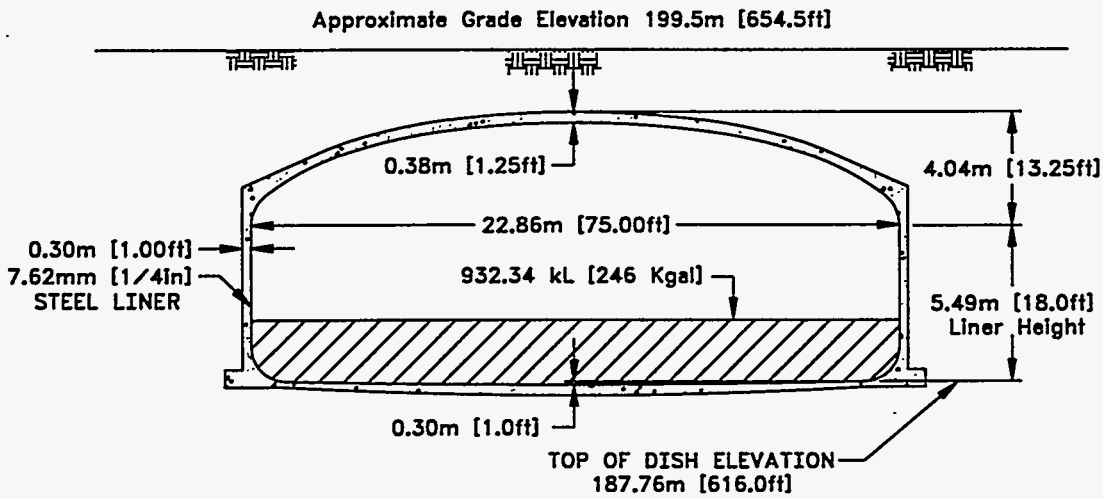
241-B-110

2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73279, Rev. 4

TANK RISER LOCATION

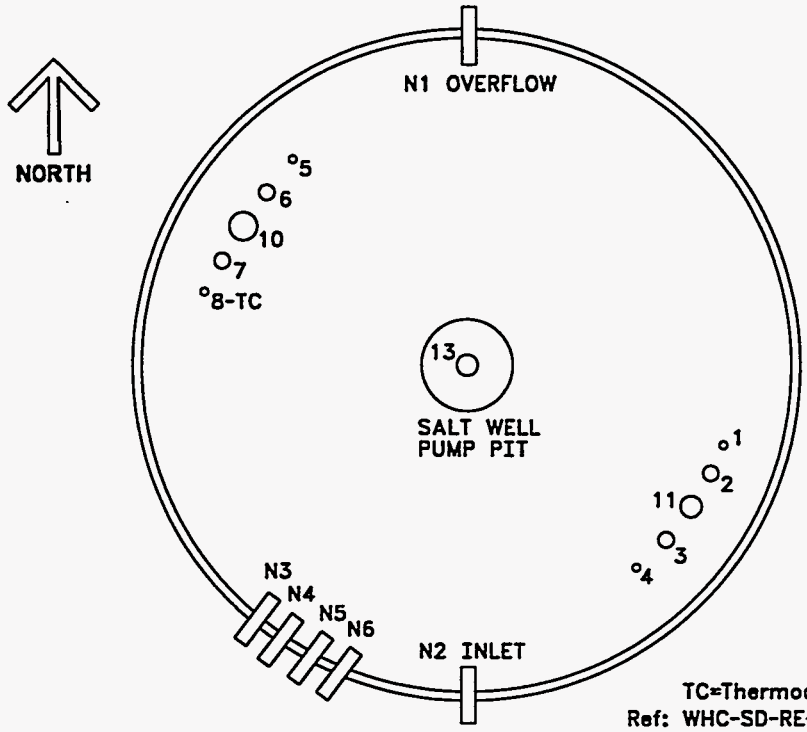


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-111		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	FIC, BM
2	12"	DIP TUBES CUT OFF & FLAANGED
3	12"	FLANGE/B-222 OBSV PORT
4	4"	FLANGE
5	4"	BREATHER FILTER, G1 HOUSING
6	12"	FLANGE WITH LEAD
7	12"	DIP TUBES
8	4"	TEMPERATURE PROBE, BM
10	42"	BG, MH
11	42"	BG, MH
13	12"	(SALTWELL RISER) WC

241-B-111

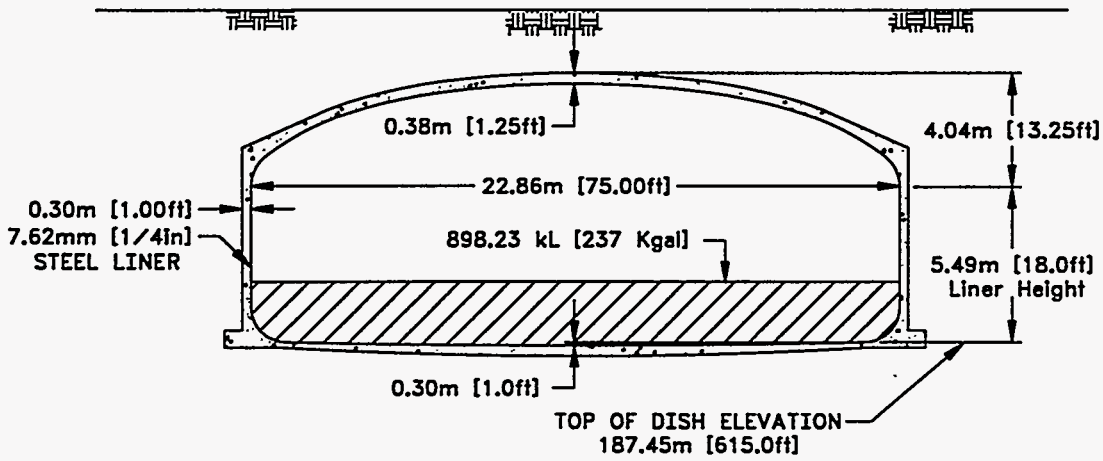
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73287, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 199m [652.8ft]

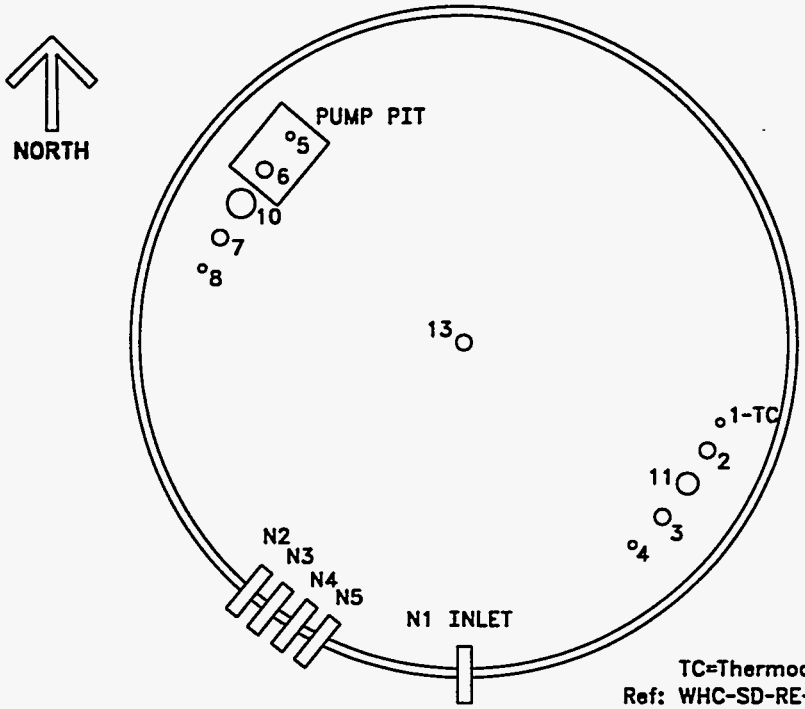


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-112		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	TC, BM
2	12"	BLIND FLANGE
3	12"	FLANGE/B-222 OBSV PORT
4	4"	FIC
5	4"	(TANK INLET) WC
6	12"	(PUMP) WC
7	12"	FLANGE
8	4"	BREATHER FILTER, G1 HOUSING
10	42"	BG, MH
11	42"	BG, MH
13	12"	NF

241-B-112

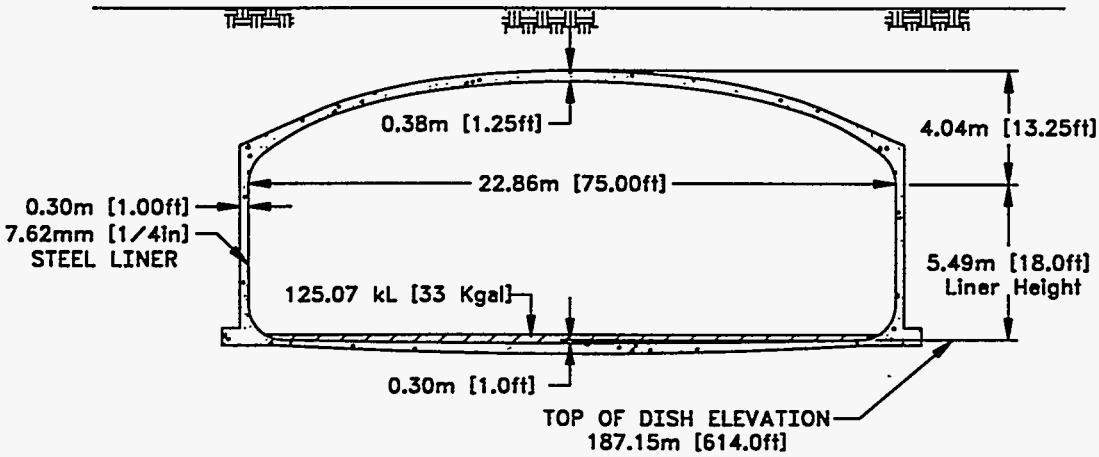
2,008,700 Liters
[530,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73288, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 198.5M [651.2ft]

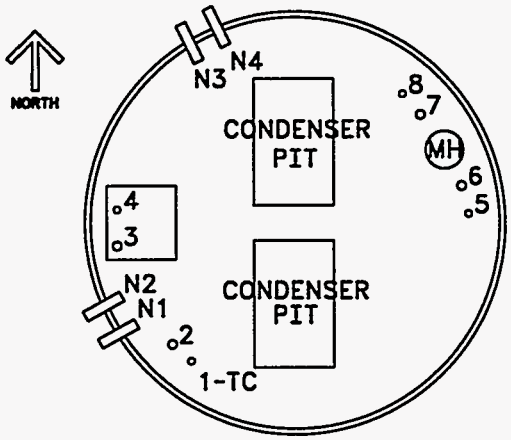


Ref: Blue Print File
Number 73550
Drawing 2
Merrick Maps of
200 Area's 89210406

241-B-201		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	THERMOCOUPLE
2	12"	FLANGE/OBSV PORT
3	12"	(SALTWELL SCREEN) WC
4	4"	(PIT DRAIN) WC
5	4"	FLANGE, PRESSURE GAUGE
6	12"	BREATHER FILTER
7	12"	FLANGE
8	4"	LIQUID LEVEL REEL

241-B-201

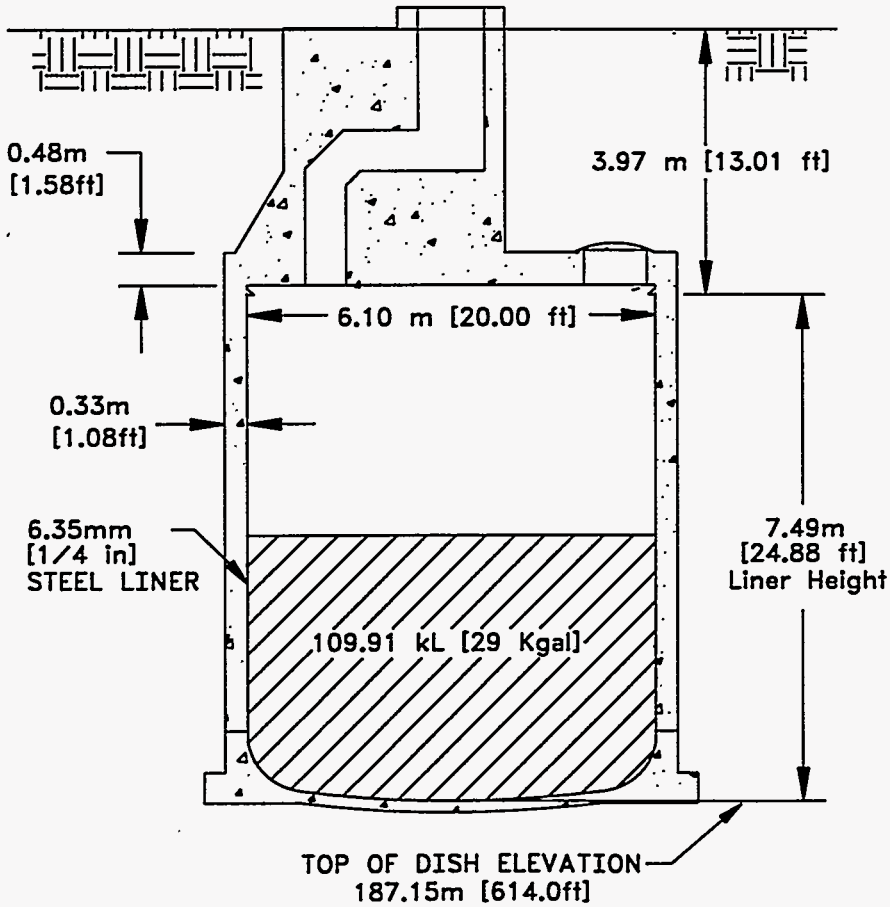
208,450 Liters
[55,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73275, Rev. 3

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [649.6ft]

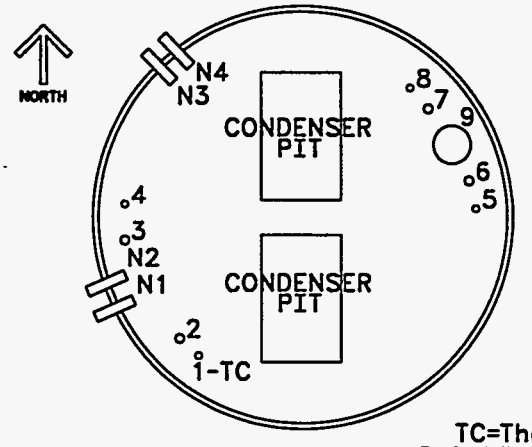


Ref: Blue Print File
Number 73550
Drawing 20
Merrick Maps of
200 Area's 89210406

241-B-202		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	THERMOCOUPLE
2	12"	FLANGE/OBSV PORT
3	12"	FLANGE
4	4"	BREATHER FILTER, G1 HOUSING
5	4"	FLANGE
6	12"	FLANGE
7	12"	DIP TUBES FLANGE
8	4"	LIQUID LEVEL
9	42"	BG, MH

241-B-202

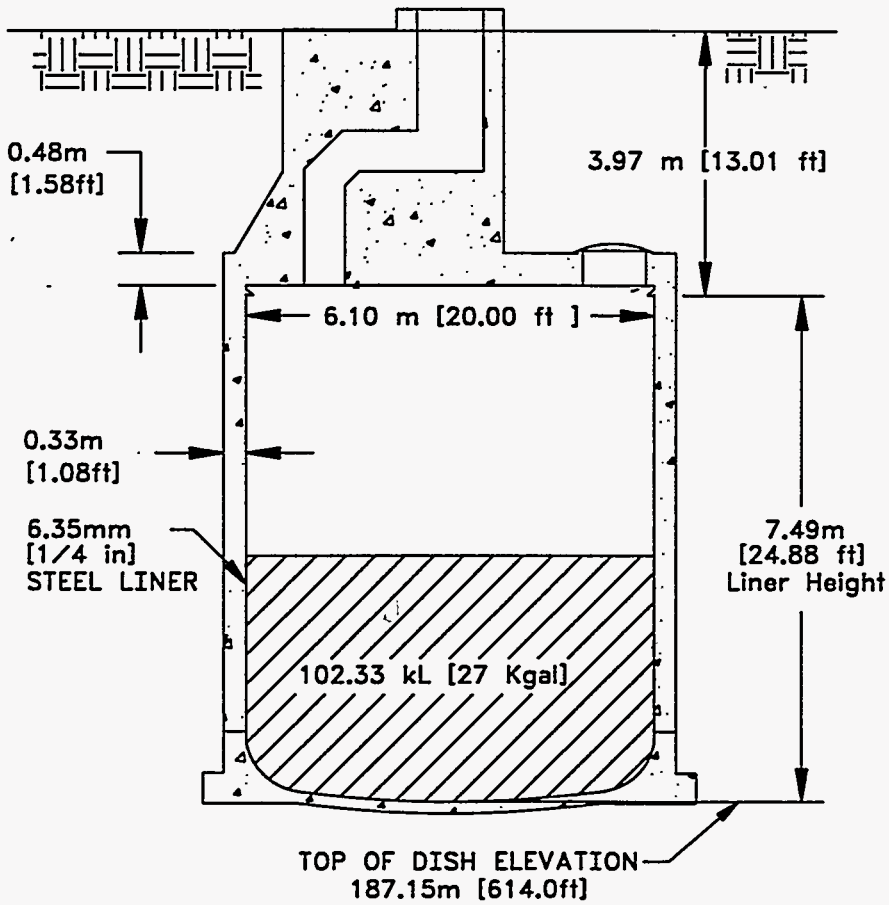
208,450 Liters
[55,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73298, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [649.6ft]

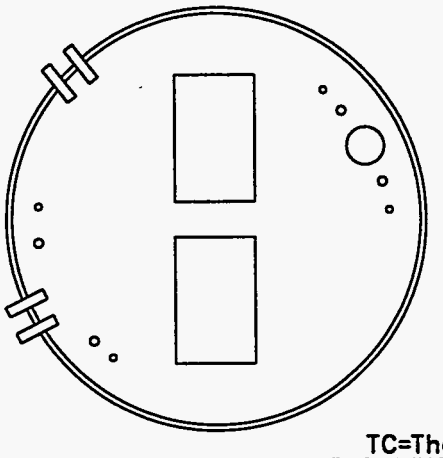


Ref: Blue Print File
Number 73550
Drawing 20
Merrick Maps of
200 Area's 89210406

241-B-203		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	THERMOCOUPLE
2	12"	FLANGE/OBSV PORT
3	12"	FLANGE
4	4"	BREATHER FILTER, G1 HOUSING
5	4"	FLANGE
6	12"	FLANGE
7	12"	DIP TUBES FLANGE
8	4"	LIQUID LEVEL
9	42"	BG, MH

241-B-203

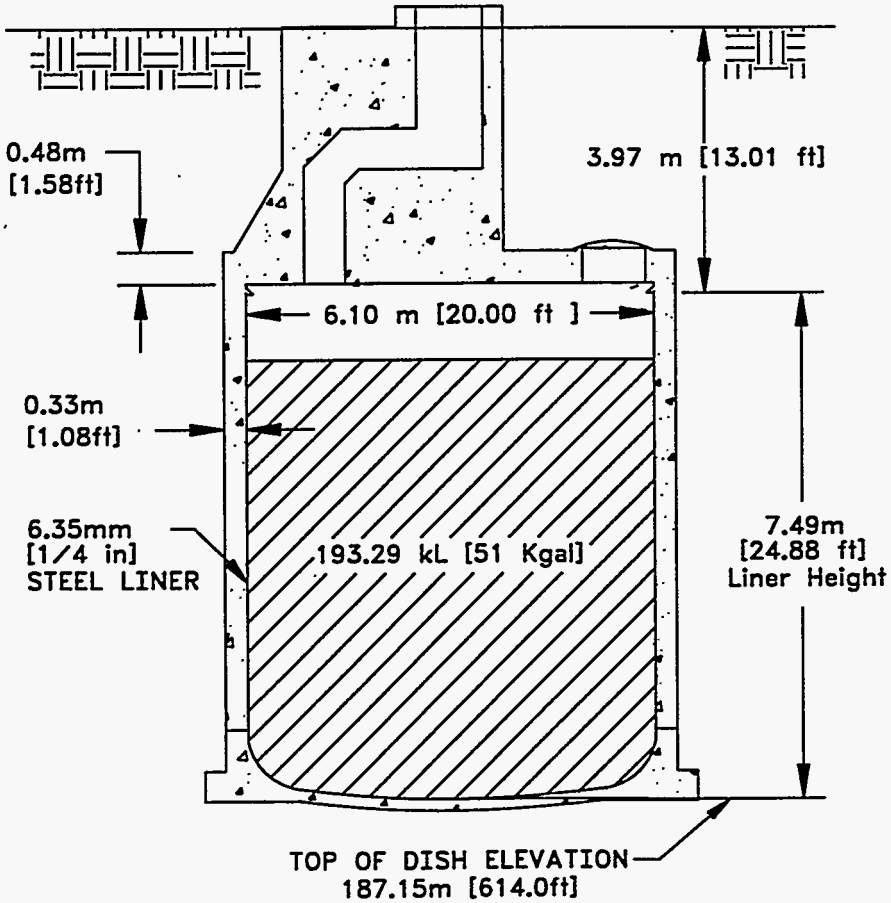
208,450 Liters
[55,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73290, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [649.6ft]

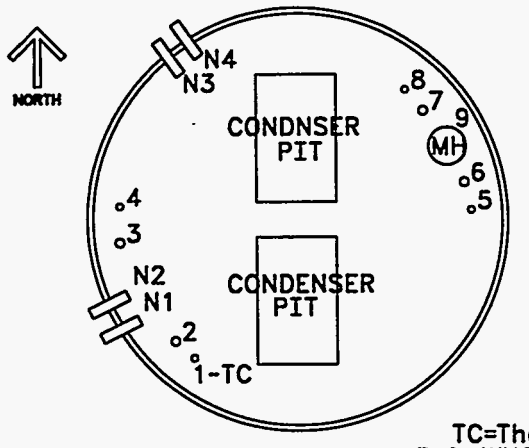


Ref: Blue Print File
Number 73550
Drawing 20
Merrick Maps of
200 Area's 89210406

241-B-204		
NO.	DIA.	DESCRIPTION AND COMMENTS
1	4"	THERMOCOUPLE
2	12"	FLANGE/OBSV PORT
3	12"	SALTWELL
4	4"	BREATHER FILTER, G1 HOUSING
5	4"	FLANGE
6	12"	FLANGE
7	12"	DIP TUBES FLANGE
8	4"	LIQUID LEVEL
9	42"	BG, MH

241-B-204

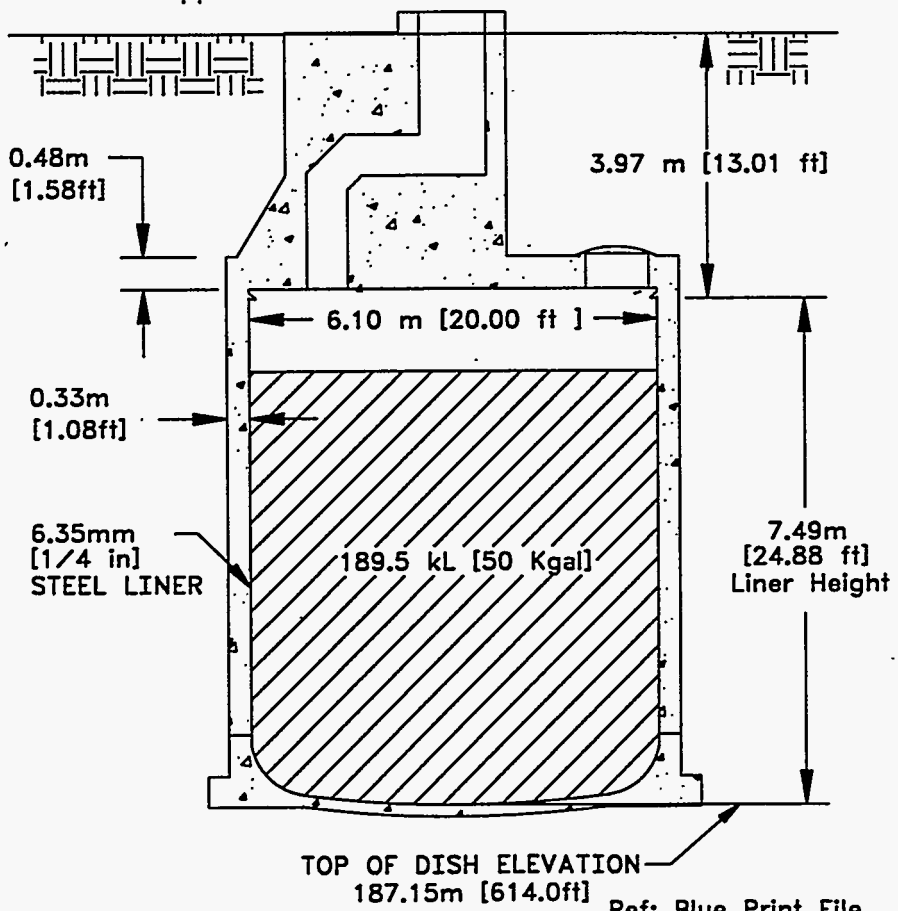
208,450 Liters
[55,000 Gallons]



TC=Thermocouple
Ref: WHC-SD-RE-TI-053, Rev. 8
WHC-SD-WM-TI-553, Rev. 0
H-2-73298, Rev. 2

TANK RISER LOCATION

Approximate Grade Elevation 198.5m [649.6ft]



Ref: Blue Print File
Number 73550
Drawing 20
Merrick Maps of
200 Area's 89210406

Waste Tank 101-B		
Analysis of "As Received" 101-B Tank Sludge		
February 24 ,1976		
Received: January 5, 1976		
COMPONENT	LAB VALUE	LAB UNIT
Physical Data		
Visible: Soft like mud and dark brown in color		
Bulk Density	1.59	g/cc
%H2O	20.1	%
Chemical Analysis		
AL	4.95	moles/l
Fe	1.3	moles/l
NO3	22.1	moles/l
PO4	1.7	moles/l
Mg	0.05	moles/l
Mn	0.13	moles/l
Si	0.05	moles/l
Ba	< 0.05	moles/l
Ca	< 0.24	moles/l
Pu	1.88E-02	g/l
Radiological Analysis		
Sr 89+ 90	2.5	Ci/l
Cs 137	0.67	Ci/l

Waste Tank 102-B			
ANALYSIS OF SAMPLE FROM TANK 102- B			
June 29, 1973			
COMPONENT	LAB VALUE	WEIGHT %	LAB UNIT
Chemical Analysis			
NaAlO2	0.01M	0.01	%
NaNO2	0.42M	2.3	%
NaNO3	3.78M	23.7	%
NaOH	0.24M	0.8	%
Na2SO4	0.38M	4.3	%
Na3PO4	0.24M	3.2	%
Na2CO3	0.23M	2.0	%
H2O		62.6	%
Total		1.01	%

Waste Tank 102-B		
ANALYSIS OF TANK FARM SAMPLES		
October 24, 1975		
Sample: T-4887		
COMPONENT	LAB VALUE	LAB UNITS
Physical Data		
Vis-OTR: Yellow, cloudy, < 5% organic 200 mrad/hr		
pH	9.95	
SpG	1.138	
%H2O	81.71%	
Chemical Analysis		
OH	5.16E-02	M
Al	1.09E-03	M
Na	2.80	M
NO2	0.361	M
NO3	1.84	M
SO4	Cancelled	M
PO4	8.22E-02	M
Cl	3.25E-02	M
F	1.099E-02	M
CO3	8.41E-02	M
Pu	1.31E-04	g/gal
Radiological Analysis		
89,90 Sr	1.96E+ 04	uCi/gal
GEA: 134 Cs	3.28E+ 02	uCi/gal
GEA: 137 Cs	1.51E+ 05	uCi/gal

Waste Tank 103-B		
Analysis Of Tank Farm Samples		
Received: October 20, 1975		
Sample T - 7809		
COMPONENT	LAB VALUE	LAB UNIT
Physical Data		
Vis-OTR: Yellow , No solids , 300 mrad/hr		
pH	12.4	
SpG	1.1253	
Water	91.61	%
Chemical Analysis		
OH	0.128	M
Al	3.72E-02	M
Na	2.28	M
NO2	0.350	M
NO3	1.22	M
Pu	2.23E-04	g/gal
SO4	Cancelled	
PO4	0.104	M
Cl	3.36E-02	M
F	1.78E-03	M
CO3	0.211	M
Radiological Analysis		
GEA Cs 134	1.04E+ 03	uCi/gal
GEA Cs 137	1.86E+ 05	uCi/gal
Sr 89,90	4.85E+ 02	uCi/gal

Waste Tank 103-B		
ANALYSIS OF TANK FARM SAMPLES		
October 24, 1975		
Received by: May 9, 1975		
Sample T-4298		
COMPONENT	LAB VALUE	LAB UNIT
Physical Data		
Vis-OTR: Clear, Yellow No Solids 350 mrad/hr		
pH	12.0	
SpG	1.117	
% Water	85.34	%
Chemical Analysis		
OH	0.132	M
Al	4.54E-02	M
Na	2.47	M
NO2	0.332	M
NO3	1.06	M
SO4	Cancelled	
PO4	0.133	M
CO3	0.18	M
F	6.99E-03	M
Pu	7.02E-05	g/gal
Radiological Analysis		
Sr 89,90	4.40E+ 02	uCi/gal
GEA RuRh 106	1.91E+ 04	uCi/gal
GEA Cs 134	5.75E+ 02	uCi/gal
GEA Cs 137	1.64E+ 05	uCi/gal

Waste Tank 105-B		
ANALYSIS OF 105-B TANK		
June 9, 1976		
Received: January 16, 1976		
COMPONENT	LAB VALUE	LAB UNIT
Physical Data		
%H2O	45.7	%
Bulk Density	1.1	g/cc
Chemical Analysis		
Al2O3	0.3	%
FeOOH	0.8	%
NaNO2	0.1	%
NaNO3	28.1	%
Na2CO3	0.3	%
Na3PO4	17.3	%
Na2SO4	2.5	%
Mg	1.0	%
Mn	1.0	%
Radiological Analysis		
Pu	2.24E-07	u Ci/g
Sr 89+ 90	5.9	u Ci/g
Cs 137	0.64	u Ci/g
X-Ray Diffraction For 105-B Tank		
Compounds possibly present		
CaAl2 (Si2Al2)O10 (OH)2		
Calcium aluminum silicate hydroxide		
Margarite		
Fe3 (OH)3 (PO4)2 2 1/2 H2O		
Beraunite		
K2 Na Al3 Si9 O24 7H20		
Potassium sodium aluminum silicate		
Hydrate zeolite and less likely		
(NH4)2 FeP2O7-H2O		
Ammonium iron phosphate hydrate		
An elemental of this sample shows		
Fe, Ca, K, Al, S, and Ti to be present		

Waste Tank 106-B		
ANALYSIS OF TANK FARM SAMPLES		
December 1, 1975		
Received: October 6, 1975		
Sample: T-8577		
COMPONENT	LAB VALUE	LAB UNITS
Physical Data		
Vis-OTR:	Yellow, no solids, 200 mrad/hr	
pH	9.50	
SpG	1.227	
%H2O	72.77	%
Chemical Analysis		
OH	0.031	M
Al	< 4.37E-04	M
Na	4.00	M
NO2	0.187	M
NO3	3.00	M
SO4	Cancelled	M
PO4	9.51E-02	M
Cl	5.57E-02	M
F	9.790E-03	M
CO3	0.133	M
Pu	5.30E-05	g/gal
Radiological Analysis		
89,90 Sr	1.37E+ 04	uCi/gal
GEA: 134 Cs	4.37E+ 02	uCi/gal
GEA: 137 Cs	1.86E+ 05	uCi/gal

Waste Tank B-107		
Analysis of 107-B Tank Sludge		
April 8, 1976		
Received: January 19,1976		
Component	Lab Value	Lab Unit
Physical Data		
Visible: Yellowish brown, very soft, with crystal like chunks throughout		
Bulk Density	1.64	g/cc
Particle Density	2.04	g/cc
H2O	32.9	%
Chemical Analysis		
Al203	8.9	%
FeOOH	3.3	%
NaNO2	0.4	%
NaNO3	14.3	%
Na2CO3	2.5	%
Na3PO4	20	%
Na2SO4	10.7	%
Mg	< 1.0	%
Mn	< 1.0	%
Radiological Analysis		
Pu	2.73E-06	g/g
89+ 90 Sr	12.9	uCi/g
137 Cs	3.2	uCi/g
125 Sb	5.3	uCi/g
106RuRH	2.3	uCi/g
144 Ce	1.5	uCi/g
154 Eu	0.4	uCi/g
155 Eu	1.3	uCi/g

Waste Tank 109-B		
ANALYSIS OF TANK FARM SAMPLES		
November 12, 1975		
Received: October 6, 1975		
Sample: T-8578		
COMPONENT	LAB VALUE	LAB UNITS
Physical Data		
Yellow, no solids, 700 mrad/hr		
pH	12.50	
SpG	1.282	
H2O	79.62	%
Chemical Analysis		
OH	1.29	M
Al	0.667	M
Na	4.77	M
NO2	1.14	M
NO3	2.48	M
SO4	Cancelled	M
PO4	2.09E-02	M
Cl	6.26E-02	M
F	2.440E-04	M
CO3	3.17E-04	M
Radiological Analysis		
Pu	1.10E-05	gm/gal
89,90 Sr	2.18E-01	uCi/gal
GEA: 134 Cs	3.60E+ 03	uCi/gal
GEA: 137 Cs	6.39E+ 05	uCi/gal

Waste Tank 201-B			
ANALYSIS OF 201-B TANK			
December 4, 1978			
SAMPLE #: 1898			
COMPONENTS	WATER SOLUBLE	ACID (FUSION)	LAB UNIT
Physical Data			
Visible: Black in color, with a consistency of soft grease			
Water Solubility	23.0		%
Bulk Density	1.37		g/cc
H2O	72.2		%
Chemical Analysis			
Al*	0.005	1.0	%
Bi3+	< 0.005	3.8	%
CO3 (2-)	3.30		%
CrO4 -	0.05		%
Cl-	0.01		%
F-	NR		%
Fe*	< 0.0002	1.8	%
Hg*	0.05		%
K+	0.3		%
La (3+)	< 0.003	1.3	%
Mn*	< 0.003		%
Ni (2+)	NR	0.1	%
NO2-	0.004		%
NO3-	3.3		%
Na+	2.8		%
OH-	0.6		%
PO4 (3-)	0.05	1.1	%
SO4 (2-)	< 0.1	< 0.6	%
SiO2 (2-)	0.05	0.3	%
Radiological Analysis			
U*	7.41E-06	1.05E-05	g/g
Pu*	< 1.29E-10	5.00E-05	g/g
Am*	5.69E-12	1.33E-09	g/g
89+ 90Sr (2+)	2.10E-03	2.7	uci/g
137Cs+	5.00E-02	0.059	uci/g
155Eu*		0.028	uci/g
Ce		0.016	uci/g
* All oxidation states			
NR -- Analysis not requested			

Waste Tank 202-B		
ANALYSIS OF TANK FARM SAMPLES		
December 10, 1975		
SAMPLE T-8579 RECEIVED: October 6, 1975		
ANALYSIS	CONCENTRATION	LAB UNIT
Physical Data		
Vis-OTR: Clear, no solids, 5 mrad.		
pH	9.5	
SpG	1.018	
H2O	97.53	%
Chemical Analysis		
OH	0.032	M
Al	< 4.63E-04	M
Na	1.65	M
NO2	< 1E-03	M
NO3	0.23	M
SO4	Cancelled	
PO4	1.10E-03	M
Cl	1.53E-02	M
F	3.19E-02	M
CO3	5.64E-02	M
Radiological Analysis		
GEA 137 Cs	9.71	uCi/gal
89,90 Sr	3.596	uCi/gal
Pu	3.78E-06	gm/gal

Waste Tank 202-B			
December 4, 1978			
Characterization of 200 Series Tanks			
SAMPLE# 2509			
COMPONENT	WATER SOLUBLE	ACID (FUSION)	LAB UNIT
Physical Data			
Visible: Black in color, with a consistency of soft grease			
Water Solubility	40		
Bulk Density	1.25		g/cc
H2O%	71		%
Chemical Analysis			
Al*	< 0.01	0.80	%
Bi (3+)	NR		
CO3 (2-)	40		%
CrO4-	NR		
Cl-	20		%
F-	NR	0.30	%
Fe*	0.003	2.50	%
Hg*	< 0.003		%
K+	0.30		%
La (3+)	NR	1.50	%
Mn*	NR		
Ni (2+)	NR		
NO2-	0.30		
NO3-	3.30		%
Na+	1.90		%
OH-	< 0.1		%
PO4 (3-)	0.01	1.60	%
SO4 (2-)	< 0.1%	< 1.0	%
SiO2 (2-)	0.08%	0.20	%
TOC	0.075	0.033	g/l
Radiological Analysis			
U*	1.09E-05		g/g
Pu*	3.60E-10 g/g	5.50E-06	g/g
Am*	< 4.29E-12 g/g	1.59E-08	g/g
89+ 90 Sr 2+	0.002 uCi/g	1.01E+ 03	uCi/g
137 Cs+	0.016 uCi/g	0.132	uCi/g
155 Eu	NR		
* All oxidation states.			
NR-- Analysis not requested			

Waste Tank 203-B			
ANALYSIS OF 203-B TANK			
December 4,1978			
SAMPLE #: 2782			
COMPONENTS	LAB VALUE		LAB UNIT
	WATER SOLUBLE	ACID (FUSION)	
Physical Data			
Visible: Black in color, with a consistency of soft grease			
Water Solubility	0.24		%
Bulk Density	1.09		g/cc
Percent Water	74.3		%
Chemical Analysis			
Al*	< 0.004	0.03	%
Bi3+	< 0.02	6.60	%
CO3^2-	0.6		
CrO4^-	0.1		
Cl-	0.06		%
F-	NR		
Fe*	0.003	0.01	%
Hg*	< 0.004		%
K+	0.4		%
La3+	0.006		%
Mn*	< 0.001		%
Ni2+	NR		
NO2-	0.03		%
NO3-	0.04	< 0.1	%
Na+	2.7		%
OH-	0.01		%
PO4^3-	0.2	0.7	%
SO4^2-	< 0.2	< 0.2	%
SiO2^2-	0.02	0.1	%
Radiological Analysis			
U*	2.84E-07	1.68E-05	g/g
Pu*	1.10E-09	9.01E-06	g/g
Am*	NR	8.48E-09	g/g
89+90Sr2+	0.001	6.54	uCi/g
137Cs+	0.005	0.004	uCi/g
155 Eu*	NR		
* All oxidation states			
NR -- Analysis not requested			

Waste Tank 203-B			
COMPOSITION OF SOLIDS IN TANK 203B			
December 30, 1982			
COMPONENTS	WATER SOLUBLE	ACID - SOLUBLE *	LAB UNIT
Physical Data			
Visible: Black in color, with a consistency of soft grease			
Composition: 60-75% water			
Chemical Analysis			
Ba	1.74E-03	2.63	%
Fe	0.04	3.68	%
Mn	0.01	1.03	%
Hg	1.37	1.38	%
Al	0.02	3.29	%
Cr	0.01	0.22	%
Ni	**	0.03	%
Zn	4.27E-04	0.03	%
Na	0.8	10.04	%
Ca	0.01	5.80	%
K	0.25	0.91	%
Pb	**	0.13	%
Zr	**	0.04	%
Cd	**	**	%
La	4.60E-03	0.81	%
Sn	**	2.47	%
P	0.03	0.73	%
Bi	0.02	3.10	%
Mg	4.60E-03	3.20	%
NO2	0.42	0.25	%
NO3	14.60	--	%
Radiological Analysis			
Sr (total)	7.22E-04	0.09	%
Sr 90	7.56E-06	**	%
U	0.01	0.03	%
Pu	1.17E-04	**	%
** Below detection limits			

Waste Tank 203-B			
COMPOSITION OF SOLIDS IN TANK 203B (AS WEIGHT PERCENT OF CENTRIFUGED SOLIDS)			
January 7, 1983			
Physical Data			
Visible: Black in color, with a consistency of soft grease			
Composition: * 60-75% water			
COMPONENTS	LAB VALUE		LAB UNIT
	WATER - SOLUBLE*	ACID - SOLUBLE*	
Chemical Analysis			
Ba	0.02	2.90	%
Fe	0.43	3.68	%
Mn	0.06	1.03	%
Hg	1.37	1.38	%
Al	0.19	3.29	%
Cr	0.10	0.27	%
Ni	**	0.03	%
Zn	4.7E-03	0.03	%
Na	8.8	17.55	%
Ca	0.12	5.80	%
K	2.80	1.32	%
Pb	**	0.13	%
Zr	**	0.06	%
Cd	**	**	%
La	0.05	1.16	%
Sn	**	**	%
P	0.33	0.70	%
Bi	0.20	3.10	%
NO2	0.42	0.25	%
NO3	14.60	–	%
Mg	0.05	3.91	%
Radiological Analysis			
Sr (total)	0.01	0.09	%
Sr 90	7.56E-06	**	%
Cs137	3.10E-08	**	%
U	0.01	0.03	%
Pu	1.17E-04	**	%
* 60-75 % water			
** Below detection limits			

Waste Tank 203B		
Radioisotope Content of Solids in Tank 203B (per gram of centrifuged solids)		
January 7, 1983		
ISOTOPE	WATER-SOLUBLE SOLIDS	ACID-SOLUBLE SOLIDS
Physical Data		
Visible: Black in color, with a consistency of soft grease		
Radiological Analysis		
Sr 90	10.74 uCi	2.38 uCi
Cs137	0.03 uCi	*
U	7.29E-05 g	2.87E-04 g
Pu 239/240	1.17E-06 g	*
* Not Detected		

Waste Tank B-204			
Analysis of 204-B Tank			
December 4, 1978			
Sample# 1974			
	LAB VALUE		
Components	Water Soluble	Acid (Fusion)	Lab Units
Physical Data			
VIS-OTR: Black in color, with a consistency of soft grease			
Water Solubility	26		%
Bulk Density	1.14		%
H2O	76		%
TOC	0.096		M
Chemical Analysis			
Al*	0.0008	0.008	%
Bi(3+)	< 0.0006	6.2	%
CO3(2-)	0.3		%
CrO4-	0.08		%
Cl-	0.07		%
F-	NR	0.2	%
Fe*	0.0008	2.9	%
Hg*	0.001		%
K+	0.4		%
La(3+)	0.01	2.0	%
Mn*	0.0001		%
Ni(2+)		0.03	%
NO2-	0.3		%
NO3-	2.8	< 0.07	%
Na+	1.4		%
OH-	0.1		%
PO4(3-)	0.1	1.2	%
SO4(2-)	< 0.05	< 0.1	%
SiO2(2-)	0.004	0.3	%
Radiological Analysis			
U*	4.63E-08	9.71E-06	g/g
Pu*	1.16E-09	9.74E-06	g/g
Am*	NR		
89+ 90 Sr(2+)	0.004	4.00	uCi/g
137 Cs+	0.005	0.007	uCi/g
155 Eu*	NR		
* All oxidation states			
NR--Analysis not requested			

TCRL-3

Date: February 24, 1976

To: W. R. Christensen

From: J. E. Horton - 2-2529
J E Horton

Subject: ANALYSIS OF SLUDGE FROM TANK 101-B

Chemical Technology Laboratory received a sample from Tank 101-B on January 5, 1976. The sample was soft like mud and dark brown in color.

The calculated heat generation rate for the 101-B sludge, based on $^{89+90}Sr$ and ^{137}Cs contents was 2.01×10^{-2} watts/liter.

Sludge analyses were made by fusing 1.2 milliliters of damp "as received" sludge with KOH, dissolving the melt in concentrated HCL, and diluting to 250 milliliters with water. Analyses are shown in Table I. Particle size distribution is shown in Table II.

If you have any questions, please call me.

JEH:ms

Att.

cc: H Babad
JS Buckingham
RG Geier
SS Koegler
DC Lini
WP Metz
RE Van der Cook
RL Walser
RA Watrous
Process Aids (7)
CTL File - 122
File
LB

B101.1

TABLE I

ANALYSIS OF AS RECEIVED 101-B TANK SLUDGE

Bulk Density	1.59 g/cc		
Particle Density	1.35 g/cc		
$\%H_2O$	20.1		
Al	4.95	moles/ℓ	
Fe	1.3	moles/ℓ	
NO_3	22.1	moles/ℓ	
PO_4	1.7	moles/ℓ	
Mg	0.05	moles/ℓ	
Mn	0.13	moles/ℓ	
Si	0.05	moles/ℓ	
Ba	<0.05	moles/ℓ	
Ca	<0.24	moles/ℓ	
Pu	1.88×10^{-2}	g/ℓ	
$^{89+90}Sr$	2.5	Ci/ℓ	1.69×10^{-2} watts/ℓ
^{137}Cs	0.67	Ci/ℓ	3.22×10^{-3} watts/ℓ

TABLE II

PARTICLE SIZE DISTRIBUTION
(By K. J. Patterson)

Particle Size µm	Average Dia/µm	Wt. Percent
5	8.25	99.98
10	16.5	99.6
20	25.9	44.9
30	35.7	24.7
40	45.5	24.4
50	60.4	18.03
70	75.3	9.2
80	85.3	6.2
90	95.3	3.5
100	105.2	1.66

?

T-R1-4

102 B

B 102.2

Date: June 29, 1973

To: W. P. Metz

From: J. E. Horton
J. S. Buckingham

ORIGINAL SIGNED BY
J. S. BUCKINGHAM

Subject: ANALYSIS OF SAMPLE FROM TANK 102B

The analysis of the supernatant liquid from Tank 102B is shown below.

TANK 102B

d	1.249	
$NaAlO_2$	0.01M	0.1%
$NaNO_2$	0.42M	2.3%
$NaNO_3$	3.78M	23.7%
NaOH	0.24M	0.8%
Na_2SO_4	0.38M	4.3%
Na_3PO_4	0.24M	3.2%
Na_2CO_3	0.23M	2.0%
H_2O		62.6%
		101.0

Please call us if you have any questions regarding this work.

JSB:JEHmm

cc: MM Campbell
JE Horton
DJ Larkin
File
LL
Process Aids (5)

Atlantic Richfield Hanford Company

Date: October 24, 1975

To: R. L. Walser

From: R. E. Wheeler, 2-2449

Subject: ANALYSIS OF TANK FARM SAMPLES
Sample: T-4887 Tank: 102-B

Vis-OTR: Yellow, cloudy < 5% Organic 200 mrad/hr

pH: 9.95

SpG: 1.1383

OH: 5.16×10^{-2} M

Al: 1.09×10^{-3} M

Na: 2.80 M

NO_2: 0.367 M

NO_3: 1.84 M

SO_4: Cancelled

Pu: 1.31×10^{-4} g/gal

D.T.A.: No exotherm below 200°C on aqueous
No exotherm below 200°C on organic

PO_4: 8.22×10^{-2} M

Cl: 3.25×10^{-2} M

F: 1.099×10^{-2} M

CO_3: 8.41^{-2} M

GEA: ^{134}Cs - 3.28×10^{2} μCi/gal
^{137}Cs - 1.51×10^{5} μCi/gal

$^{89,90}Sr$: 1.96×10^{4} μCi/gal

Water: 81.71%

Atlantic Richfield Hanford Company

R. L. Walser
Page 2
October 24, 1975

Cooling Curve:	40°C for 45 min.	Cloudy	No solids.
	35°C for 45 min.	Cloudy	No solids.
	30°C for 45 min.	Cloudy	No solids.
	25°C for 45 min.	Cloudy	No solids.
	20°C for 45 min.	Cloudy	No solids.
	15°C for 45 min.	Cloudy	No solids.
	10°C for 45 min.	Cloudy	No solids.
	5°C for 45 min.	Cloudy	No solids.

REW:eyw

cc: JS Buckingham
WR Christensen
RM Ginestet
RE Wheeler
JC Womack

B103.1

Date: October 20, 1975

To: R. L. Walser

From: R. E. Wheeler, 2-2449 R E Wheeler

Subject: ANALYSIS OF TANK FARM SAMPLES
Sample: T-7809 Tank: 103-B
Received: September 8, 1975

Vis-OTR: Yellow No solids 300 mrad/hr

pH: 12.4

SpG: 1.1253

OH: 0.128 M

Al: 3.72×10^{-2} M

Na: 2.28 M

NO_2: 0.350 M

NO_3: 1.22 M

Pu: 2.23×10^{-4} g/gal

D.T.A.: No exotherm below 200°C

SO_4: Cancelled

PO_4: 0.104 M

Cl: 3.36×10^{-2} M

F: 1.78×10^{-3} M

CO_3: 0.211 M

GEA: ^{134}Cs - 1.04×10^{3} µCi/gal
^{137}Cs - 1.86×10^{5} µCi/gal

$^{89,90}Sr$: 4.85×10^{2} µCi/gal

Water: 91.61 %

R. L. Walser
Page 2
October 20, 1975

Cooling Curve:	25°C for 45 min.	No solids.
	20°C for 45 min.	No solids.
	15°C for 45 min.	No solids.
	10°C for 45 min.	No solids.
	5°C for 45 min.	No solids.

REW:eyw

cc: JS Buckingham
WR Christensen
RM Ginestet
RE Wheeler
JC Womack

Atlantic Richfield Hanford Company

B103.2

Date: October 24, 1975

To: R. L. Walser

From: R. E. Wheeler, 2-2449

Subject: ANALYSIS OF TANK FARM SAMPLES
Sample: T-4298 Tank: 103-B
Received: May 9, 1975

Vis-OTR: Clear, yellow No solids 350 mrad/hr

pH: 12.0

SpG: 1.117

OH: 0.132 M

Al: 4.54×10^{-2} M

Na: 2.47 M

NO_2: 0.332 M

NO_3: 1.06 M

Pu: 7.02×10^{-5} g/gal

D.T.A.: No exotherm below 200°C

SO_4: Cancelled

PO_4: 0.133 M

F: 6.99×10^{-3} M

$^{89,90}Sr$: 4.40×10^{2} µCi/gal

CO_3: 0.180 M

GEA: $^{106}RuRh$ - 1.91×10^{4} µCi/gal
^{134}Cs - 5.75×10^{2} µCi/gal
^{137}Cs - 1.64×10^{5} µCi/gal

Water: 85.34%

Cooling Curve: 25°C for 45 min. No solids.
20°C for 45 min. No solids.

84-8000-030 (10-68)

R. L. Walser
Page 2
October 24, 1975

Cooling Curve: 15°C for 45 min. No solids.
10°C for 60 min. No solids.
5°C for 60 min. No solids.

REW:ew

cc: JS Buckingham
WR Christensen
RM Ginestet
RE Wheeler
JC Womack

TCRC-2

.H Babad
TS Buckingham
Dodd
DC Harlow
JE Horton
RL Walser
RA Watrous
WI Winters
File (2)

culate:

CTL Exempt

e:

To: D. C. Lini

From: J. E. Horton

CONCENTRATION LABORATORY ASSISTANCE

Budget Number: B0651

Contributor: J. E. Horton

ABSTRACT

Analyses and characterization were requested on tank sample 105-B. Analyses of 105-B Tank indicated a mixture of sodium nitrate, sodium phosphate, with variable amounts of sodium carbonate, sodium sulfate, aluminum oxide, etc.

PROGRESS DURING REPORT PERIOD

Sample 105-B was received on January 16, 1976. Analyses were made by weighing out 3.02695 grams of solids, dissolving them with water, and diluting to a known volume. Insoluble solids were dissolved in concentrated HCl and diluted to a known volume. The solids in Tank 105-B were about 80 to 85 percent water soluble.

PLANS FOR NEXT REPORTING PERIOD

To report on samples 103-U and 361-U when all analyses are reported by Analytical Services Laboratories.

Analysis are reported in Table I. X-ray diffraction analysis for Tank 105-B are reported in Table II.

CONCLUSION

All samples received have been processed and sent to laboratory for analyses.

BIBLIOGRAPHY

Letter, June 9, 1976, J. E. Horton to W. R. Christensen, "Analyses of 105-B Tank."

TABLE I

ANALYSIS OF 105-B TANK

Bulk Density	1.10 g/cc	
Particle Density	2.35 g/cc	
$\%H_2O$	45.7%	
Al_2O_3	0.3%	
FeOOH	0.8%	
$NaNO_2$	0.1%	
$NaNO_3$	28.1%	
Na_2CO_3	0.3%	
Na_3PO_4	17.3%	
Na_2SO_4	2.5%	
Mg	1.0%	
Mn	1.0%	
Pu	2.24×10^{-7}	~~μCi~~ g? /g
$^{89+90}Sr$	5.9	μCi/g
^{137}Cs	0.64	μCi/g

Solids

TABLE II

X-RAY DIFFRACTION FOR 105-B TANK
(By G. Burch)

Compounds possibly present

$CaAl_2(Si_2Al_2)O_{10}(OH)_2$

Calcium aluminum silicate hydroxide

Margarite

$Fe_3(OH)_3(PO_4)_2$ 2 1/2 H_2O

Beraunite

$K_2NaAl_3Si_9O_{24}$ $7H_2O$

Potassium sodium aluminum silicate

Hydrate zeolite and less likely

$(NH_4)_2FeP_2O_7 \cdot 2H_2O$

Ammonium iron phosphate hydrate

An elemental of this sample shows

Fe, Ca, K, Al, S, and Ti to be present

Atlantic Richfield Hanford Company

Date: December 1, 1975

To: R. L. Walser

From: R. E. Wheeler, 2-2449 R M Wheeler

Subject: ANALYSIS OF TANK FARM SAMPLES
Sample: T-8577 Tank: 106-B B 106.1
Received: October 6, 1975

Vis-OTR: Yellow No solids 200 mrad/hr

pH: 9.5

SpG: 1.227

OH: 0.031 M

Al: $< 4.37 \times 10^{-4}$ M

Na: 4.00 M

NO_2: 0.187 M

NO_3: 3.0 M

Pu: 5.30×10^{-5} g/gal

D.T.A.: No exotherm below 200°C

SO_4: Cancelled

PO_4: 9.51×10^{-2} M

Cl: 5.57×10^{-2} M

F: 9.79×10^{-3} M

CO_3: 0.133 M

GEA: ^{134}Cs - 4.37×10^{2} µCi/gal
^{137}Cs - 1.86×10^{5} µCi/gal

$^{89,90}Sr$: 1.37×10^{4} µCi/gal

Water: 72.77%

Atlantic Richfield Hanford Company

R. L. Walser
Page 2
December 1, 1975

Cooling Curve:	35°C for 35 min.	No solids.
	30°C for 35 min.	No solids.
	25°C for 35 min.	No solids.
	20°C for 35 min.	2% solids.
	15°C for 35 min.	2% solids.
	10°C for 35 min.	2% solids.
	5°C for 35 min.	2% solids.

REW:eyw

cc: JS Buckingham
WR Christensen
RM Ginestet
RE Wheeler
JC Womack

TLRC-1

Date: April 8, 1976

To: W. R. Christensen

From: J. E. Horton - 2-2529 JEHorton

Subject: ANALYSIS OF 107-B SLUDGE

A sample was received on January 19, 1976. The sample was yellowish brown, very soft, with crystal-like chunks throughout. The solids from Tank 107-B were about 30 percent water soluble.

The analyses indicated that 107-B solids are essentially a mixture of sodium phosphate, sodium sulfate, sodium nitrate, aluminum oxide, with lesser amounts of sodium nitrite, iron hydroxide, etc.

Analyses were made by weighing 3.76296 grams of 107-B solids, dissolving it in water, and diluting to a volume of 50 milliliters. The fraction not soluble in water was dissolved in concentrated HCl. Solids insoluble in water or HCl were fused with KOH, the melt dissolved with concentrated HCl, and diluted to a known volume. Analyses are reported in Table I (attached).

If you have any questions regarding this work, please call me.

JEH:ms

Att.

cc: H Babad
JS Buckingham
RG Geier
SS Koegler
DC Lini
WP Metz
RE Van der Cook
RL Walser
Process Aids (7)
File-123
LB

TABLE I

ANALYSIS OF 107-B TANK SLUDGE

Bulk Density	1.64	g/cc
Particle Density	2.04	g/cc
$\%H_2O$	32.9%	
Al_2O_3	8.9%	
FeOOH	3.3%	
$NaNO_2$	0.4%	
$NaNO_3$	14.3%	
Na_2CO_3	2.5%	
Na_3PO_4	20.0%	
Na_2SO_4	10.7%	
Mg	<1.0%	
Mn	<1.0%	
Pu	2.73×10^{-6}	g/g
$^{89+90}Sr$	12.9	µCi/g
^{137}Cs	3.2	µCi/g
^{125}Sb	5.3	µCi/g
$^{106}RuRH$	2.3	µCi/g
^{144}Ce	1.5	µCi/g
^{154}Eu	0.4	µCi/g
^{155}Eu	1.3	µCi/g

TCRC-1

Date: November 12, 1975

To: R. L. Walser

From: R. E. Wheeler, 2-2449

Subject: ANALYSIS OF TANK FARM SAMPLES
Sample: T-8578 Tank: 109-B
Received: October 6, 1975

Vis-OTR: Yellow No solids 700 mrad/hr

pH: 12.5

SpG: 1.282

OH: 1.29 M

Al: 0.667 M

Na: 4.77 M

NO_2: 1.14 M

NO_3: 2.48 M

Pu: 1.10×10^{-5} gm/gal

D.T.A.: No exotherm below 200°C

SO_4: Cancelled

PO_4: 2.09×10^{-2} M

Cl: 6.26×10^{-2} M

F: 2.44×10^{-4} M

CO_3: 3.17×10^{-4} M

GEA: ^{134}Cs - 3.60×10^{3} μCi/gal
^{137}Cs - 6.39×10^{5} μCi/gal

$^{89,90}Sr$: 2.18×10^{-1} μCi/gal

Water: 79.62%

R. L. Walser
Page 2
November 12, 1975

Cooling Curve:	35°C for 35 min.	No solids.
	30°C for 35 min.	No solids.
	25°C for 35 min.	No solids.
	20°C for 35 min.	No solids.
	15°C for 35 min.	No solids.
	10°C for 35 min.	No solids.
	5°C for 35 min.	No solids.

REW:eyw

cc: JS Buckingham
WR Christensen
RM Ginestet
RE Wheeler
JC Womack

December 4, 1978

60120-

J. E. Mirabella
Process Engineering
2750E, A103, 200 East

J. E. Horton
Chemical Sciences Group
222-S, 200 West
2-2529

Characterization of 200 Series Tanks

Samples from tanks 201-B, 202-B, 203-B, and 204-B have been received by Chemical Sciences Group for characterization. All samples were black in color, with a consistency of soft grease. Analytical data for the above samples are reported in Tables I through IV.

If you have any questions, please call me.

J. E. Horton, Specialist
Waste Chemistry Unit

JEH/jkl

Attachment - 4

Information: ~~J. S. Buckingham~~
F. M. Jungfleisch
D. M. Strachan

Table I

ANALYSIS OF 201-B TANK
Sample # 1898

Components	Water Soluble	Acid (Fusion)
Al*	0.05%	1.0%
Bi^{3+}	<0.005%	3.8%
CO_3^{2-}	3.3%	
CrO_4^-	0.05%	
Cl^-	0.01%	
F^-	NR	
Fe*	<0.0002%	1.8%
Hg*	0.05%	
K^+	0.3%	
La^{3+}	<0.003%	1.3%
Mn*	<0.003%	
Ni^{2+}	NR	0.1%
NO_2^-	0.004%	
NO_3^-	3.3%	
Na^+	2.8%	
OH^-	0.6%	
PO_4^{3-}	0.05%	1.1%
SO_4^{2-}	<0.1%	<0.6%
SiO_2^{2-}	0.05%	0.3%
U*	7.41×10^{-6} g/g	1.05×10^{-5} g/g
Pu*	$<1.29 \times 10^{-10}$ g/g	5.00×10^{-5} g/g
Am*	5.69×10^{-12} g/g	1.33×10^{-9} g/g
$^{89+90}Sr^{++}$	2.1×10^{-3} uci/g	2.7 uci/g
$^{137}Cs^+$	0.05 uci/g	0.059 uci/g
^{155}Eu*		0.028 uci/g
Ce		0.016 uci/g

Water Solubility	23.0%
Bulk Density	1.37 g/cc
Percent Water	72.2

*All oxidation states
NR -- Analysis not requested

TCRC-1

Atlantic Richfield Hanford Company

Date: December 10, 1975

To: R. L. Walser

From: R. E. Wheeler, 2-2449

Subject: ANALYSIS OF TANK FARM SAMPLES
Sample: T-8579 Tank: 202-B
Received: October 6, 1975

Vis-OTR: Clear No solids 5 mrad

pH: 9.5

SpG: 1.018

OH: 0.032 M

Al: $< 4.63 \times 10^{-4}$ M

Na: 1.65 M

NO_2: $< 1 \times 10^{-3}$ M

NO_3: 0.230 M

Pu: 3.78×10^{-6} gm/gal

D.T.A.: No exotherm below 200°C

SO_4: Cancelled

PO_4: 1.10×10^{-3} M

Cl: 1.53×10^{-2} M

F: 3.19×10^{-2} M

CO_3: 5.64×10^{-2}

GEA: ^{137}Cs - 9.71 μCi/gal 5617 μCi/

$^{89,90}Sr$: 3.596 μCi/gal

Water: 97.53 %

Cooling Curve: 35°C for 35 min. No solids.
30°C for 35 min. No solids.

R. L. Walser
Page 2
December 10, 1975

Cooling Curve:	25°C for 35 min.	No solids.
	20°C for 35 min.	No solids.
	15°C for 35 min.	No solids.
	10°C for 35 min.	No solids.
	5°C for 35 min.	No solids.

REW:eyw

cc: JS Buckingham
WR Christensen
RM Ginestet
KE Nelson
JC Womack

TCRC-2

December 4, 1978

50120-

J. E. Mirabella
Process Engineering
2750E, A103, 200 East

J. E. Horton
Chemical Sciences Group
222-S, 200 West
2-2529

Characterization of 200 Series Tanks

Samples from tanks 201-B, 202-B, 203-B, and 204-B have been received by Chemical Sciences Group for characterization. All samples were black in color, with a consistency of soft grease. Analytical data for the above samples are reported in Tables I through IV.

If you have any questions, please call me.

J. E. Horton, Specialist
Waste Chemistry Unit

JEH/jkl

Attachment - 4

Information: ~~J. S. Buckingham~~
F. M. Jungfleisch
D. M. Strachan

Table II

ANALYSIS OF 202-B TANK
Sample # 2509

Components	Water Soluble	Acid (Fusion)
Al*	<0.01%	0.8%
Bi^{3+}	NR	
CO_3^{2-}	0.4%	
CrO_4^-	NR	
Cl^-	0.2%	
F^-	NR	0.3%
Fe*	0.003%	2.5%
Hg*	<0.003%	
K^+	0.3%	
La^{3+}	NR	1.5%
Mn*	NR	
Ni^{2+}	NR	
NO_2^-	0.3%	
NO_3^-	3.3%	
Na^+	1.9%	
OH^-	<0.1%	
PO_4^{3-}	0.7%	1.6%
SO_4^{2-}	<0.1%	<1.0%
SiO_2^{2-}	0.08%	0.2%
U*	1.09×10^{-5} g/g	
Pu*	3.60×10^{-10} g/g	5.5×10^{-5} g/g
Am*	$<4.29 \times 10^{-12}$ g/g	1.59×10^{-8} g/g
$^{89+90}Sr^{2+}$	0.002 uci/g	1.01×10^{3} uci/g
$^{137}Cs^+$	0.016 uci/g	0.132 uci/g
^{155}Eu*	NR	
TOC	0.075 g/l	0.033 g/l

Water Solubility	40.0%
Bulk Density	1.25 g/cc
Percent Water	71.0

*All oxidation states
NR -- Analysis not requested

December 4, 1978 TCRC-4 60120-7 WHC-SD-WM-ER-310, Rev. 0

J. E. Mirabella
Process Engineering
2750E, A103, 200 East

J. E. Horton
Chemical Sciences Group
222-S, 200 West
2-2529

Characterization of 200 Series Tanks

Samples from tanks 201-B, 202-B, 203-B, and 204-B have been received by Chemical Sciences Group for characterization. All samples were black in color, with a consistency of soft grease. Analytical data for the above samples are reported in Tables I through IV.

If you have any questions, please call me.

J. E. Horton, Specialist
Waste Chemistry Unit

JEH/jkl

Attachment - 4

Information: ~~J. S. Buckingham~~
F. M. Jungfleisch
D. M. Strachan

Table I

ANALYSIS OF 201-B TANK
Sample # 1898

Components	Water Soluble	Acid (Fusion)
Al*	0.05%	1.0%
Bi^{3+}	<0.005%	3.8%
CO_3^{2-}	3.3%	
CrO_4^-	0.05%	
Cl^-	0.01%	
F^-	NR	
Fe*	<0.0002%	1.8%
Hg*	0.05%	
K^+	0.3%	
La^{3+}	<0.003%	1.3%
Mn*	<0.003%	
Ni^{2+}	NR	0.1%
NO_2^-	0.004%	
NO_3^-	3.3%	
Na^+	2.8%	
OH^-	0.6%	
PO_4^{3-}	0.05%	1.1%
SO_4^{2-}	<0.1%	<0.6%
SiO_2^{2-}	0.05%	0.3%
U*	7.41×10^{-6} g/g	1.05×10^{-5} g/g
Pu*	$<1.29 \times 10^{-10}$ g/g	5.00×10^{-5} g/g
Am*	5.69×10^{-12} g/g	1.33×10^{-9} g/g
$^{89+90}Sr^{++}$	2.1×10^{-3} uci/g	2.7 uci/g
$^{137}Cs^+$	0.05 uci/g	0.059 uci/g
^{155}Eu*		0.028 uci/g
Ce		0.016 uci/g

Water Solubility	23.0%
Bulk Density	1.37 g/cc
Percent Water	72.2

*All oxidation states
NR -- Analysis not requested

Table II

ANALYSIS OF 202-B TANK
Sample # 2509

Components	Water Soluble	Acid (Fusion)
Al*	<0.01%	0.8%
Bi^{3+}	NR	
CO_3^{2-}	0.4%	
CrO_4^-	NR	
Cl^-	0.2%	
F^-	NR	0.3%
Fe*	0.003%	2.5%
Hg*	<0.003%	
K^+	0.3%	
La^{3+}	NR	1.5%
Mn*	NR	
Ni^{2+}	NR	
NO_2^-	0.3%	
NO_3^-	3.3%	
Na^+	1.9%	
OH^-	<0.1%	
PO_4^{3-}	0.7%	1.6%
SO_4^{2-}	<0.1%	<1.0%
SiO_2^{2-}	0.08%	0.2%
U*	1.09×10^{-5} g/g	
Pu*	3.60×10^{-10} g/g	5.5×10^{-6} g/g
Am*	$<4.29 \times 10^{-12}$ g/g	1.59×10^{-8} g/g
$^{89+90}Sr^{2+}$	0.002 uci/g	1.01×10^{3} uci/g
$^{137}Cs^+$	0.016 uci/g	0.132 uci/g
^{155}Eu*	NR	
TOC	0.075 g/l	0.033 g/l

Water Solubility	40.0%
Bulk Density	1.25 g/cc
Percent Water	71.0

*All oxidation states
NR -- Analysis not requested

B203.1

Table III

ANALYSIS OF 203-B TANK
Sample # 2782

Components	Water Soluble	Acid (Fusion)
Al*	<0.004%	0.03%
Bi^{3+}	<0.02%	6.6%
CO_3^{2-}	0.6%	
CrO_4^-	0.1%	
Cl^-	0.06%	
F^-	NR	
Fe*	0.003%	1.2%
Hg*	<0.004%	
K^+	0.4%	
La^{3+}	0.006%	
Mn*	<0.001%	
Ni^{2+}	NR	
NO_2^-	0.03%	
NO_3^-	4.0%	<0.1%
Na^+	2.7%	
OH^-	0.5%	
PO_4^{3-}	0.2%	0.7%
SO_4^{2-}	<0.2%	<0.2%
SiO_2^{2-}	0.02%	0.1%
U*	2.84×10^{-7} g/g	1.68×10^{-5} g/g
Pu*	1.10×10^{-9} g/g	9.01×10^{-6} g/g
Am*	NR	8.48×10^{-9} g/g
$^{89+90}Sr^{2+}$	0.001 uci/g	6.54 uci/g
$^{137}Cs^+$	0.005 uci/g	0.004 uci/g
^{155}Eu*	NR	

Water Solubility	24.0%
Bulk Density	1.09 g/cc
Percent Water	74.3

*All oxidation states
NR -- Analysis not requested

Table IV

ANALYSIS OF 204-B TANK
Sample # 1974

Components	Water Soluble	Acid (Fusion)
Al*	0.0008%	0.008%
Bi^{3+}	<0.0006%	6.2%
CO_3^{2-}	0.3%	
CrO_4^-	0.08%	
Cl^-	0.07%	
F^-	NR	0.2%
Fe*	0.0008%	2.9%
Hg*	0.001%	
K^+	0.4%	
La^{3+}	0.01%	2.0%
Mn*	0.0001%	
Ni^{2+}		0.03%
NO_2^-	0.3%	
NO_3^-	2.8%	<0.07%
Na^+	1.4%	
OH^-	0.1%	
PO_4^{3-}	0.1%	1.2%
SO_4^{2-}	<0.05%	<0.1%
SiO_2^{2-}	0.004%	0.3%
U*	4.63×10^{-8} g/g	9.71×10^{-6} g/g
Pu*	1.16×10^{-9}	9.74×10^{-6} g/g
Am*	NR	
$89+90Sr^{2+}$	0.004 uci/g	4.00 uci/g
$^{137}Cs^+$	0.005 uci/g	0.007 uci/g
^{155}Eu*	NR	
TOC	0.096 M	

Water Solubility	(about) 26.0%
Bulk Density	1.14%
Percent Water	76.0

*All oxidation states
NR -- Analysis not requested

Internal Letter TCRC-2 Rock

Date. December 30, 1982 No. 6545 WHC-SD-WM-ER-310, Rev. 0

TO: (Name, Organization, Internal Address)
D. E. Bowers
Process Engineering
2750E/A100/200 East

FROM: (Name, Organization, Internal Address, Phone)
M. T. Jansky
Separations Process Development Unit
222-S/MO-037/200 West
3-1571

Subject: Solids in Tank 203B

The Separations Process Development Unit (SPDU) was asked to isolate and characterize solids present in Tank 203B, which has recently been determined to be of questionable integrity. The data presented here may aid in determining any potential hazards to the biosphere should the solids be leached from the tank.

The data, gathered on an "extreme rush" basis, were obtained with the help of individuals and groups who should be recognized for their diligence and rapid and efficient support. Mr. Al Fishback (QA), the Research Support Unit (QA), Mr. Mark Palmer (QA/X-ray), and the Counting Room (QA) were extremely effective in providing prompt analytical support.

A sample from Tank 203B (Serial #3946) was received by SPDU. The samples contained approximately ten volume percent brown settled solids when received, but Analytical Laboratories (AL) had removed supernatant liquor from the sample previously for analyses. The sample was shaken, and a representative aliquot of the slurry was taken. The aliquot was centrifuged and the supernatant discarded, isolating the solids for characterization.

The solids were contacted with water. Approximately 25 weight percent were water-soluble. The water-soluble composition is shown in Table I. The remaining solids were contacted with warm, concentrated nitric acid, with no apparent reaction. Hydrochloric acid was added in sufficient quantity to make the "solvent" aqua regia (3:1 $HCl:HNO_3$). Again no apparent reaction (i.e., dissolution of solids) occurred. Hydrofluoric acid was added, with subsequent dissolution of the solids. The analyses of the acid-soluble fraction are also shown in Table I.

A separate aliquot of the slurry was taken, centrifuged, and again the supernatant was discarded. The solids were washed with water and acetone, dried for approximately one-half hour, and analyzed by both x-ray emission and diffraction. The emission analysis indicated that the major components in the washed solids were bismuth, barium, lanthanum, and iron. A minor constituent was manganese, with a trace of: calcium, chronium, strontium, zirconium, potassium, aluminum, uranium, zinc, and nickel. The diffraction analysis indicated that the washed solids had a non-crystalline structure.

The analytical data seems to add up pretty well, considering the centrifuged solids were ≈70 weight percent water. The specific compositions are

D. E. Bowers
Page 2
December 30, 1982

not readily discernible; however, the water-soluble fraction is apparently nitrates. The probable composition of the acid-soluble fraction is the oxide forms of metallic salts. No glaring health hazard appears to be present, but the data need to be reviewed by responsible engineers to determine actual potential hazards.

Please call me on 373-1571 if you have any questions or comments.

M. T. Jansky
Senior Chemist

MTJ/naj

Attachment

cc:

J. F. Albaugh
R. B. Bendixsen
J. S. Buckingham
J. L. Deichman
K. A. Gasper
W. F. Heine
E. J. Kosiancic
W. L. Louk
W. H. Sant
C. P. Sutter
R. A. VanMeter
R. D. Wojtasek
File Code: WB621
Process Aids
Letterbook

TABLE I

Composition of Solids in Tank 203E
(as weight percent of centrifuged solids)

Component	Water-Soluble*	Acid-Soluble*
Ba	1.74×10^{-3}	2.63
Fe	0.04	3.68
Mn	0.01	1.03
Hg	1.37	1.38
Al	0.02	3.29
Cr	0.01	0.22
Ni	**	0.03
Zn	4.27×10^{-4}	0.03
Na	0.8	10.04
Ca	0.01	5.80
K	0.25	0.91
Pb	**	0.13
Zr	**	0.04
Cd	**	**
La	4.6×10^{-3}	0.81
Sn	**	2.47
P	0.03	0.73
Bi	0.02	3.10
Mg	4.6×10^{-3}	3.20
Sr (total)	7.22×10^{-4}	0.09
Sr^{90}	7.56×10^{-6}	**
U	0.01	0.03
NO_2	0.42	0.25
NO_3	14.60	--
Pu	1.17×10^{-4}	**

*60-75 weight percent of solids is water

**Below detection limits

Internal Letter TCRC-3 Rock

Date January 7, 1983 No. 65453 WHC-SD-WM-ER-310, Rev. 0

TO (Name, Organization, Internal Address)
. D. E. Bowers
. Process Engineering
. 2750E/A100/200 East

FROM: (Name, Organization, Internal Address, Phone)
. M. T. Jansky
. Separations Process Development L
. 222-S/MO-037/200 West
. 3-1571

Subject: . Additional Data for Solids in Tank 203B

Ref: Letter, #65453-82-452, dated December 30, 1982, M. T. Jansky to D. E. Bowers, "Solids in Tank 203B"

Solids present in Tank 203B were previously isolated and characterized by the Separations Process Development Unit (SPDU). The referenced letter discussed the analytical results. A few corrections and additions to Table I of the referenced letter need to be made. Therefore, a new Table I is enclosed herein, which should replace the Table in the original letter.

Table I (this letter) includes solubility data that have been corrected for a dilution factor. Table II reports specific radioisotope content per gram of centrifuged solids (water-soluble or acid-soluble). Additionally, the latest results on the washed solids show that the water-insoluble solids are high in siliceous material. The exact quantitative and qualitative values are not available, however.

No further work is planned for this sample. I understand that an attempt to obtain a sludge sample is presently underway. Please call when the sample is ready, or if there are any questions regarding the completed work.

M. T. Jansky
Senior Chemist

MTJ/naj

Attachments

cc:

J. F. Albaugh
R. B. Bendixsen
J. S. Buckingham
J. L. Deichman
K. A. Gasper
W. F. Heine
E. J. Kosiancic
W. L. Louk
W. H. Sant
C. P. Sutter
R. A. VanMeter
R. D. Wojtasek
File Code: WB621
Process Aids
Letterbook

TABLE I

Composition of Solids in Tank 203E
(as weight percent of centrifuged solids)

Component	Water-Soluble*	Acid-Soluble*
Ba	0.02	2.90
Fe	0.43	3.68
Mn	0.06	1.03
Hg	1.37	1.38
Al	0.19	3.29
Cr	0.10	0.27
Ni	**	0.03
Zn	4.7×10^{-3}	0.03
Na	8.8	17.55
Ca	0.12	5.80
K	2.80	1.32
Pb	**	0.13
Zr	**	0.06
Cd	**	**
La	0.05	1.16
Sn	**	**
P	0.33	0.70
Bi	0.20	3.10
Mg	0.05	3.91
Sr (total)	0.01	0.09
Sr^{90}	7.56×10^{-6}	**
Cs^{137}	3.1×10^{-8}	**
U	0.01	0.03
NO_2	0.42	0.25
NO_3	14.60	--
Pu	1.17×10^{-4}	**

*60-75 weight percent of solids is water

**Below detection limits

TABLE II

Radioisotope Content of Solids in
(per gram of centrifuged solids)

Isotope	Water-Soluble Solids	Acid-Soluble Solids
Sr^{90}	10.74 μCi	2.38 μCi
Cs^{137}	0.03 μCi	*
U	7.29×10^{-5} g	2.87×10^{-4} g
$Pu^{239/240}$	1.17×10^{-6} g	*

*Not detected

Internal Letter TCRC-3 Roc!

Date January 7, 1983 No. 6545:

TO: (Name, Organization, Internal Address)
D. E. Bowers
Process Engineering
2750E/A100/200 East

FROM: (Name, Organization, Internal Address, Phone)
M. T. Jansky
Separations Process Development Unit
222-S/MO-037/200 West
3-1571

Subject: Additional Data for Solids in Tank 203B

Ref: Letter, #65453-82-452, dated December 30, 1982, M. T. Jansky to D. E. Bowers, "Solids in Tank 203B"

Solids present in Tank 203B were previously isolated and characterized by the Separations Process Development Unit (SPDU). The referenced letter discussed the analytical results. A few corrections and additions to Table I of the referenced letter need to be made. Therefore, a new Table I is enclosed herein, which should replace the Table in the original letter.

Table I (this letter) includes solubility data that have been corrected for a dilution factor. Table II reports specific radioisotope content per gram of centrifuged solids (water-soluble or acid-soluble). Additionally, the latest results on the washed solids show that the water-insoluble solids are high in siliceous material. The exact quantitative and qualitative values are not available, however.

No further work is planned for this sample. I understand that an attempt to obtain a sludge sample is presently underway. Please call when the sample is ready, or if there are any questions regarding the completed work.

M. T. Jansky
Senior Chemist

MTJ/naj

Attachments

cc:

J. F. Albaugh
R. B. Bendixsen
J. S. Buckingham
J. L. Deichman
K. A. Gasper
W. F. Heine
E. J. Kosiancic
W. L. Louk
W. H. Sant
C. P. Sutter
R. A. VanMeter
R. D. Wojtasek
File Code: WB621
Process Aids
Letterbook

TABLE I

Composition of Solids in Tank 203B
(as weight percent of centrifuged solids)

Component	Water-Soluble*	Acid-Soluble*
Ba	0.02	2.90
Fe	0.43	3.68
Mn	0.06	1.03
Hg	1.37	1.38
Al	0.19	3.29
Cr	0.10	0.27
Ni	**	0.03
Zn	4.7×10^{-3}	0.03
Na	8.8	17.55
Ca	0.12	5.80
K	2.80	1.32
Pb	**	0.13
Zr	**	0.06
Cd	**	**
La	0.05	1.16
Sn	**	**
P	0.33	0.70
Bi	0.20	3.10
Mg	0.05	3.91
Sr (total)	0.01	0.09
Sr^{90}	7.56×10^{-6}	**
Cs^{137}	3.1×10^{-8}	**
U	0.01	0.03
NO_2	0.42	0.25
NO_3	14.60	--
Pu	1.17×10^{-4}	**

*60-75 weight percent of solids is water

**Below detection limits

TABLE II

Radioisotope Content of Solids in
(per gram of centrifuged solids)

Isotope	Water-Soluble Solids	Acid-Soluble Solids
Sr^{90}	10.74 µCi	2.38 µCi
Cs^{137}	0.03 µCi	*
U	7.29×10^{-5} g	2.87×10^{-4} g
$Pu^{239/240}$	1.17×10^{-6} g	*

*Not detected

December 4, 1978

60120-78

J. E. Mirabella
Process Engineering
2750E, A103, 200 East

J. E. Horton
Chemical Sciences Group
222-S, 200 West
2-2529

Characterization of 200 Series Tanks

Samples from tanks 201-B, 202-B, 203-B, and 204-B have been received by Chemical Sciences Group for characterization. All samples were black in color, with a consistency of soft grease. Analytical data for the above samples are reported in Tables I through IV.

If you have any questions, please call me.

J. E. Horton, Specialist
Waste Chemistry Unit

JEH/jkl

Attachment - 4

Information: ~~J. S. Buckingham~~
F. M. Jungfleisch
D. M. Strachan

B204.1

Table IV

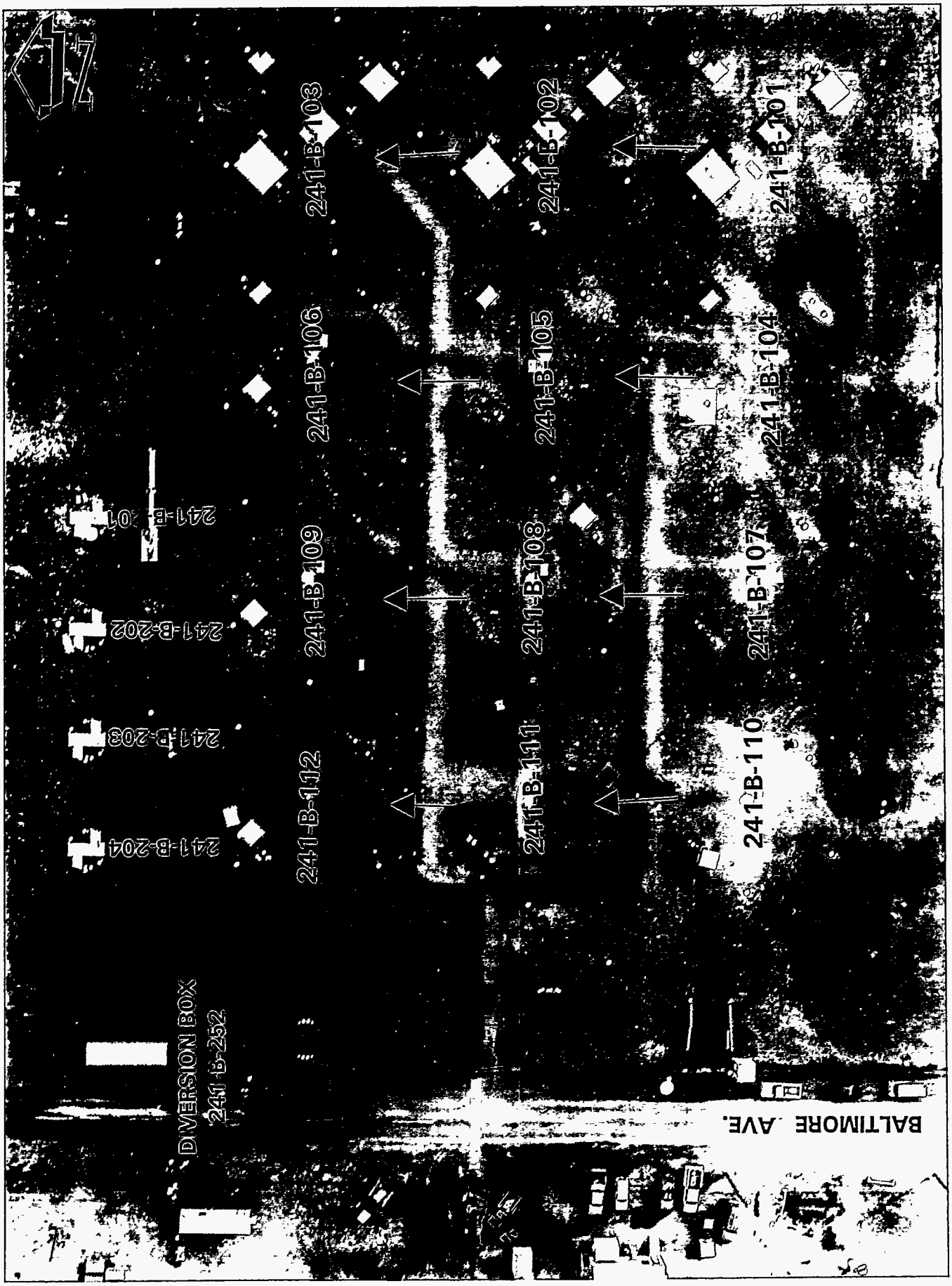
ANALYSIS OF 204-B TANK
Sample # 1974

Components	Water Soluble	Acid (Fusion)
Al*	0.0008%	0.008%
Bi^{3+}	<0.0006%	6.2%
CO_3^{2-}	0.3%	
CrO_4^-	0.08%	
Cl^-	0.07%	
F^-	NR	0.2%
Fe*	0.0008%	2.9%
Hg*	0.001%	
K^+	0.4%	
La^{3+}	0.01%	2.0%
Mn*	0.0001%	
Ni^{2+}		0.03%
NO_2^-	0.3%	
NO_3^-	2.8%	<0.07%
Na^+	1.4%	
OH^-	0.1%	
PO_4^{3-}	0.1%	1.2%
SO_4^{2-}	<0.05%	<0.1%
SiO_2^{2-}	0.004%	0.3%
U*	4.63×10^{-8} g/g	9.71×10^{-6} g/g
Pu*	1.16×10^{-9}	9.74×10^{-6} g/g
Am*	NR	
$^{89+90}Sr^{2+}$	0.004 uci/g	4.00 uci/g
$^{137}Cs^+$	0.005 uci/g	0.007 uci/g
^{155}Eu*	NR	
TOC	0.096 M	

Water Solubility	(about) 26.0%
Bulk Density	1.14%
Percent Water	76.0

*All oxidation states
NR -- Analysis not requested

B Tank Farm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241-B-111
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BALTIMORE AVE.

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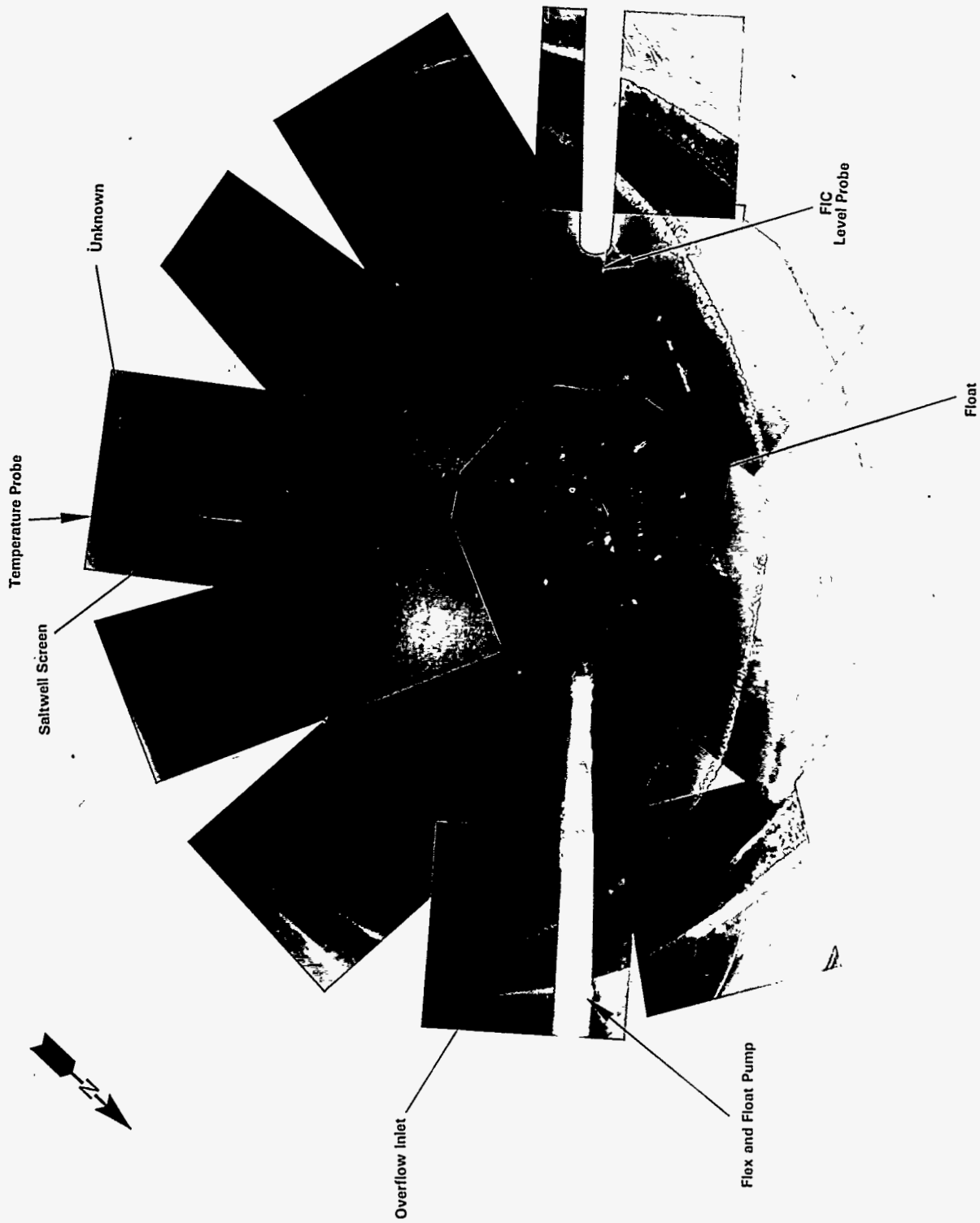

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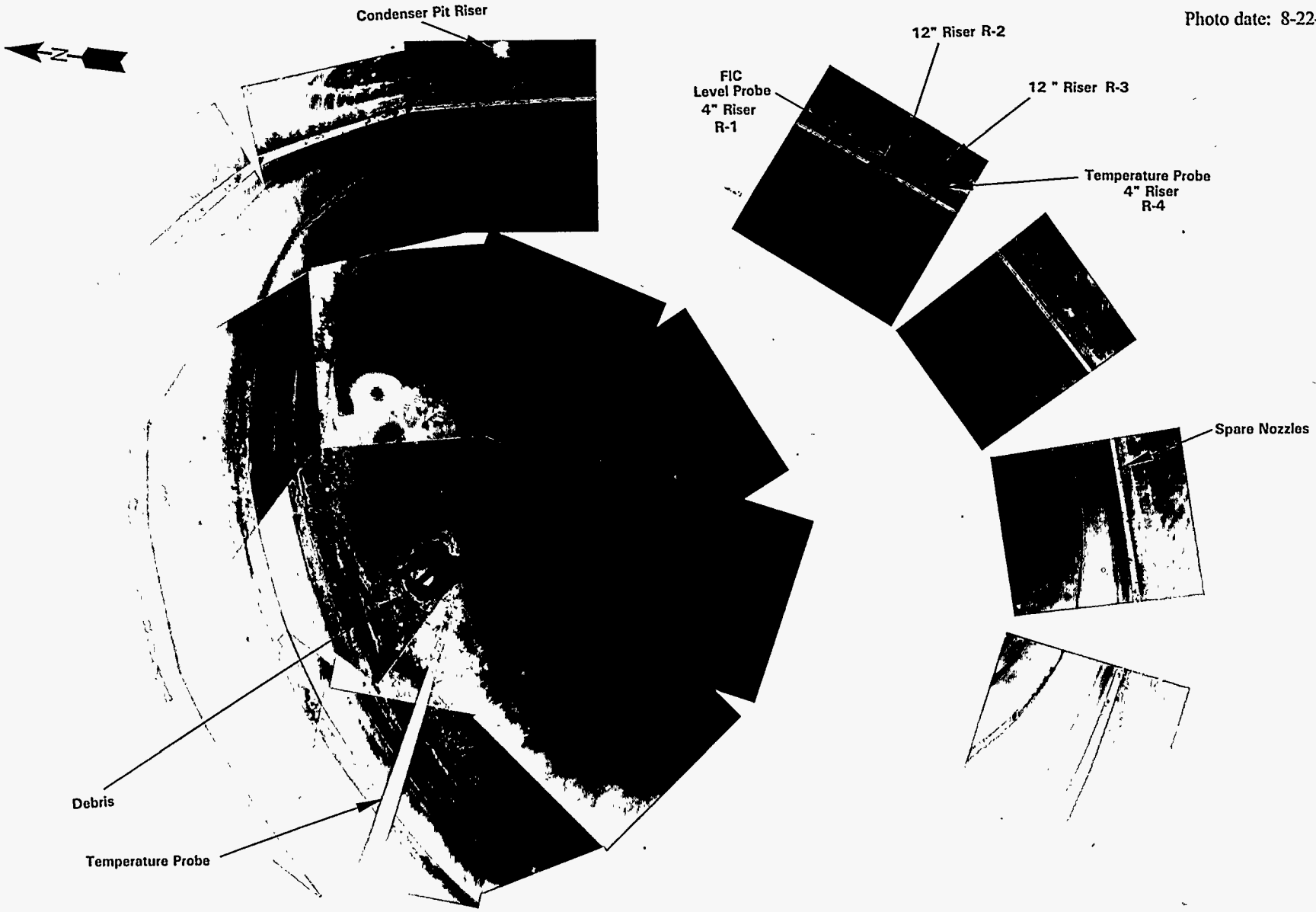

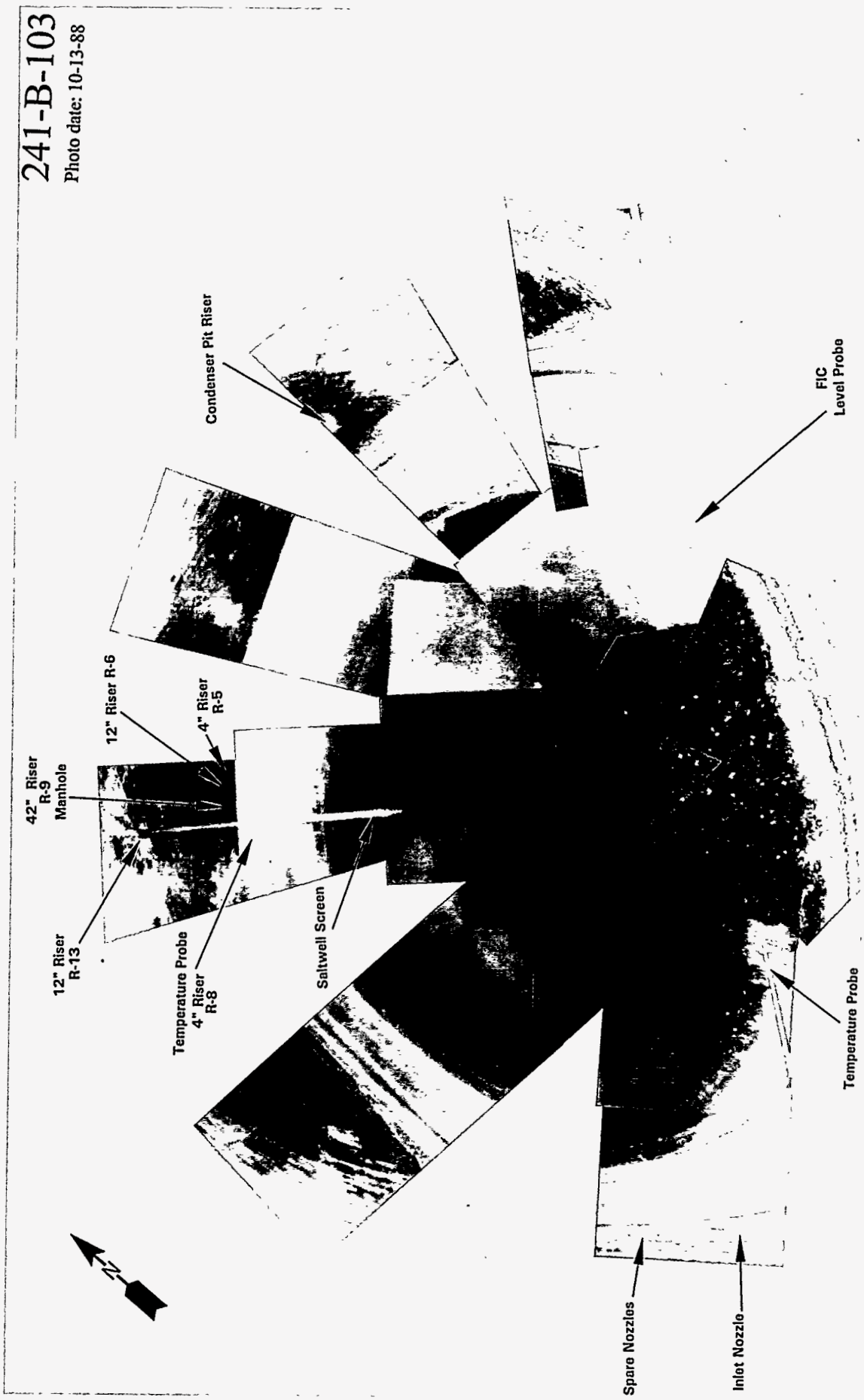
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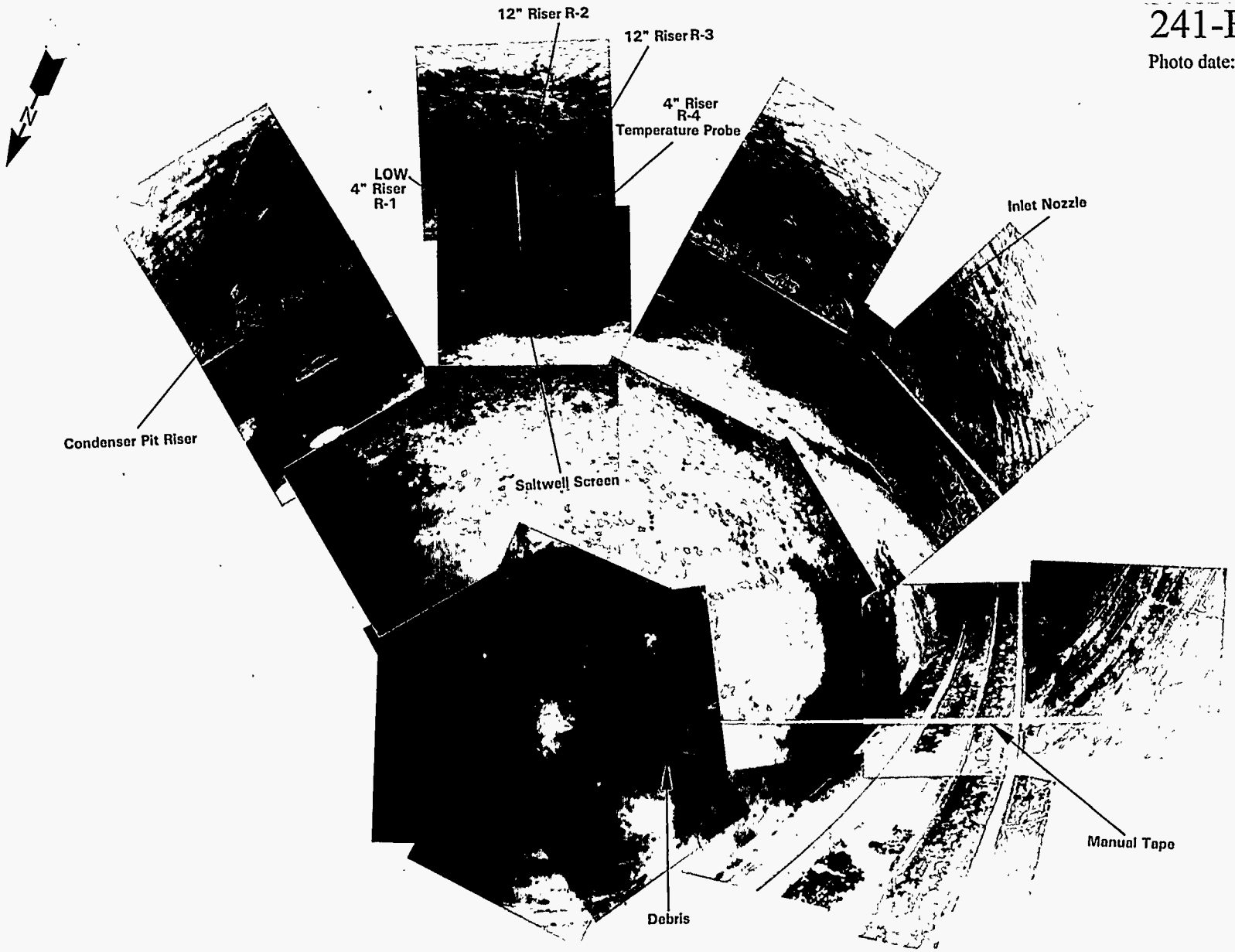
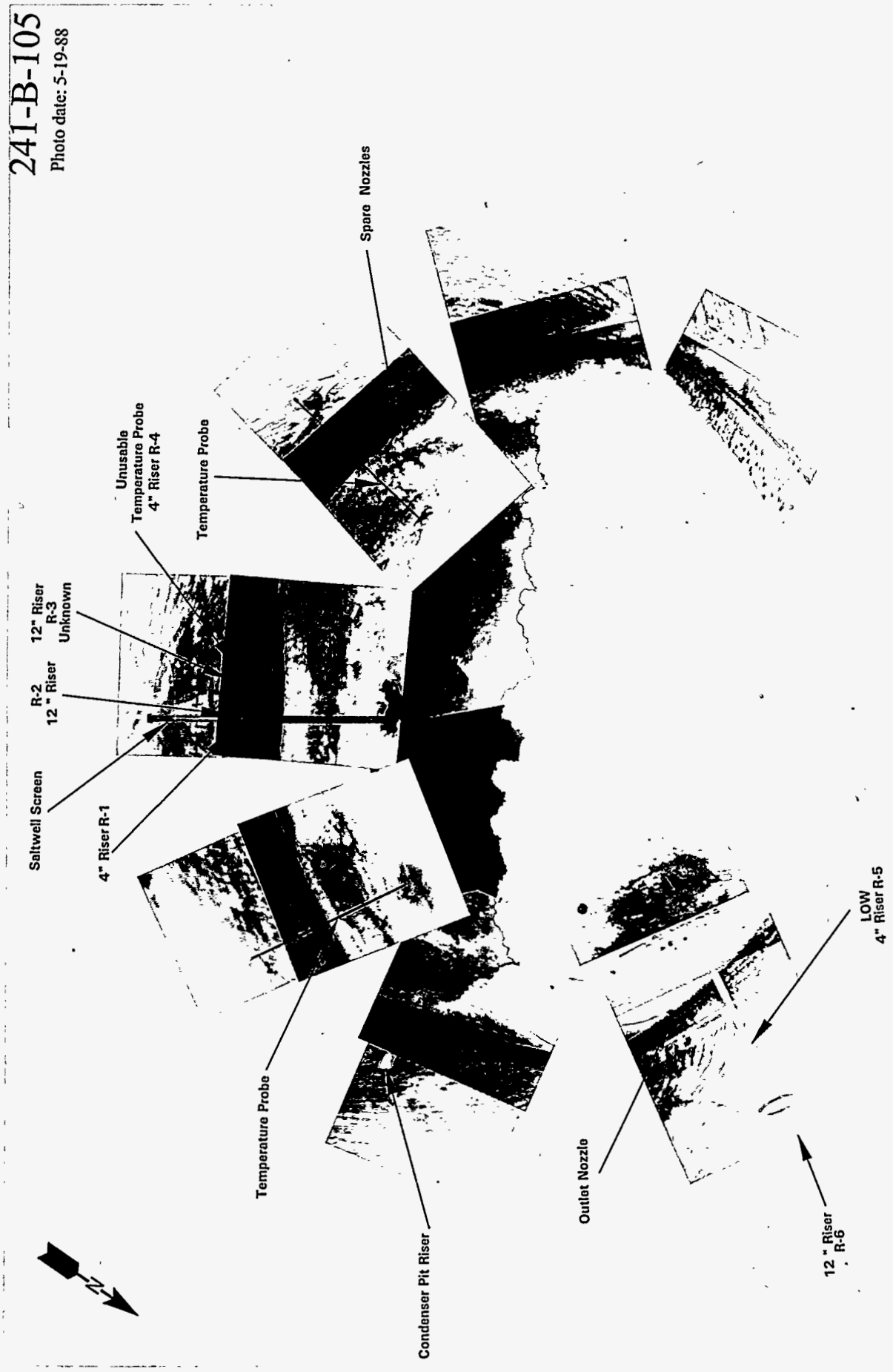
FIC
Level Probe
12" Riser R-6
4" Riser
R-5
42" Riser
R-9
Manhole
12" Riser
R-13
Temperature Probe
4" Riser
R-8
Saltwell Screen
Temperature Probe
Spare Nozzles
Inlet Nozzle
N

241-B-104

Photo date: 10-13-88

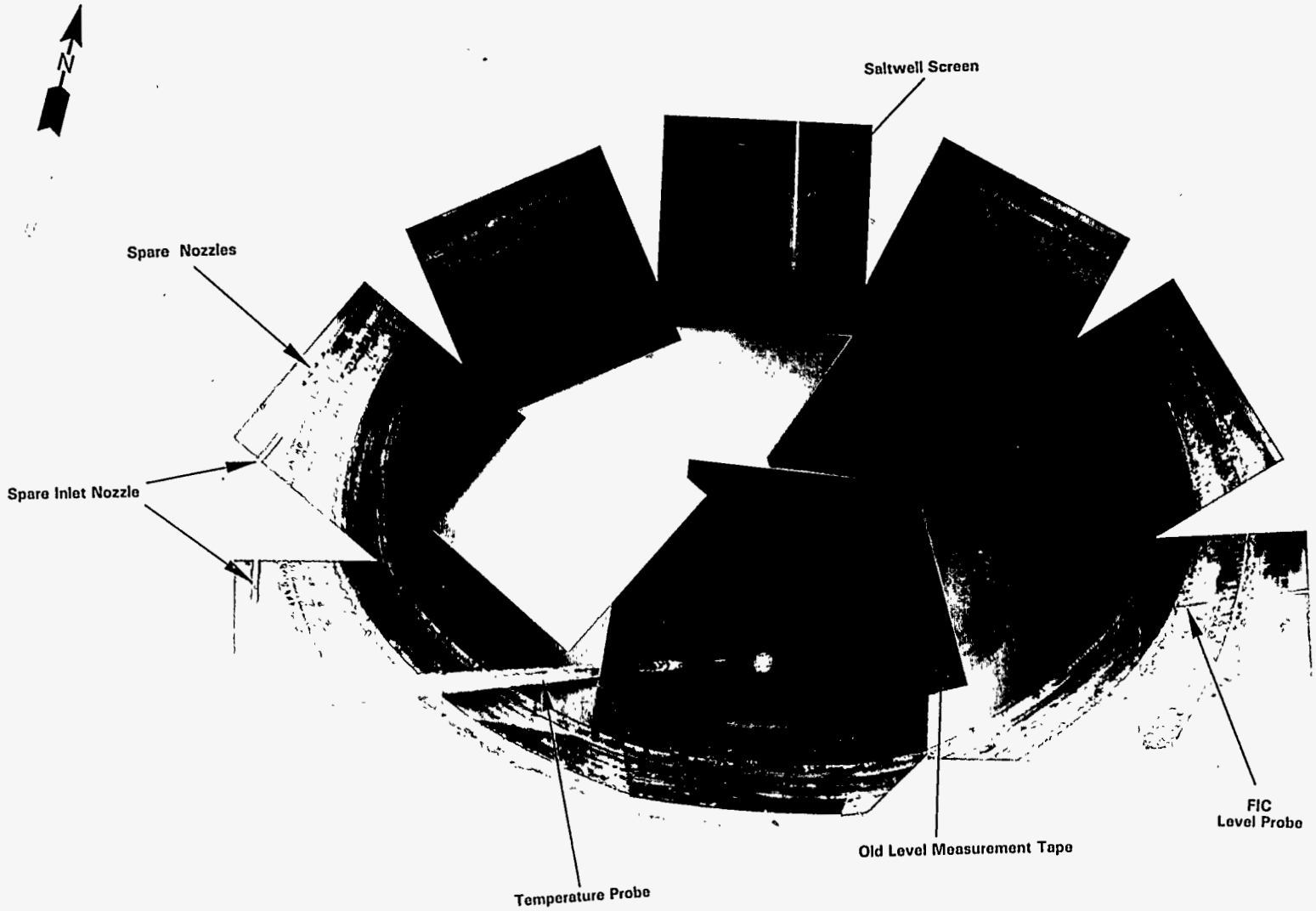



241-B-105
Photo date: 5-19-88
Spare Nozzles
Unusable
Temperature Probe
4" Riser R-4
Temperature Probe
12" Riser
R-3
Unknown
R-2
12 " Riser
Saltwell Screen
4" Riser R-1
Temperature Probe
Condenser Pit Riser
Outlet Nozzle
LOW
4" Riser R-5
12 " Riser
R-6
N

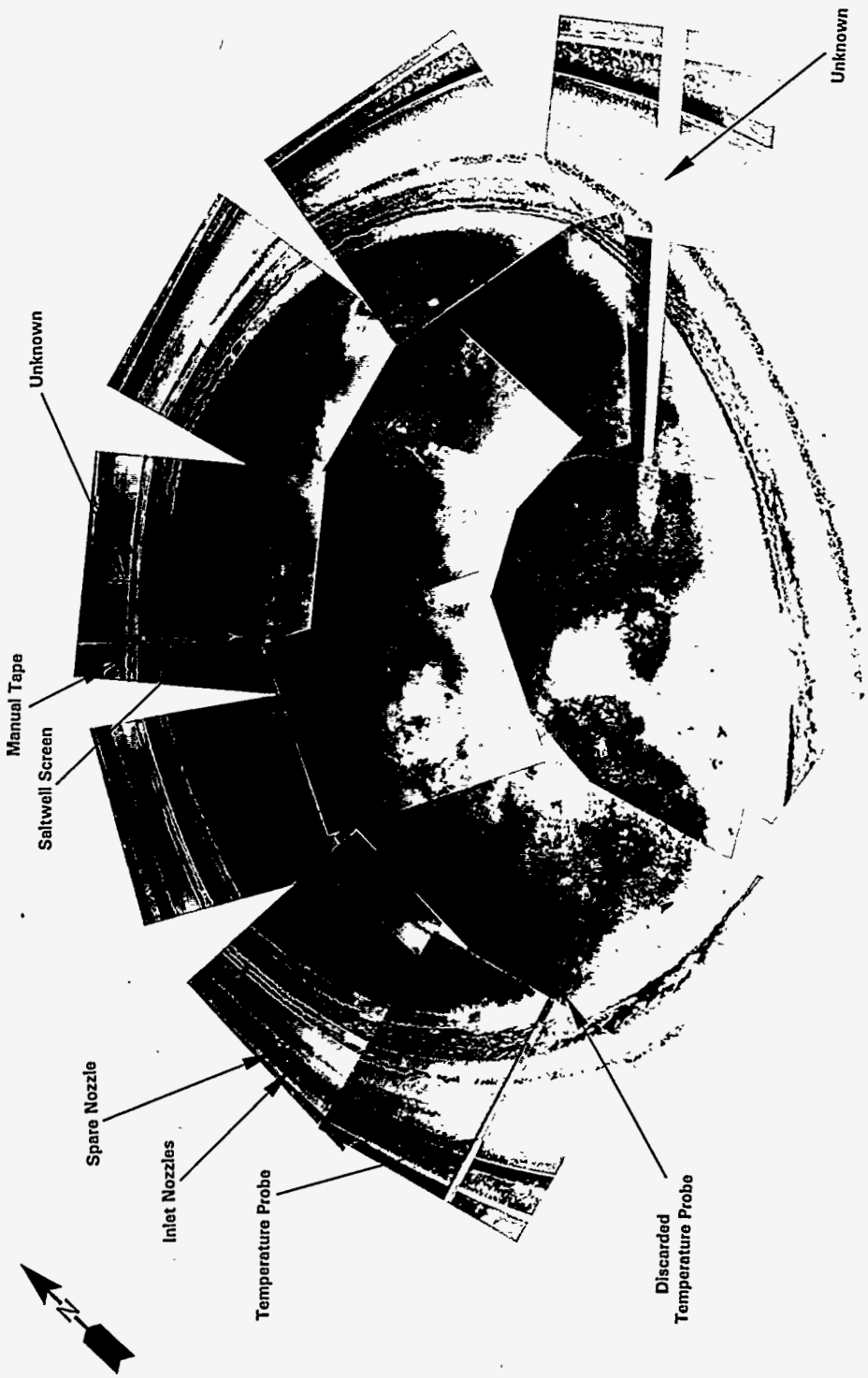
241-B-105

241-B-106

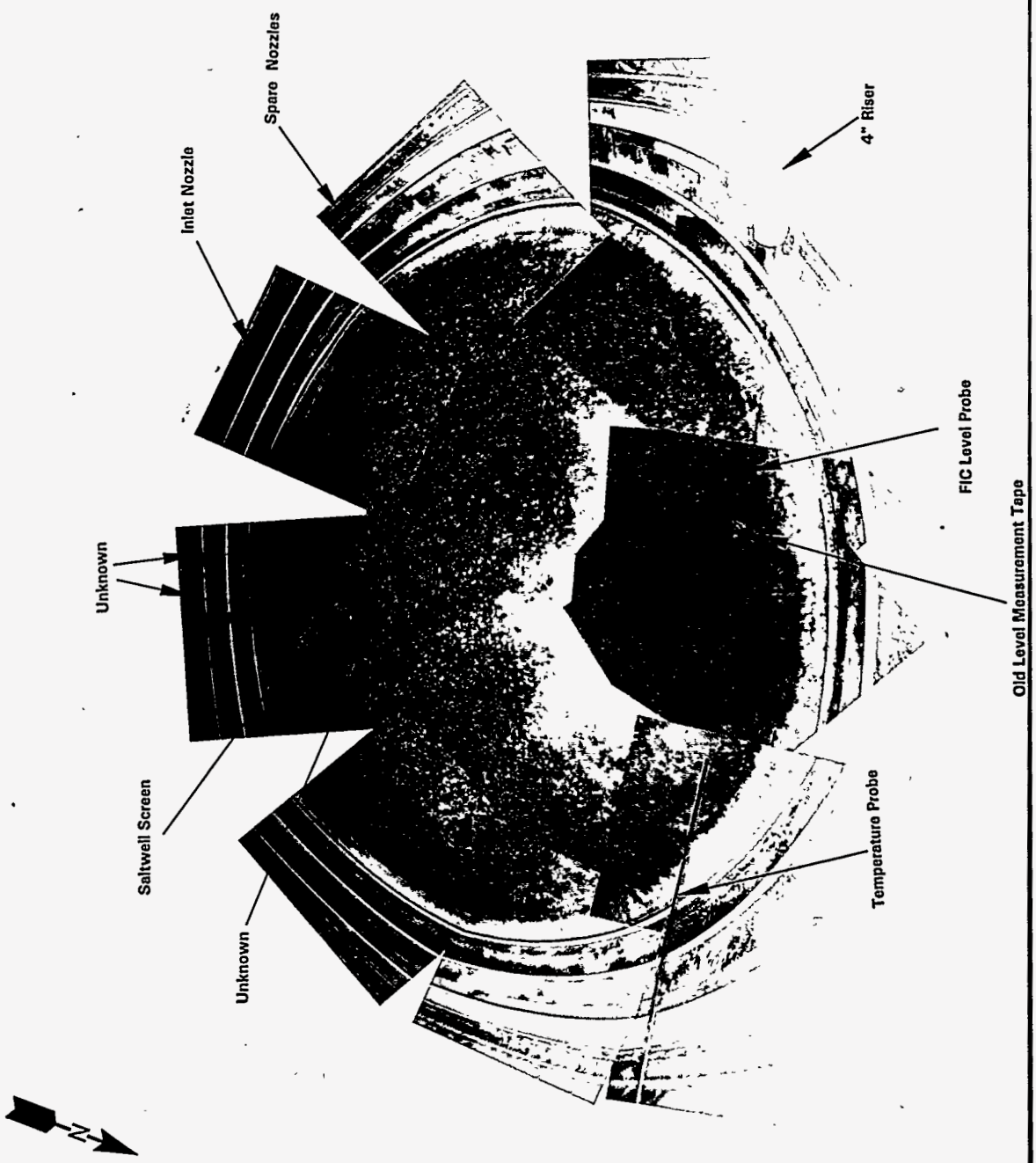
Photo date: 2-28-85



241-B-107
Photo date: 2-28-85

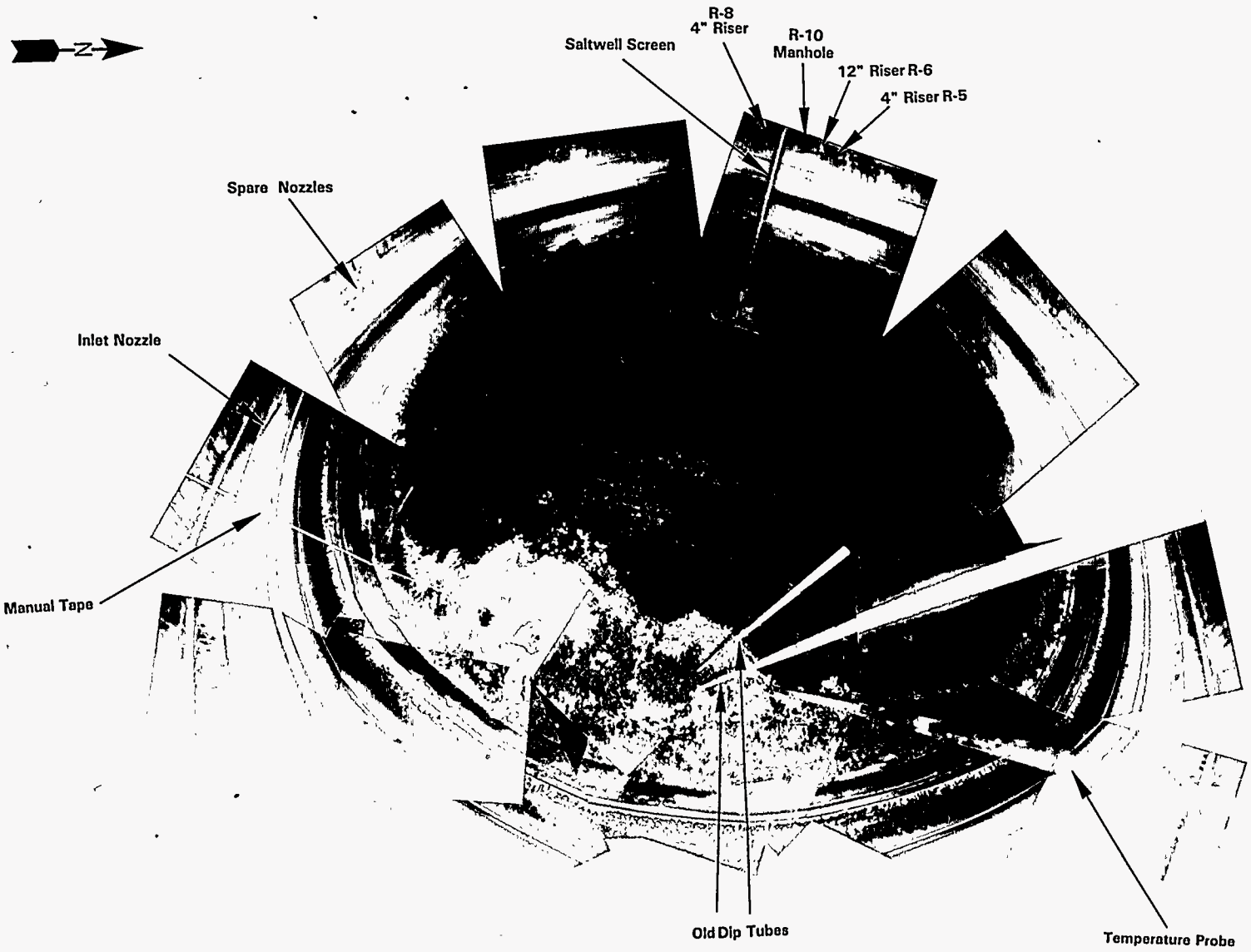


241-B-108
Photo date: 8-10-85



241-B-109

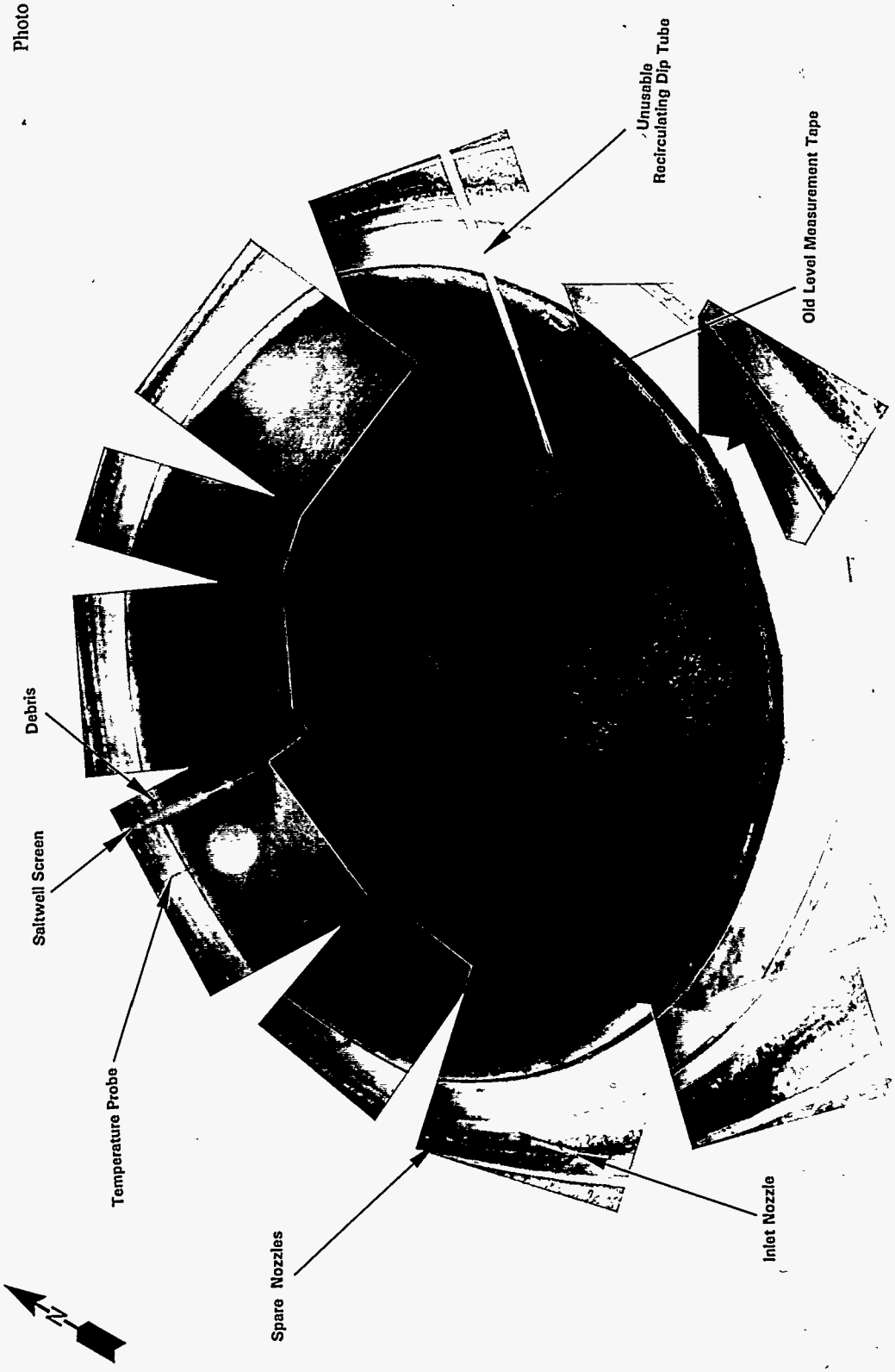
Photo date: 4-2-85



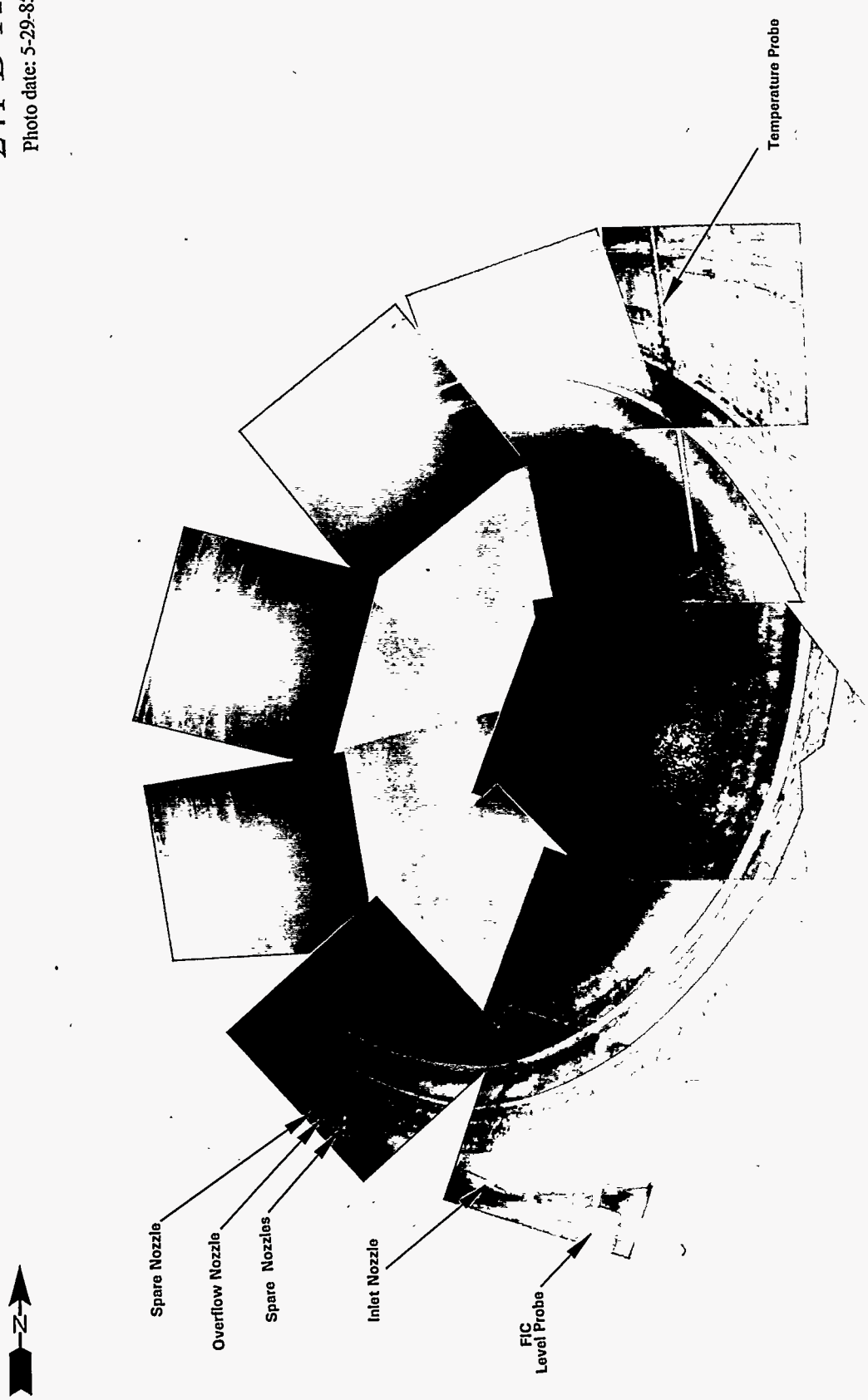
241-B-110
Photo date: 3-17-88
Old Float
Temperature Probe
Unknown
4" Riser R-4
12" Riser R-11
Saltwell Screen
Unknown
12" Riser R-3
4" Riser R-12
Liquid Level Well
N
Overflow Nozzle
4" Riser R-5
Saltwell Screen
12" Riser R-6

241-B-110

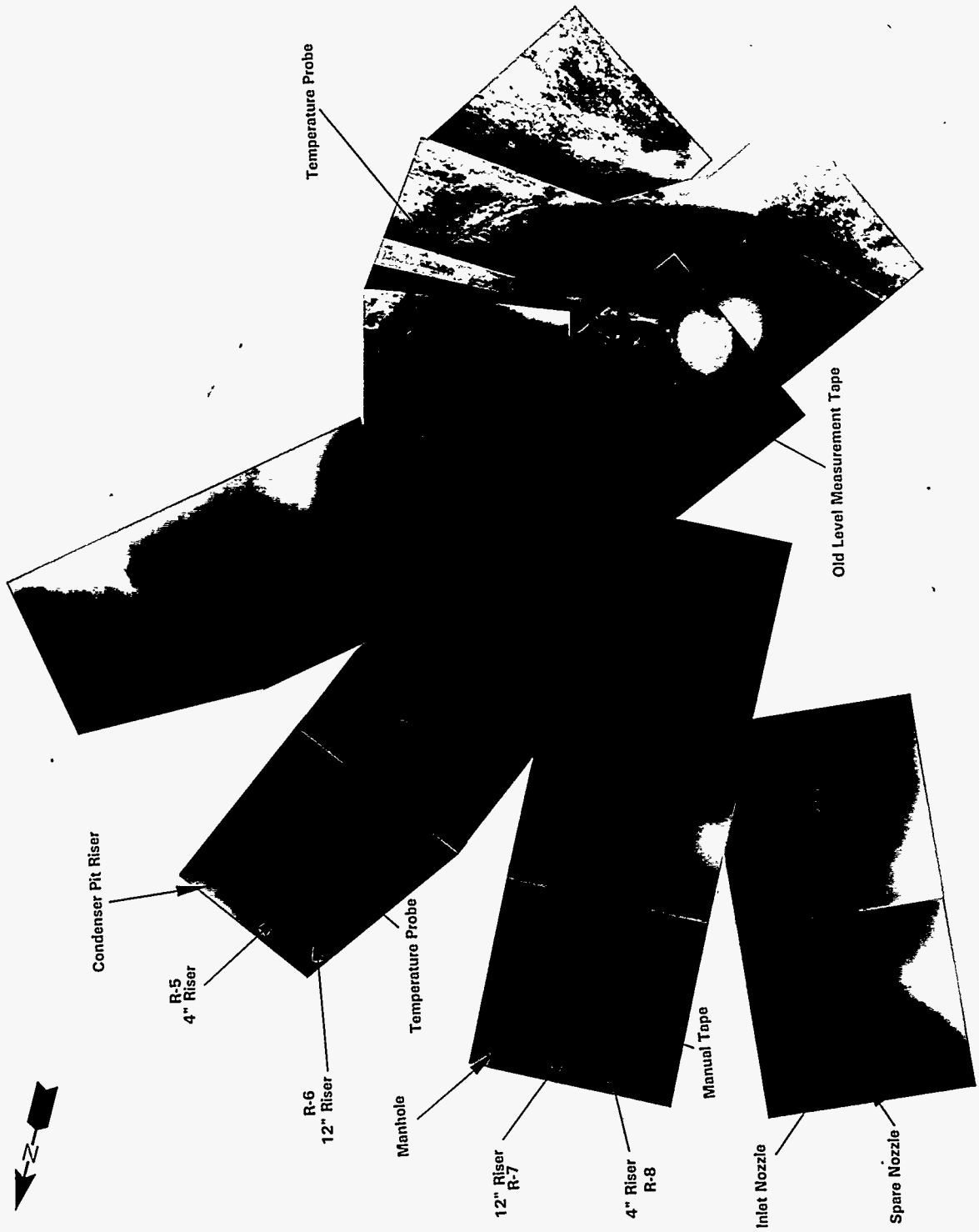
241-B-111
Photo date: 6-26-85

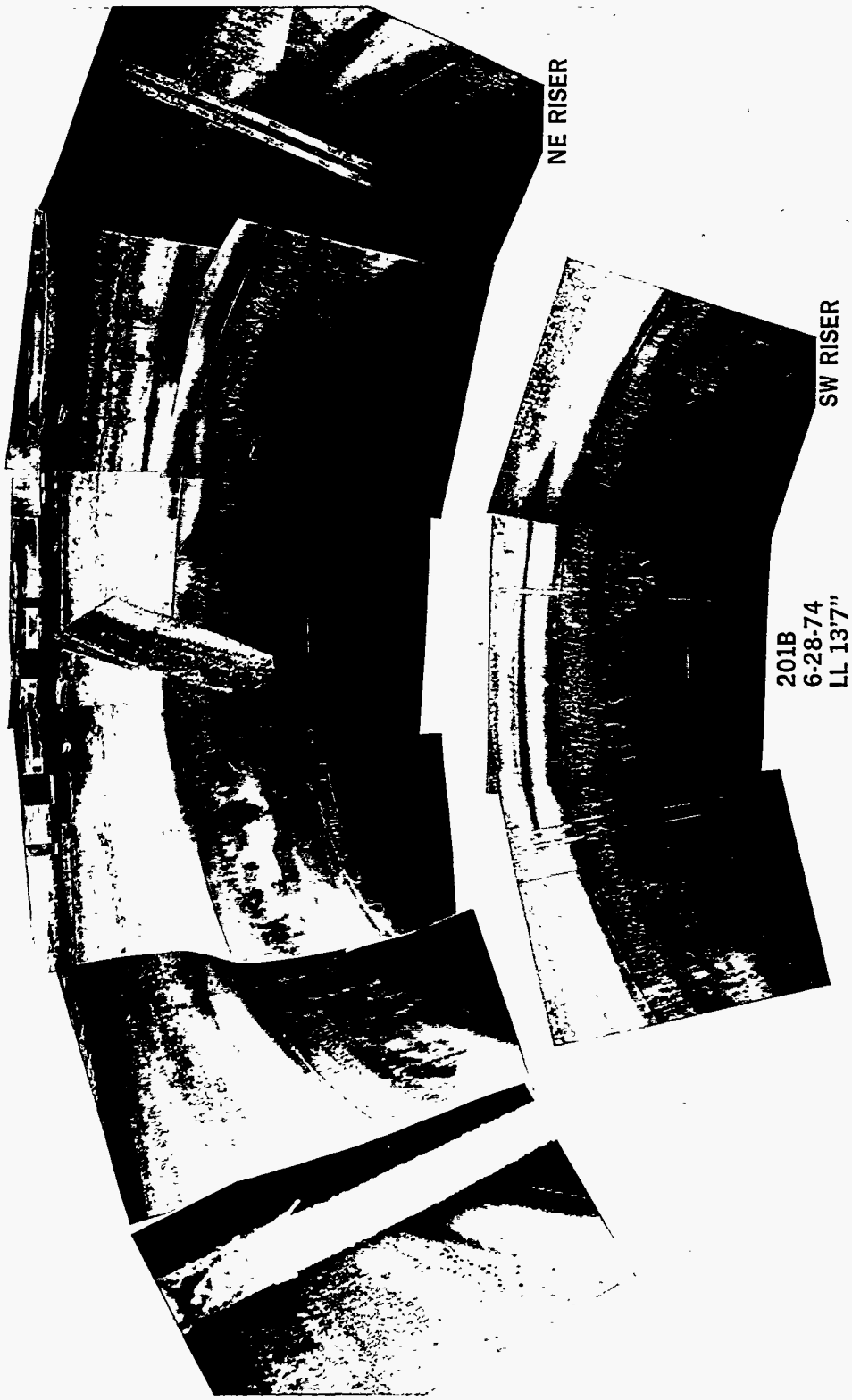


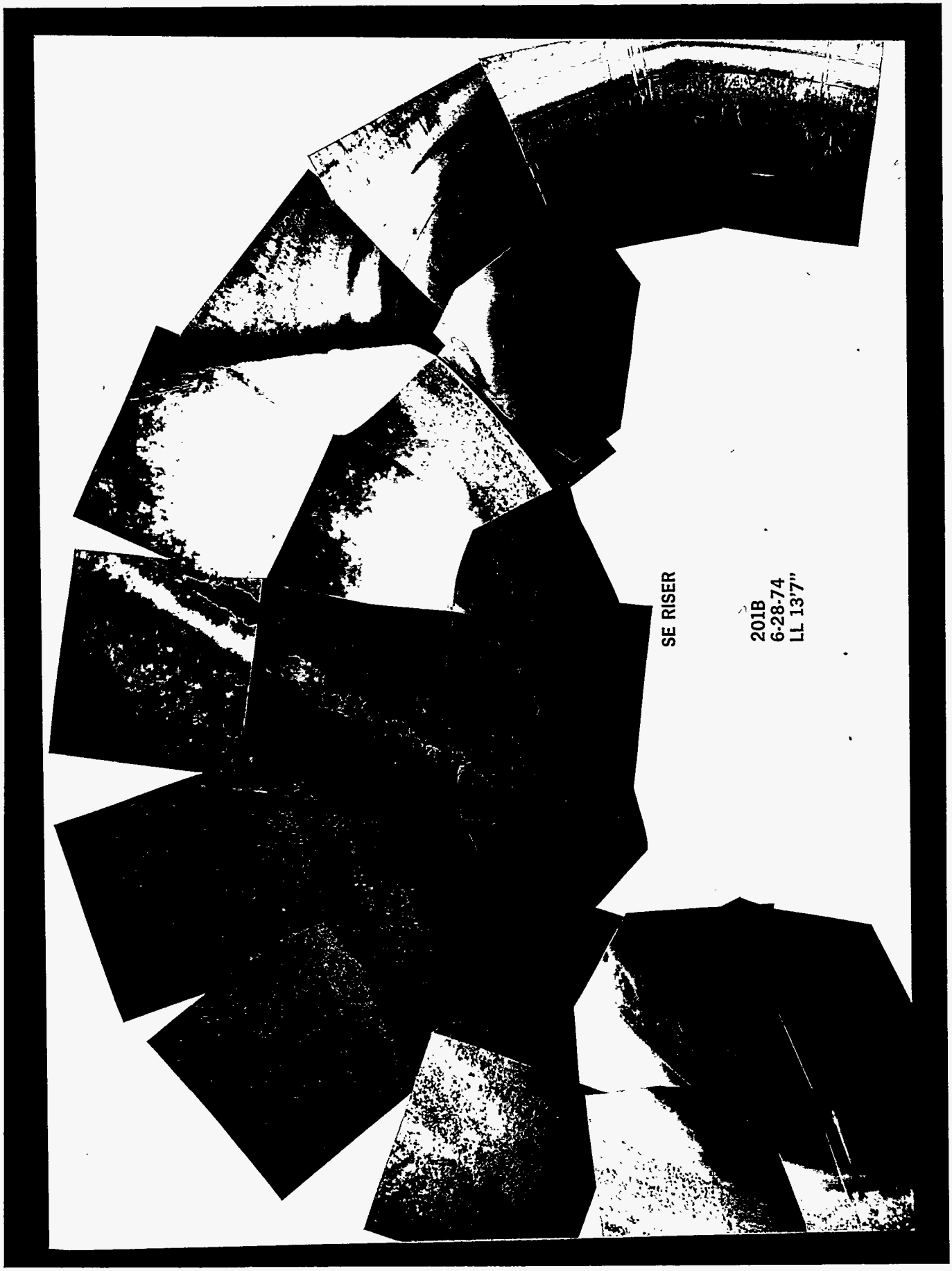
241-B-112
Photo date: 5-29-85



241-B-201
Photo date: 11-12-86

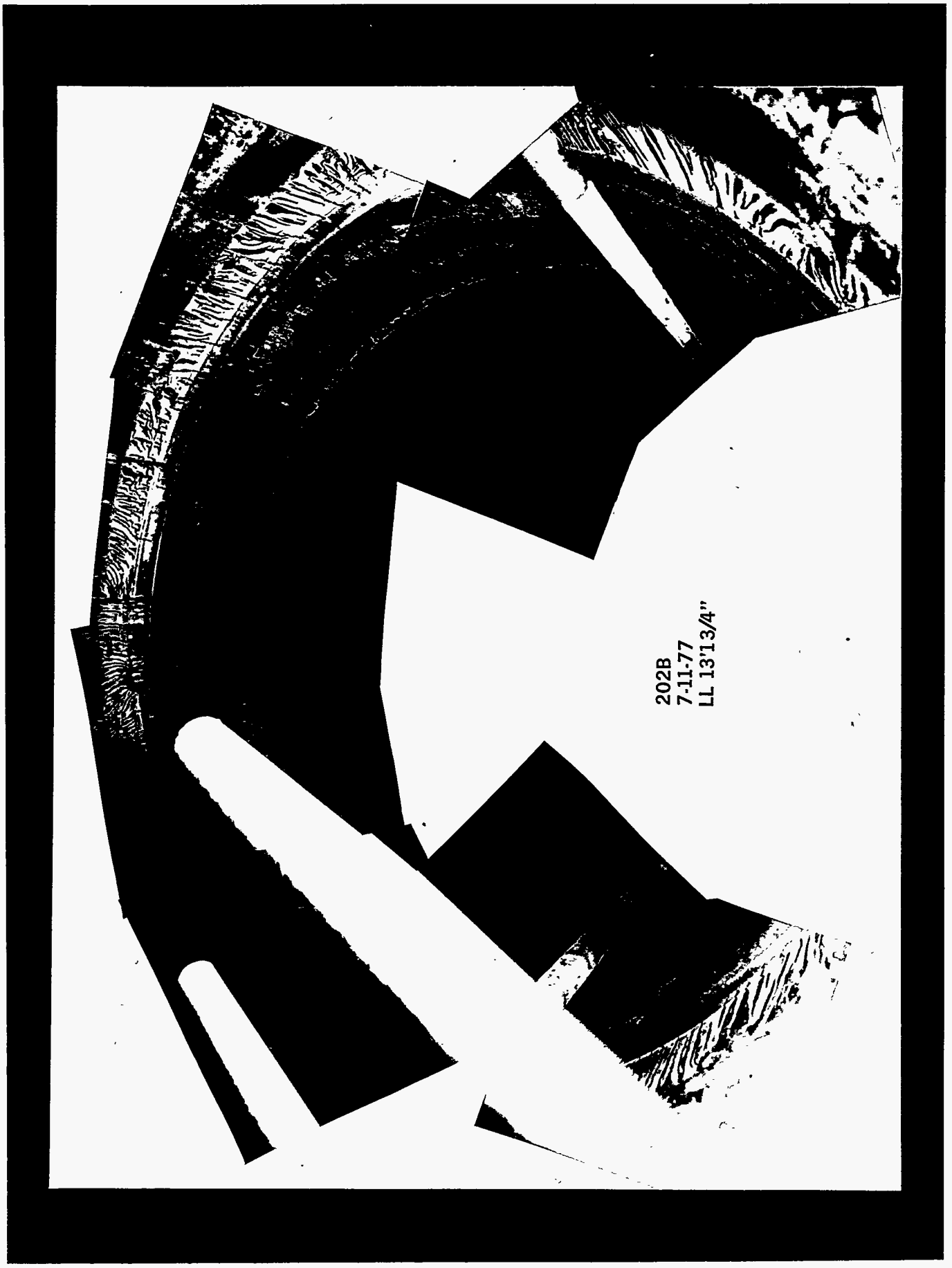


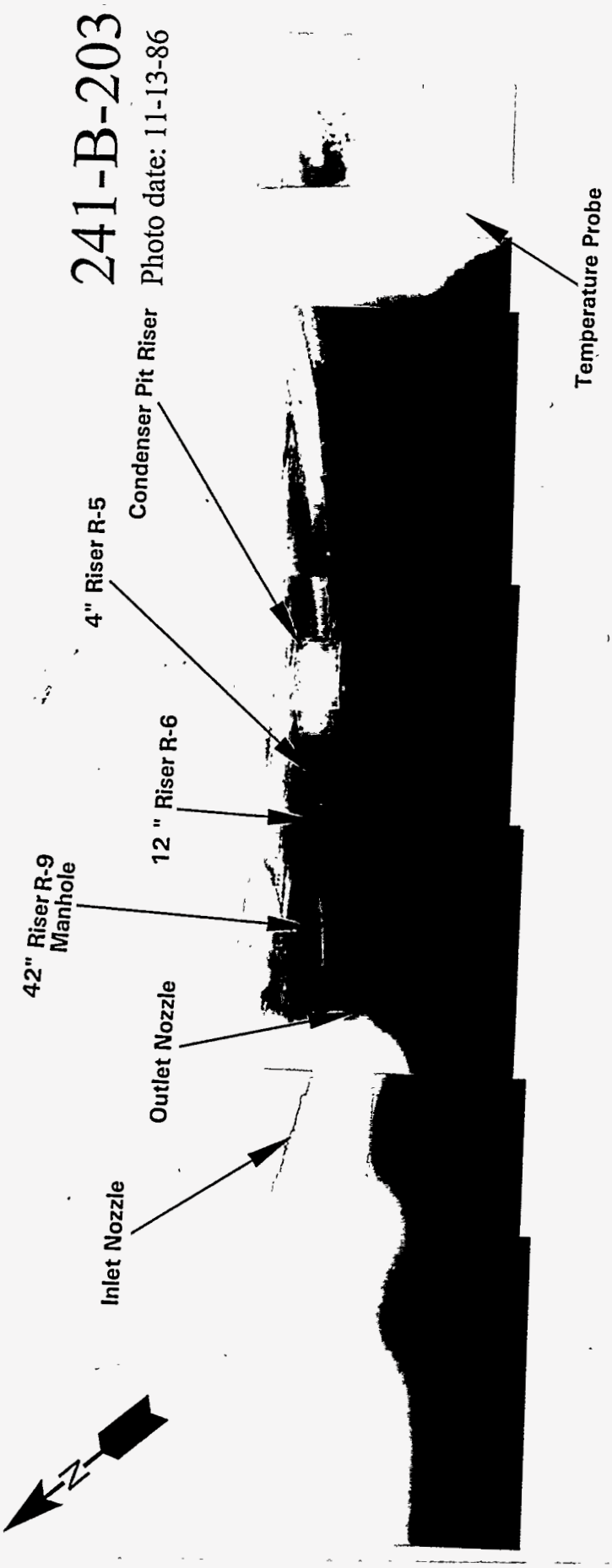

NE RISER
SW RISER
201B
6-28-74
LL 13'7"

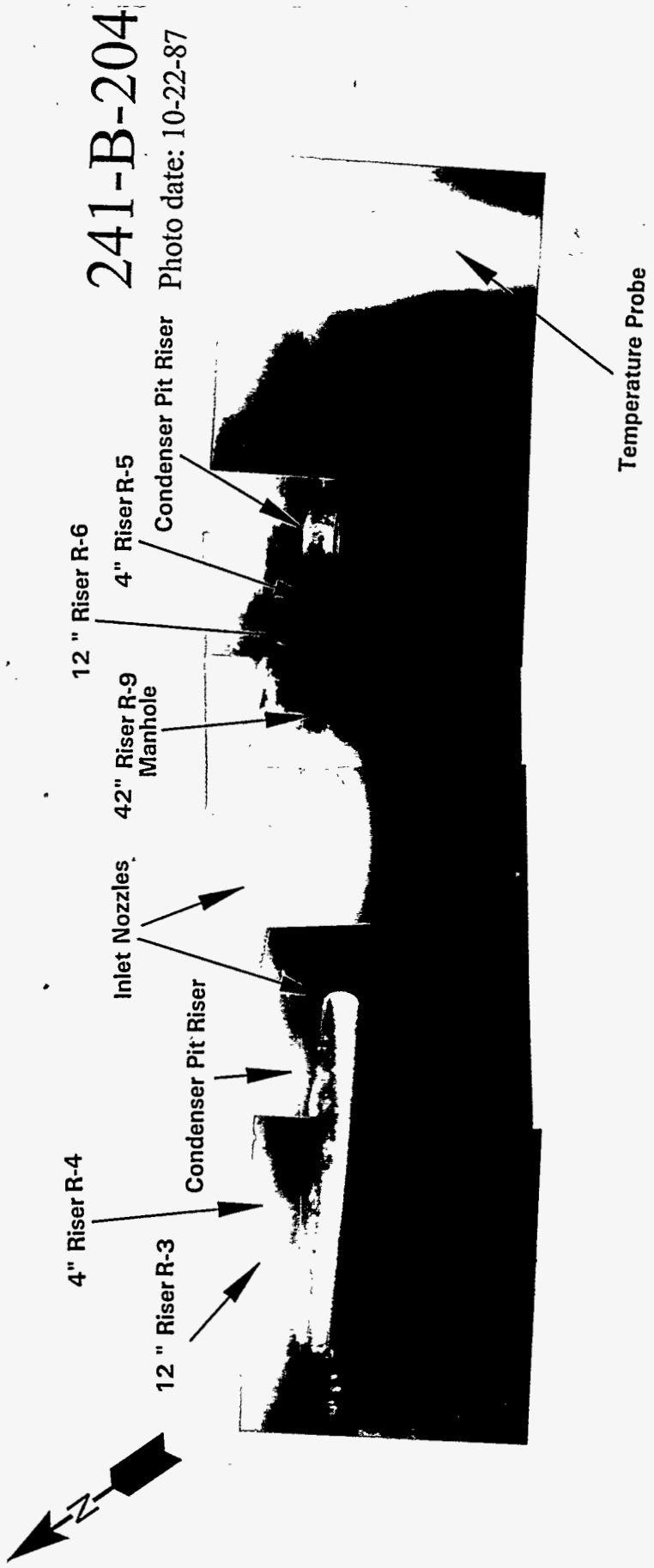

SE RISER
201B
6-28-74
LL 13'7"

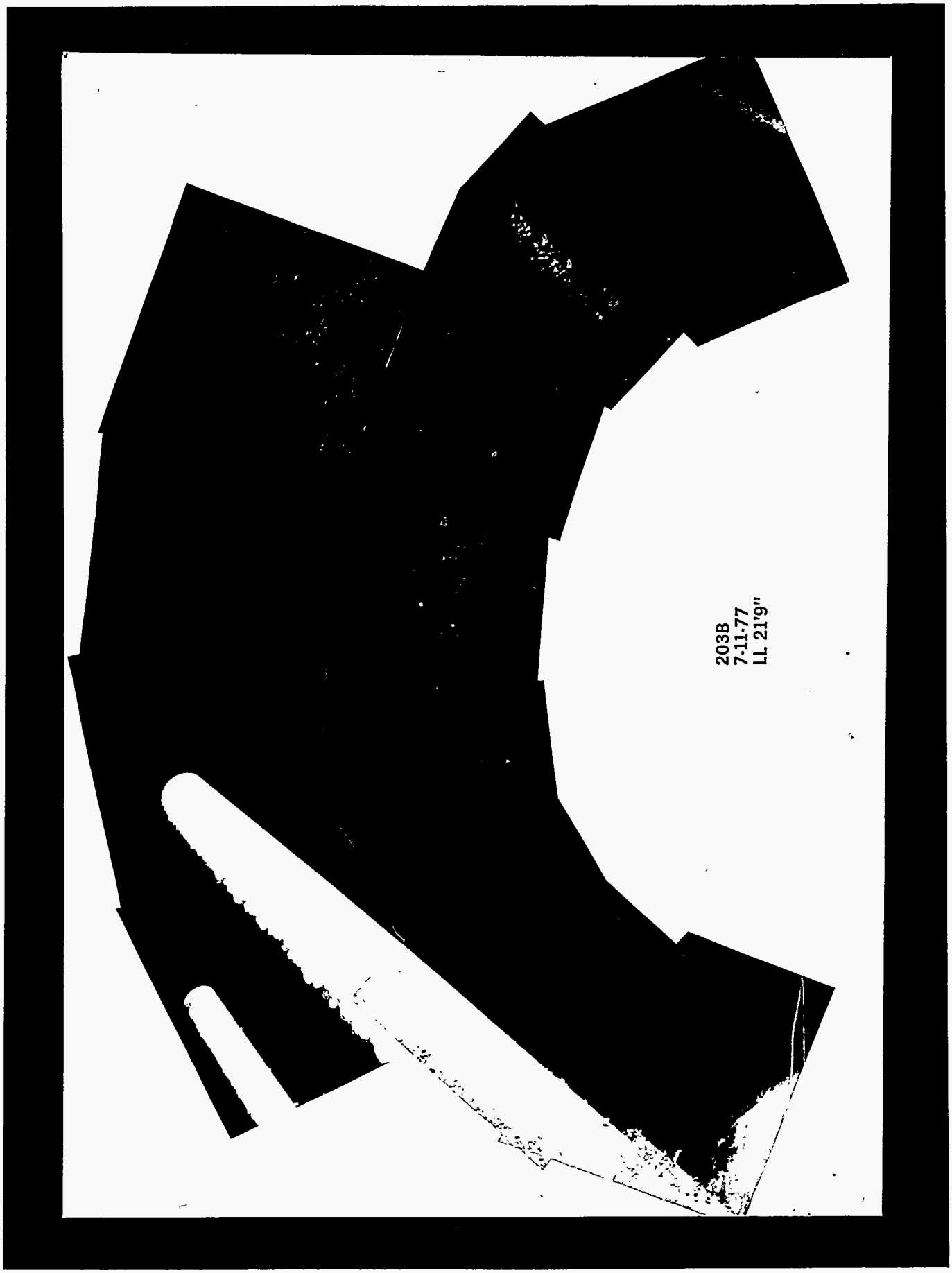
241-B-202
Photo date: 5-29-85
Temperature Probe
Temperature Probe
N

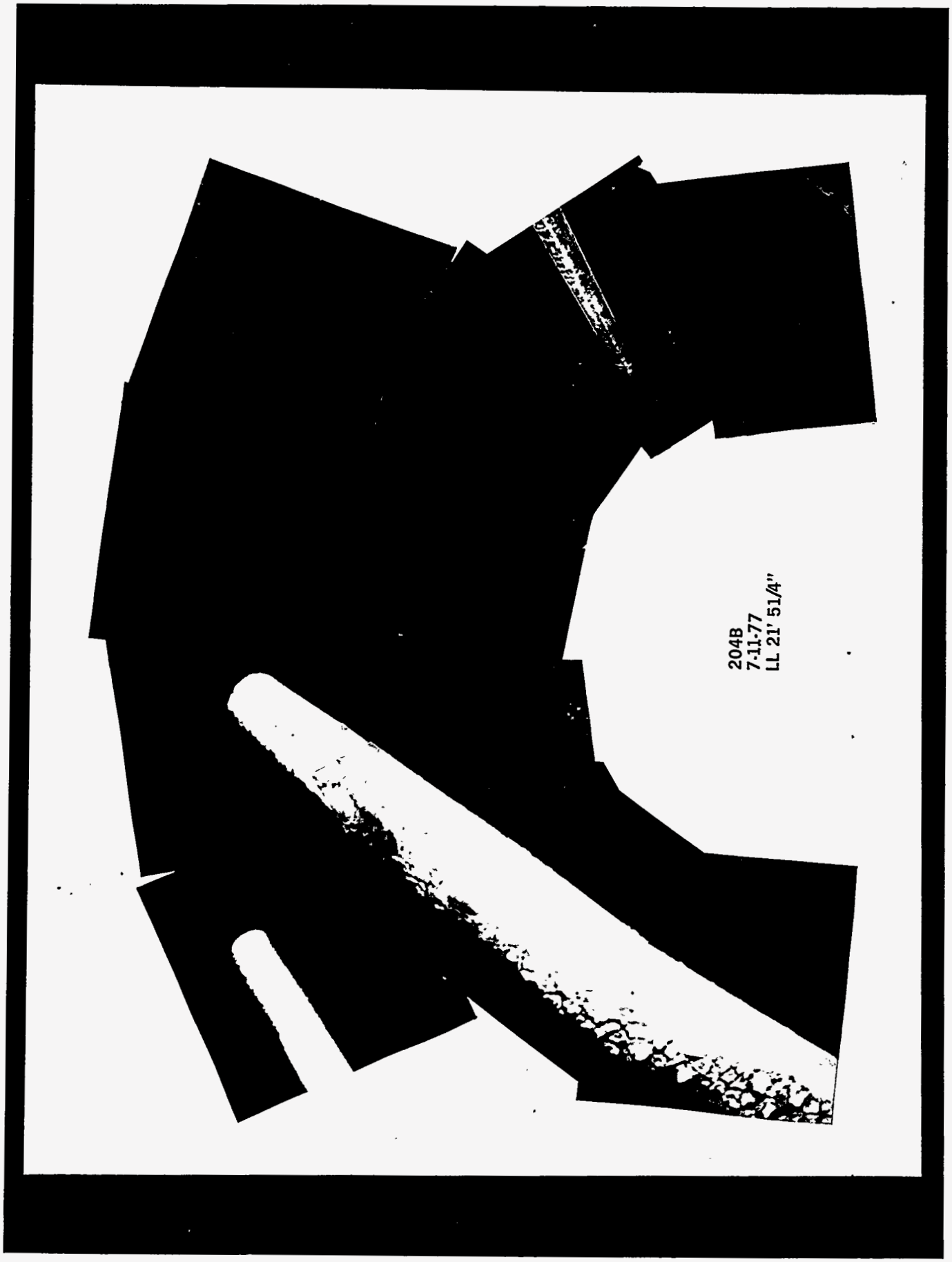
202B
9-6-77
LL 11'73/4"

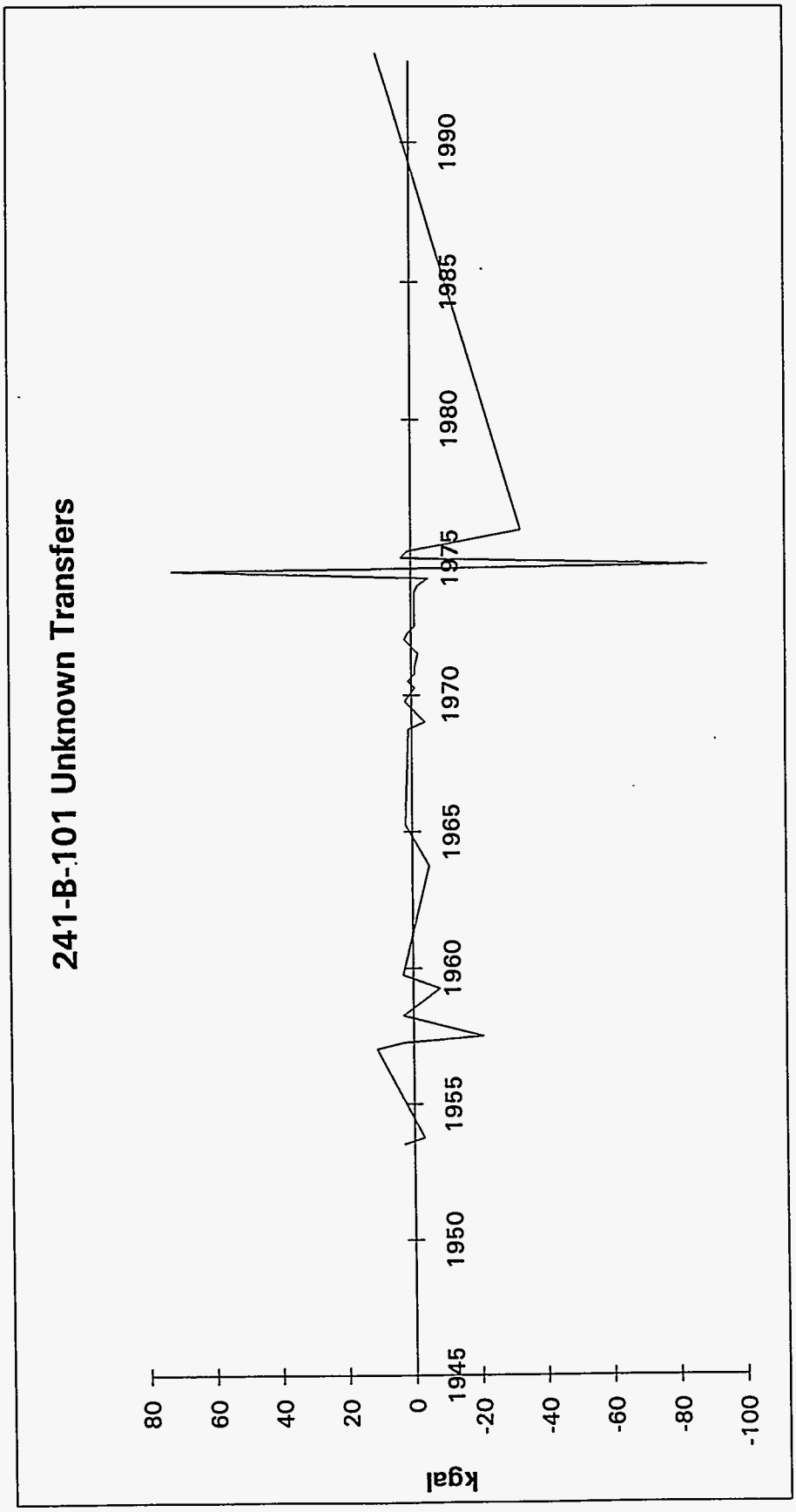

202B
7-11-77
LL 13'13/4"


241-B-203
Photo date: 11-13-86
Condenser Pit Riser
4" Riser R-5
12 " Riser R-6
42" Riser R-9
Manhole
Outlet Nozzle
Inlet Nozzle
Temperature Probe
N

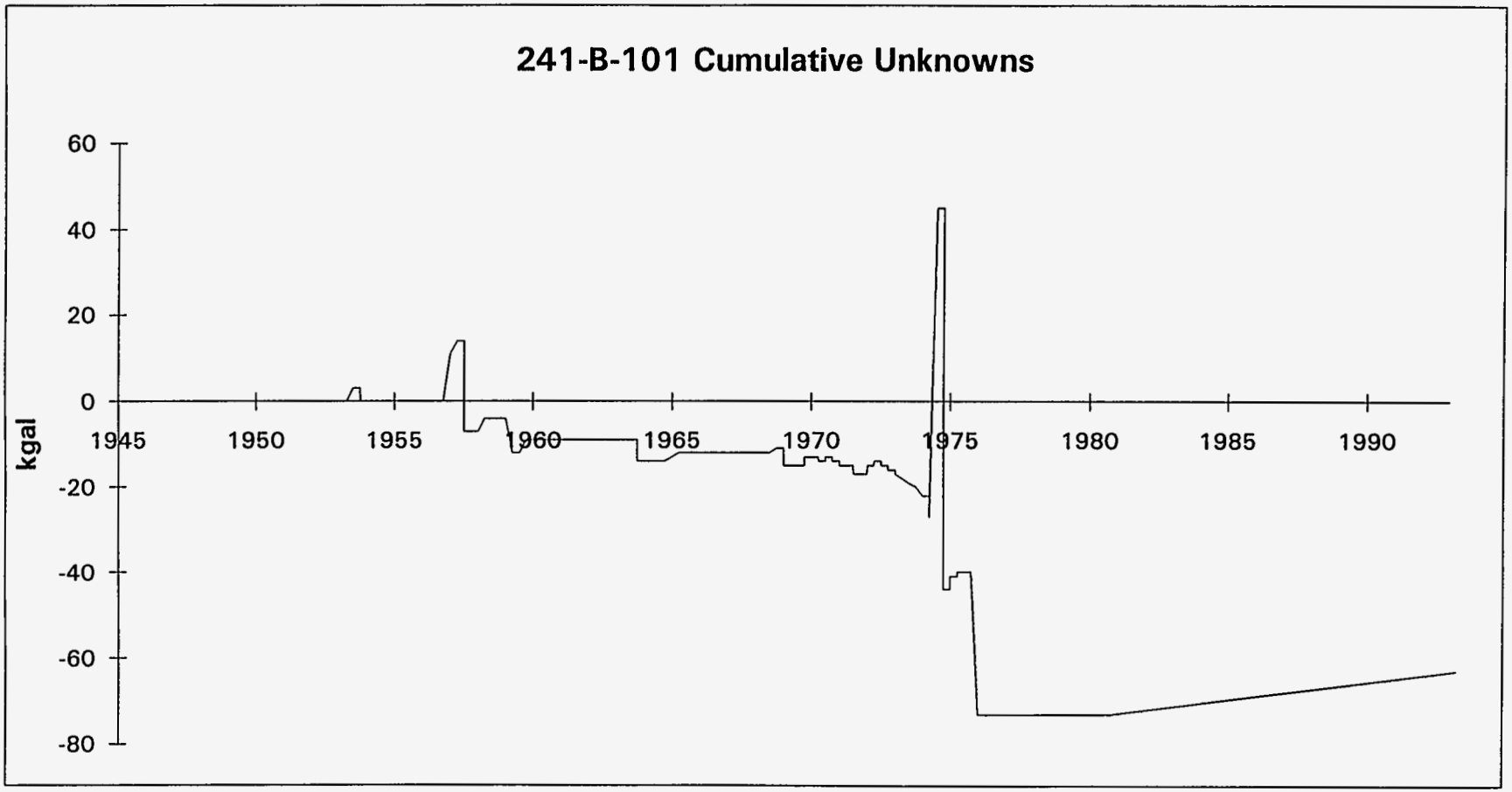

241-B-204
Photo date: 10-22-87
Temperature Probe
Condenser Pit Riser
4" Riser R-5
12 " Riser R-6
42" Riser R-9
Manhole
Inlet Nozzles
Condenser Pit Riser
4" Riser R-4
12 " Riser R-3
N


203B
7-11-77
LL 21'9"

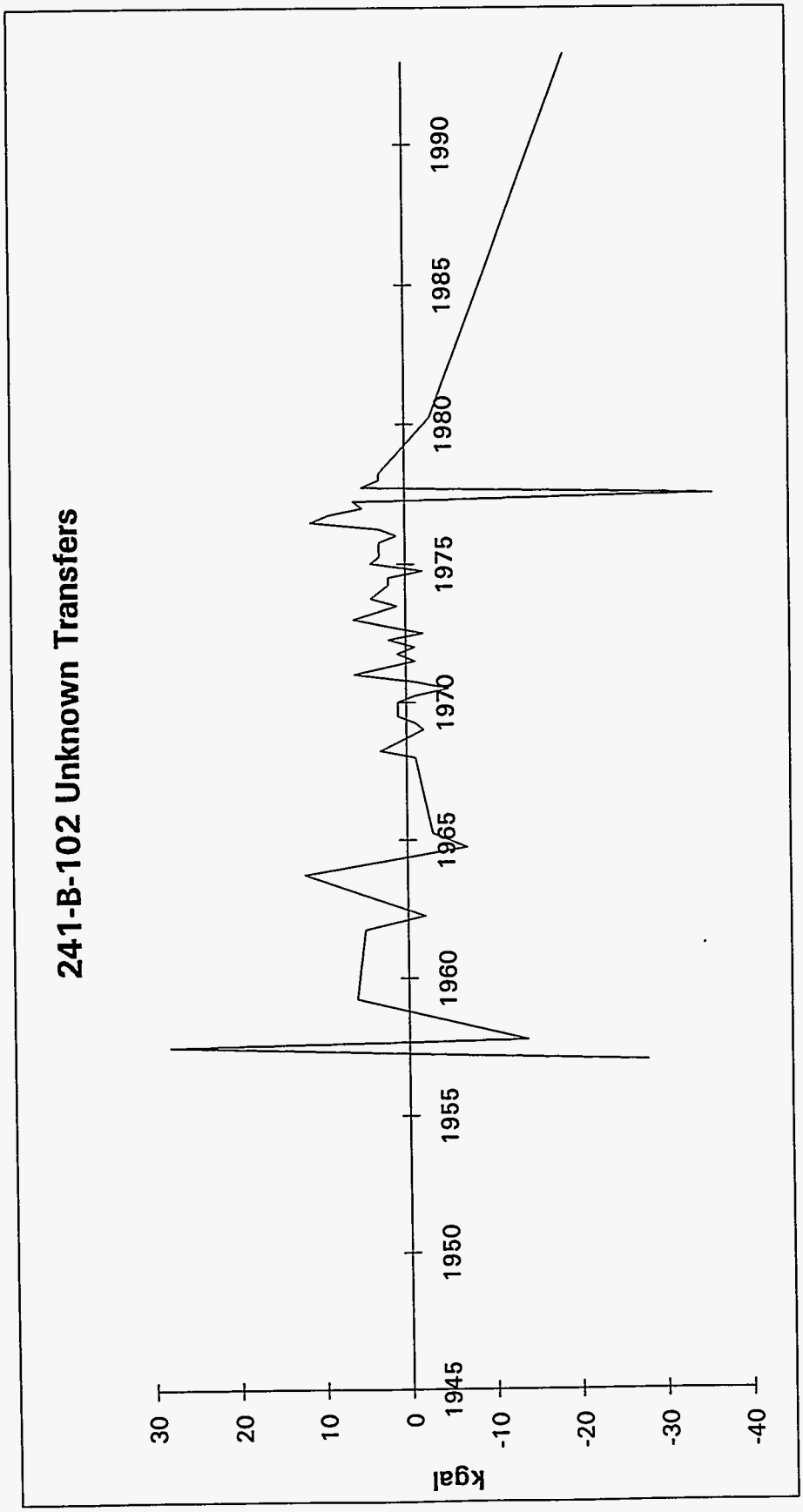

204B
7-11-77
LL 21' 51/4"



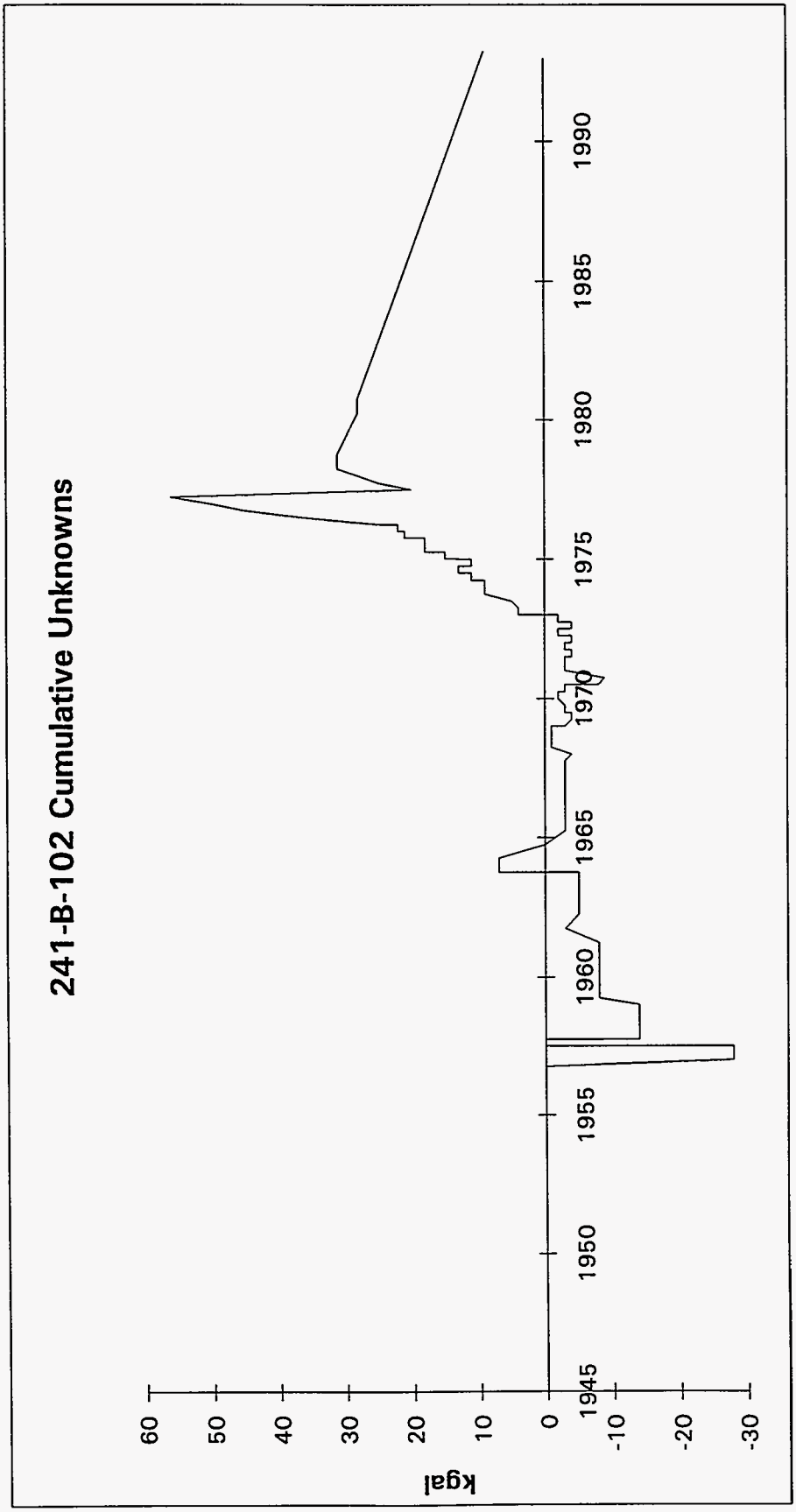
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



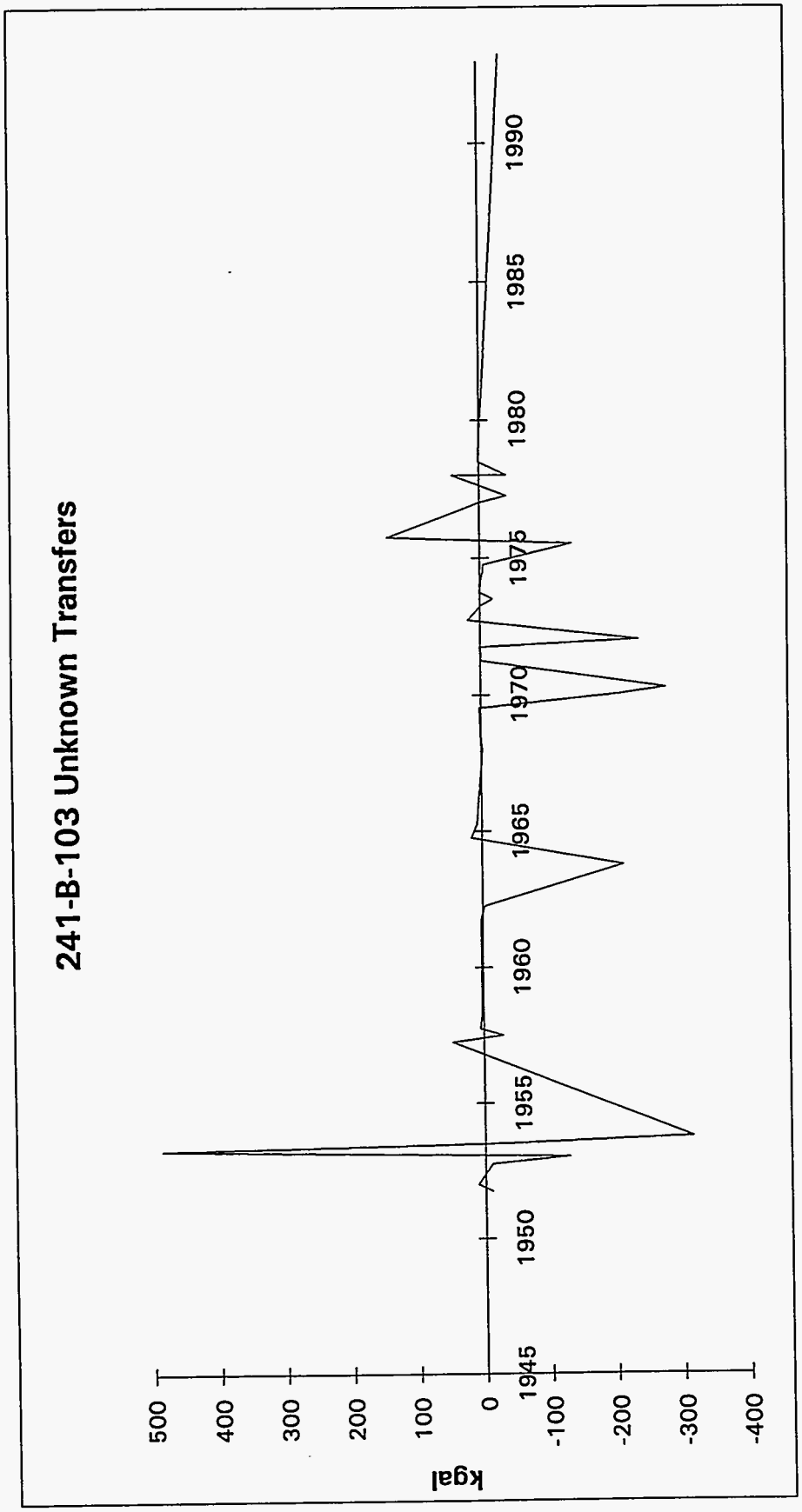
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



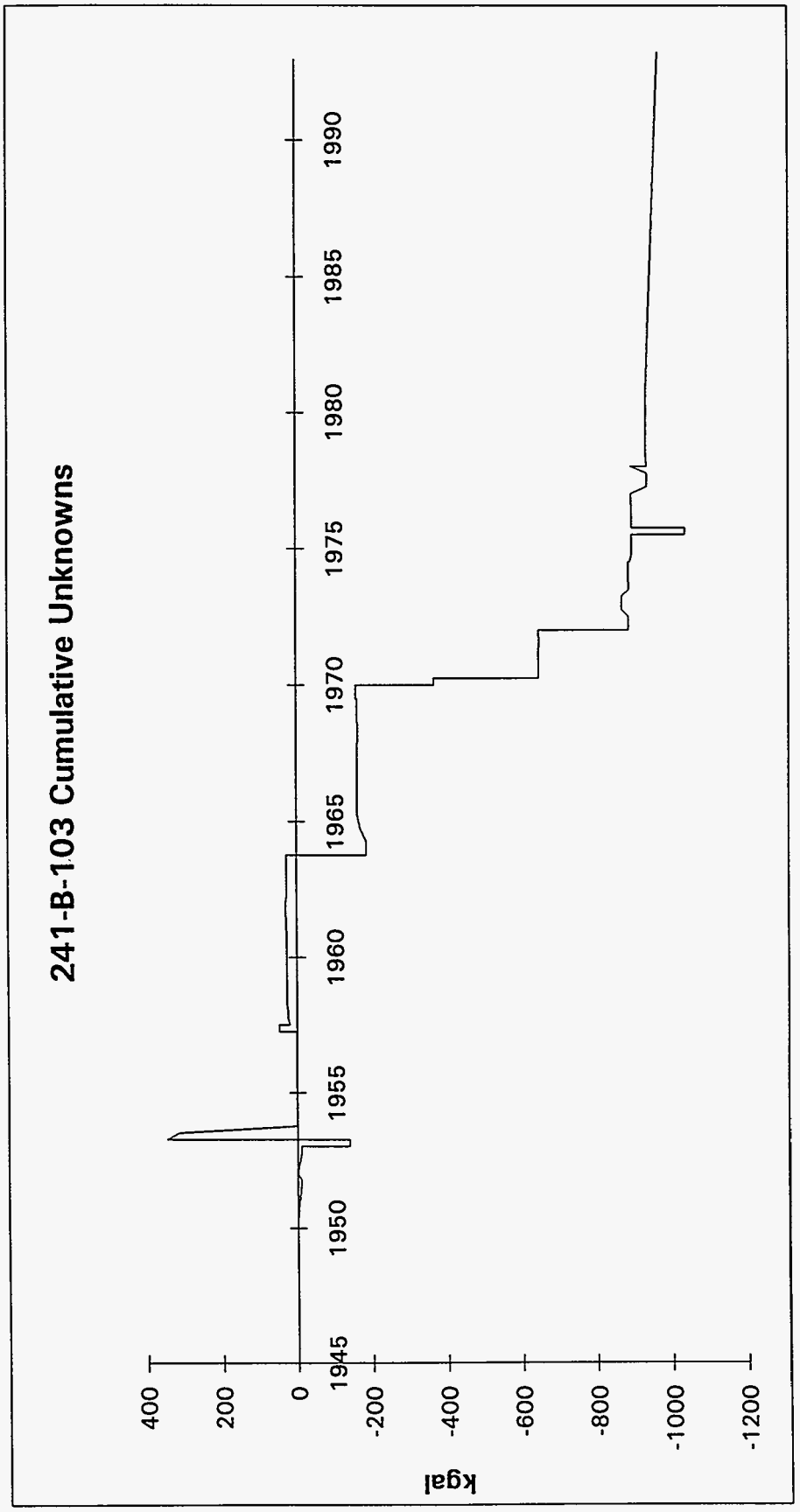
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



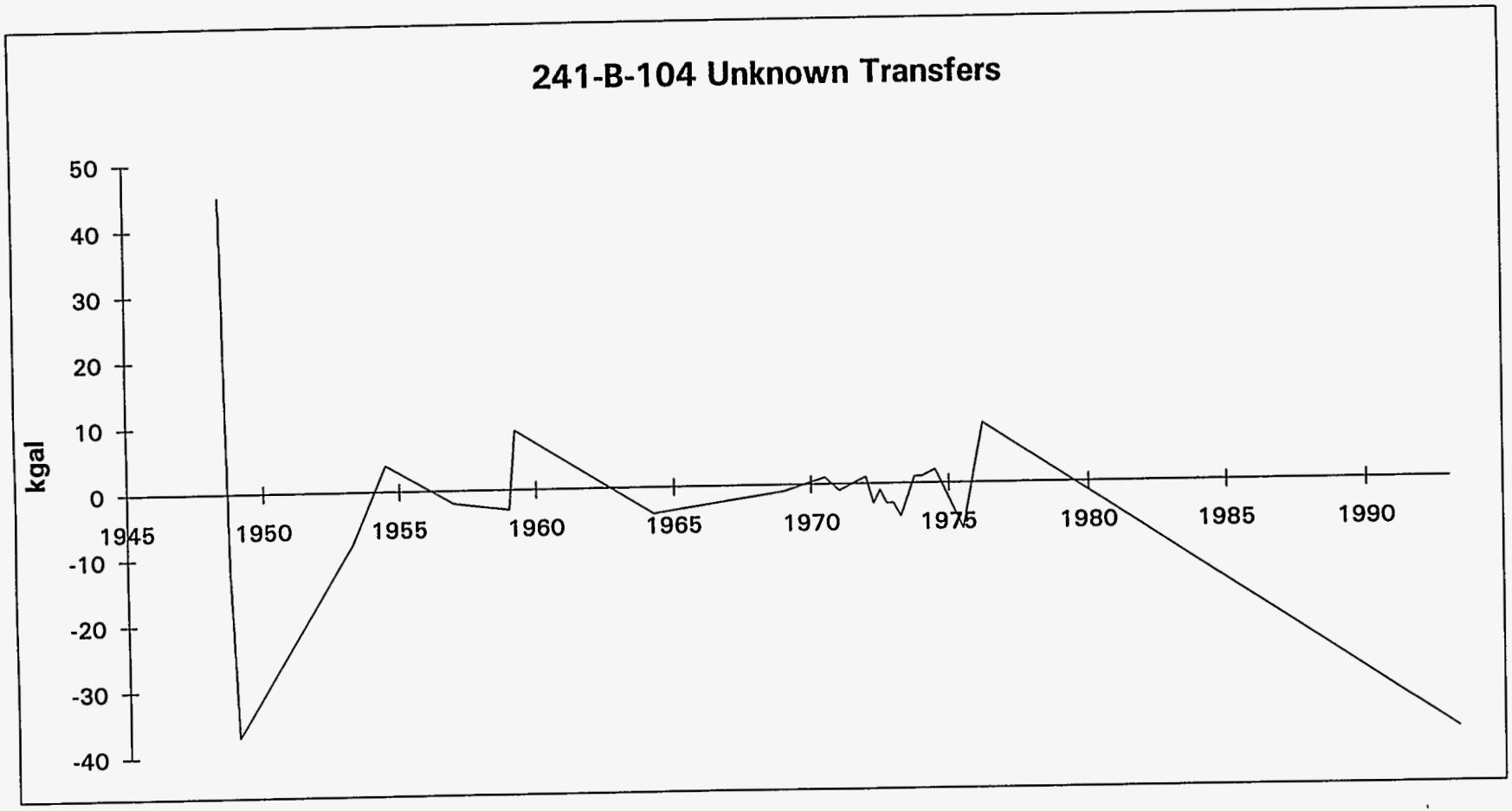
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



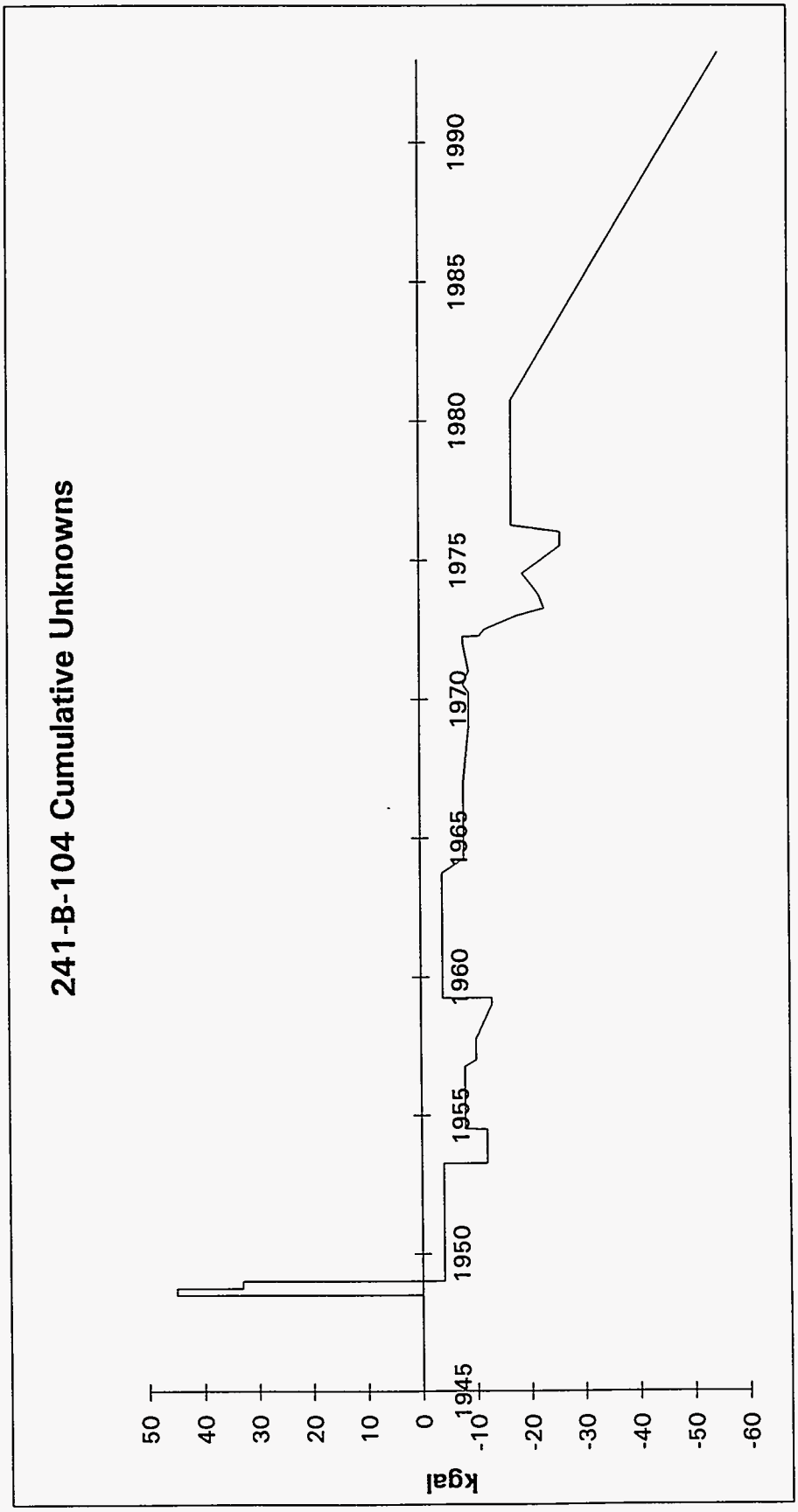
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



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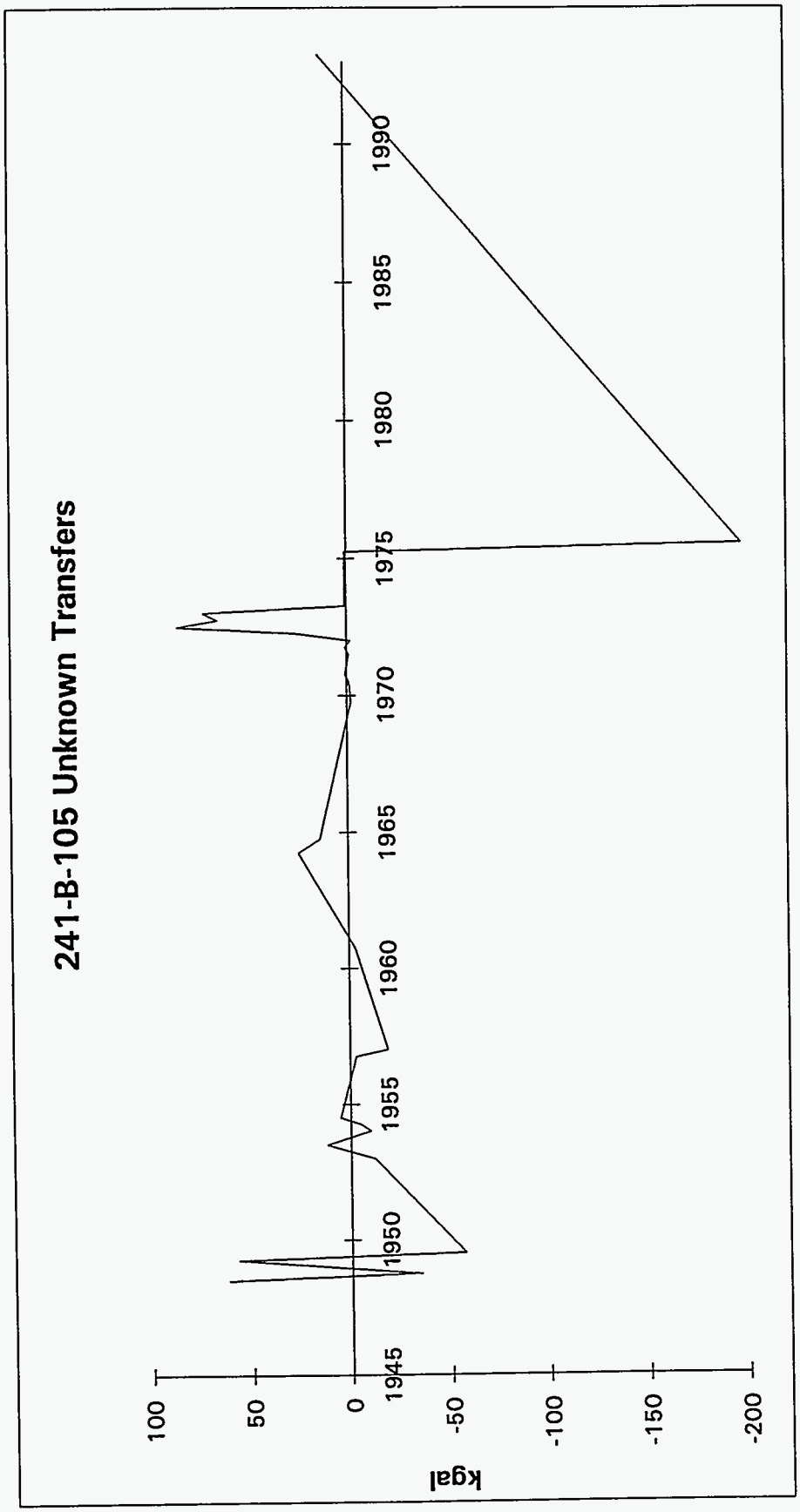

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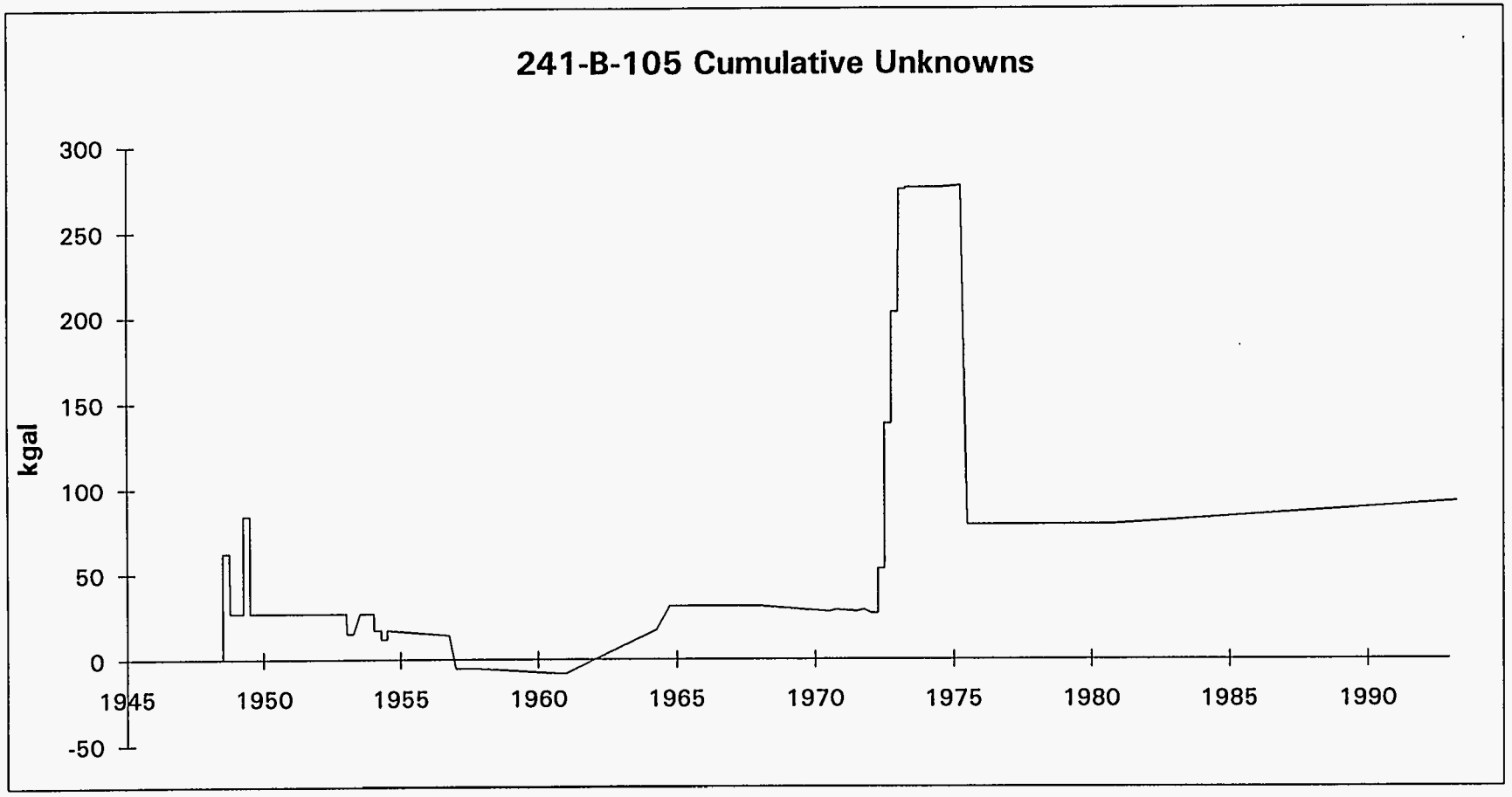

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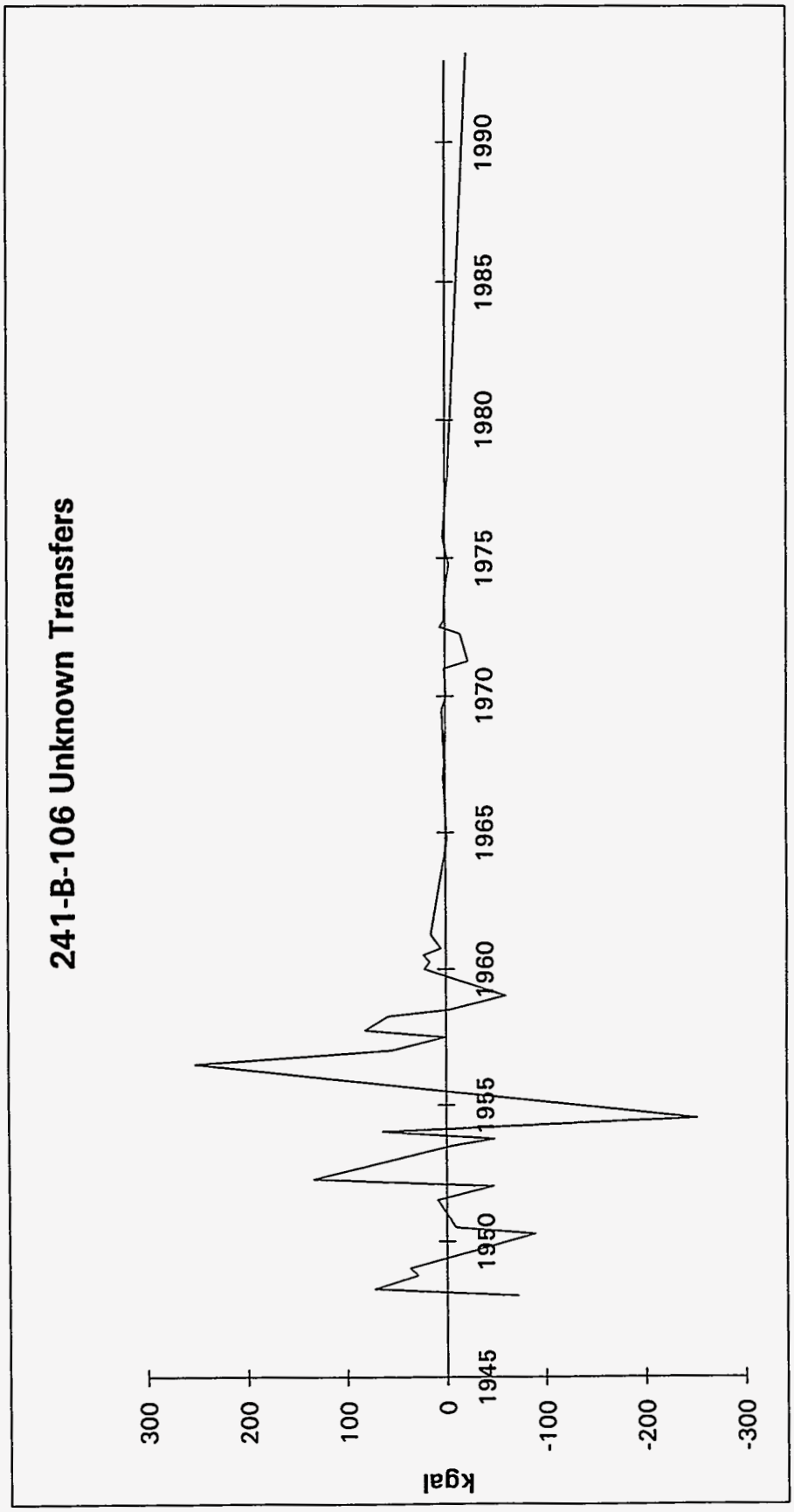

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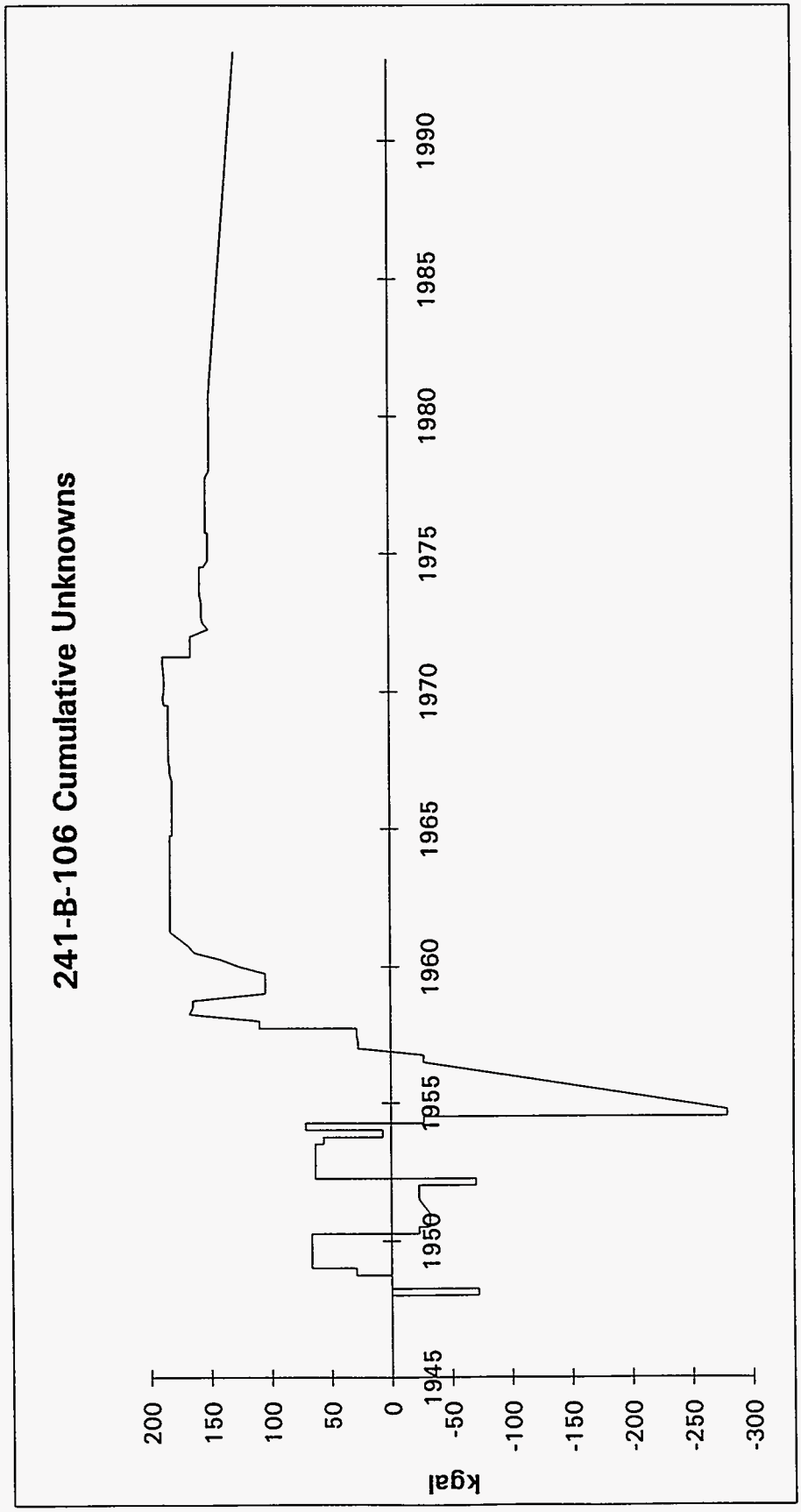
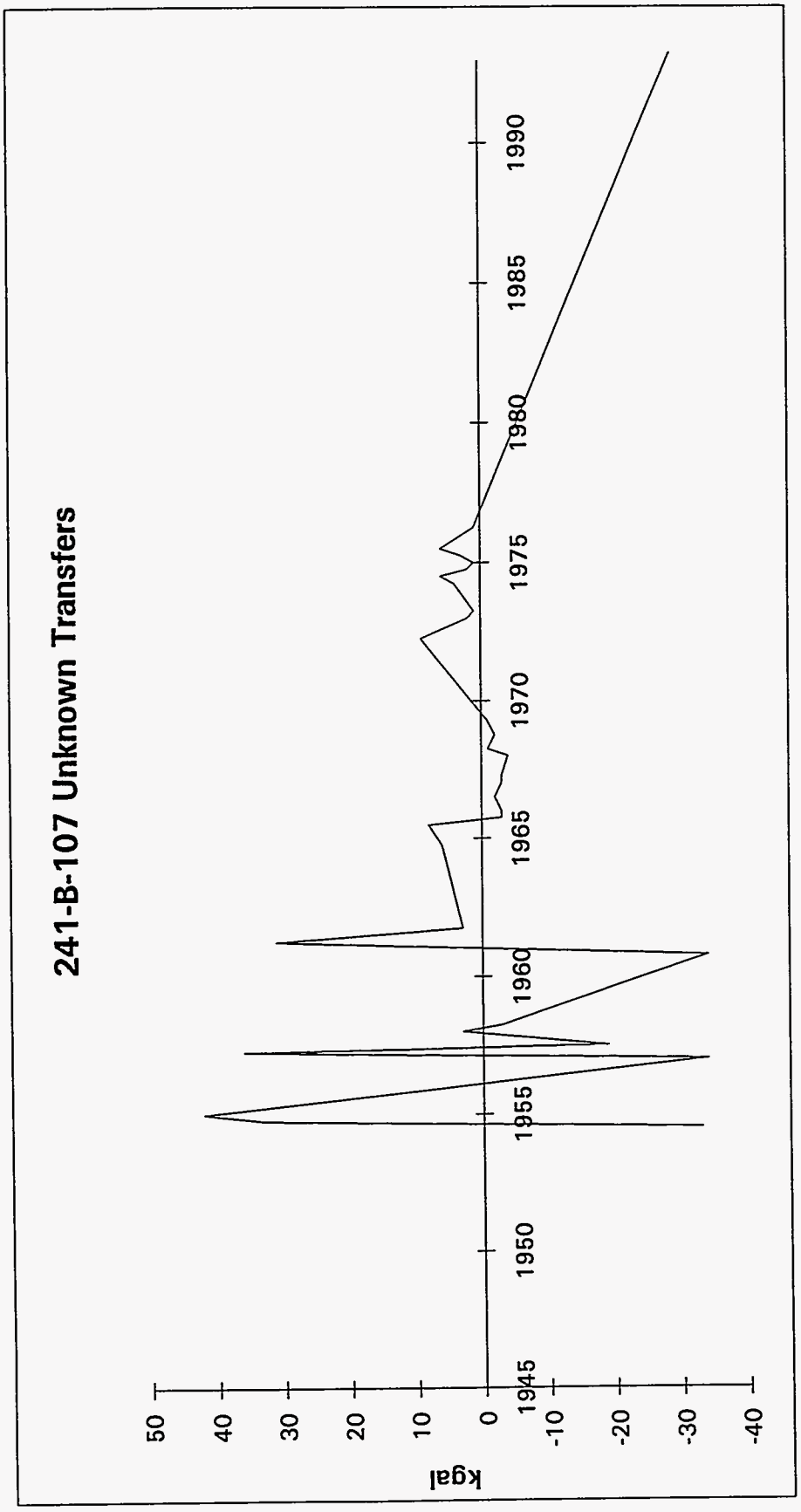
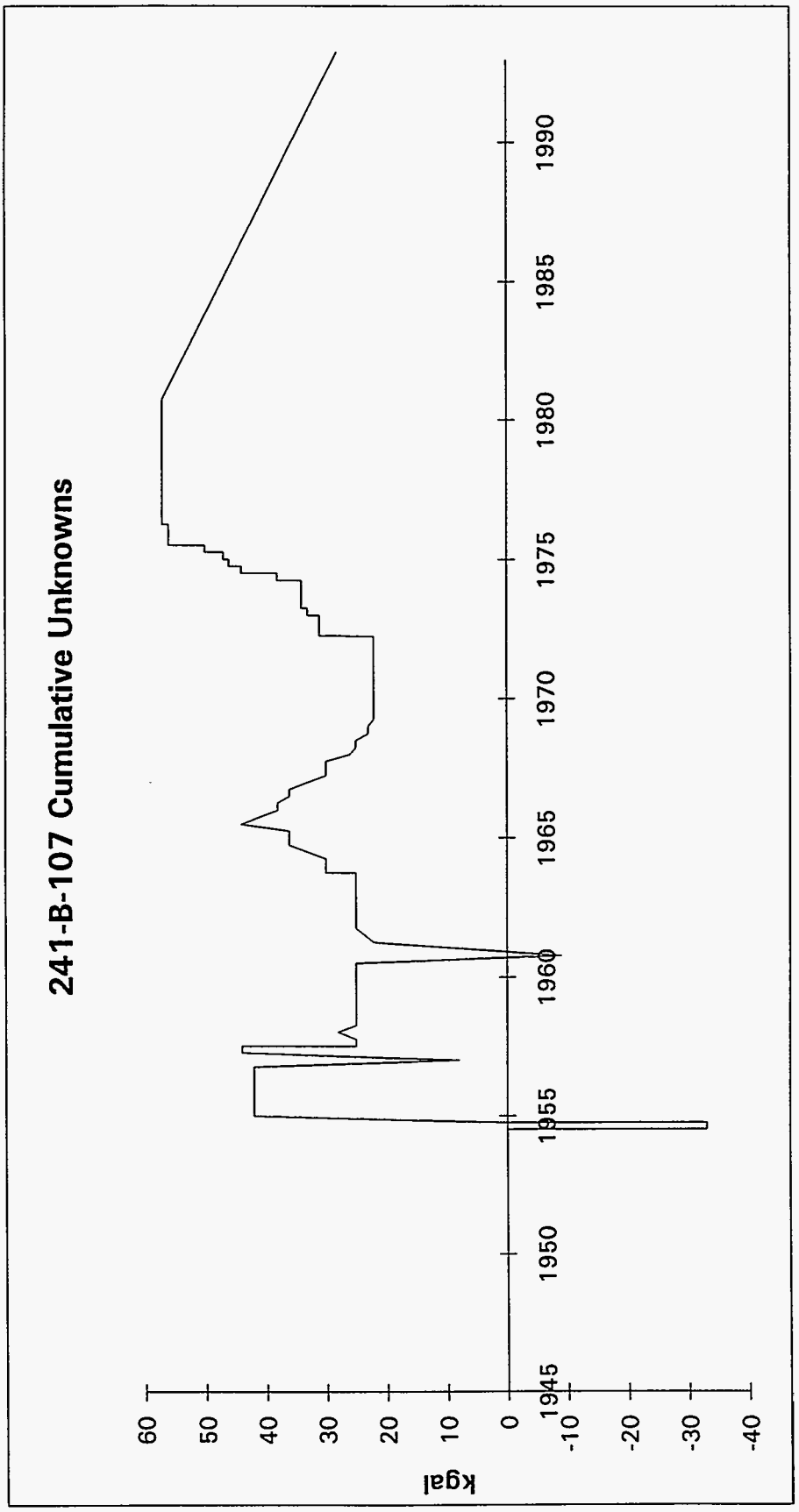


Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



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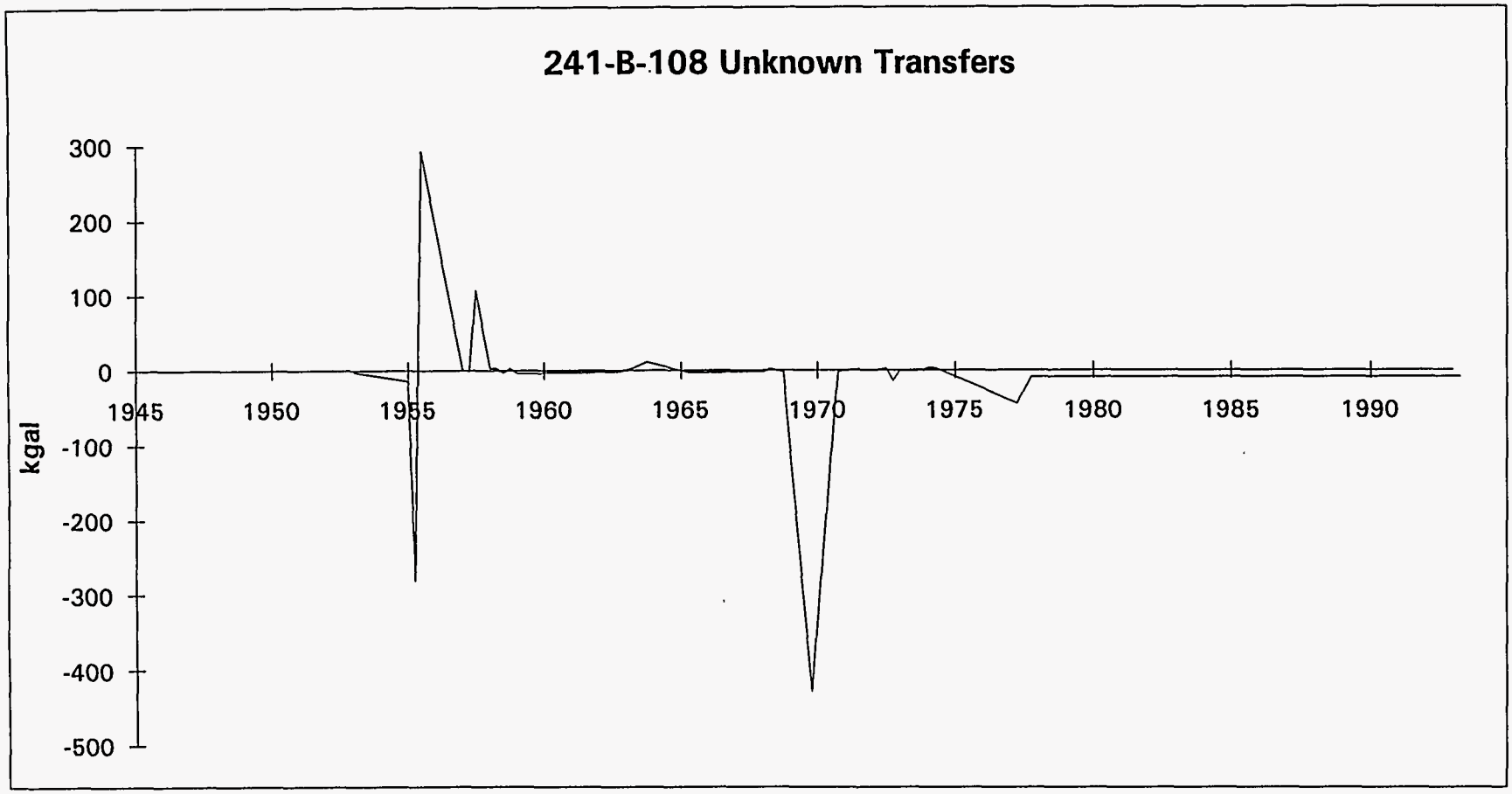

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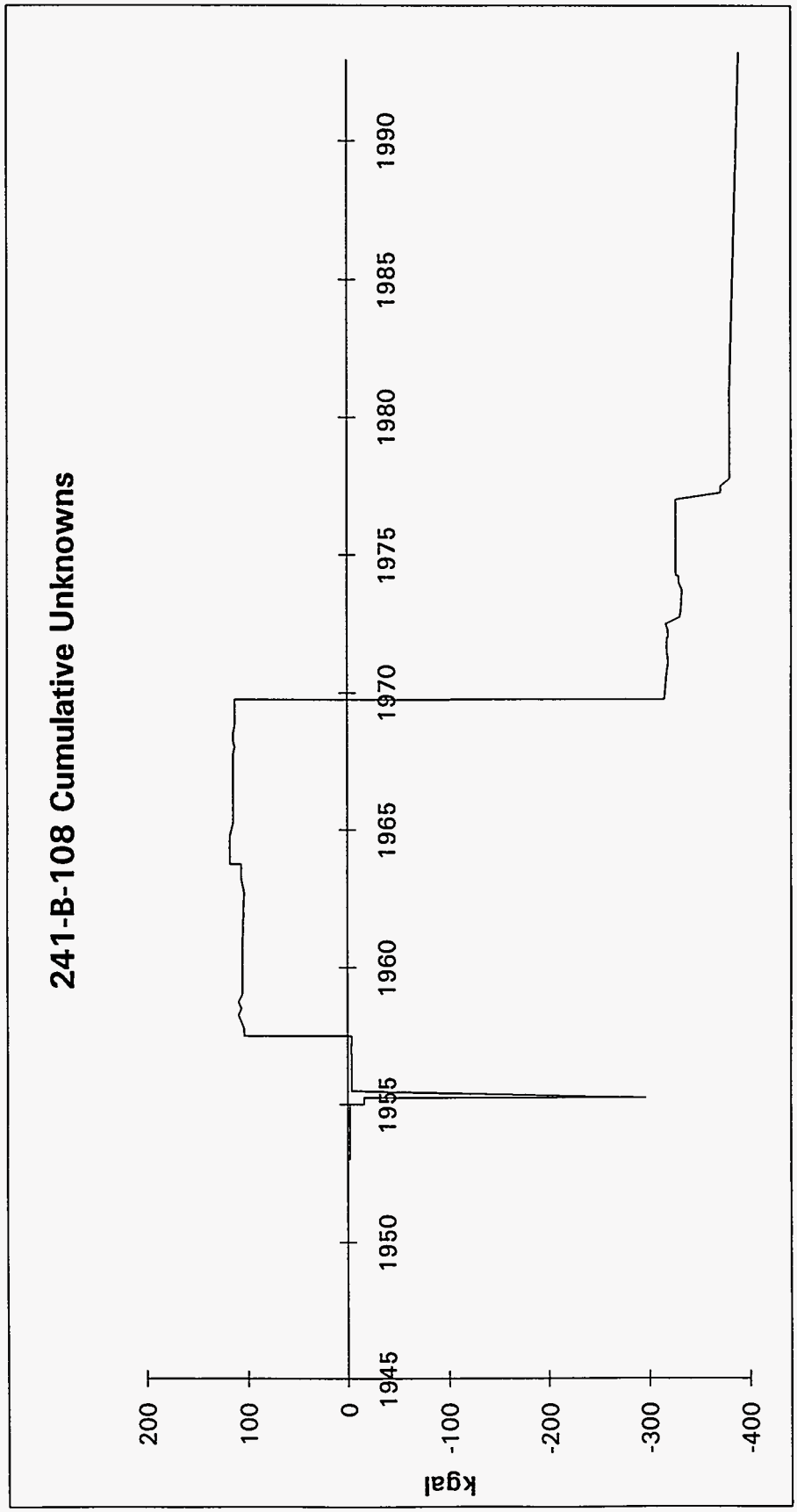

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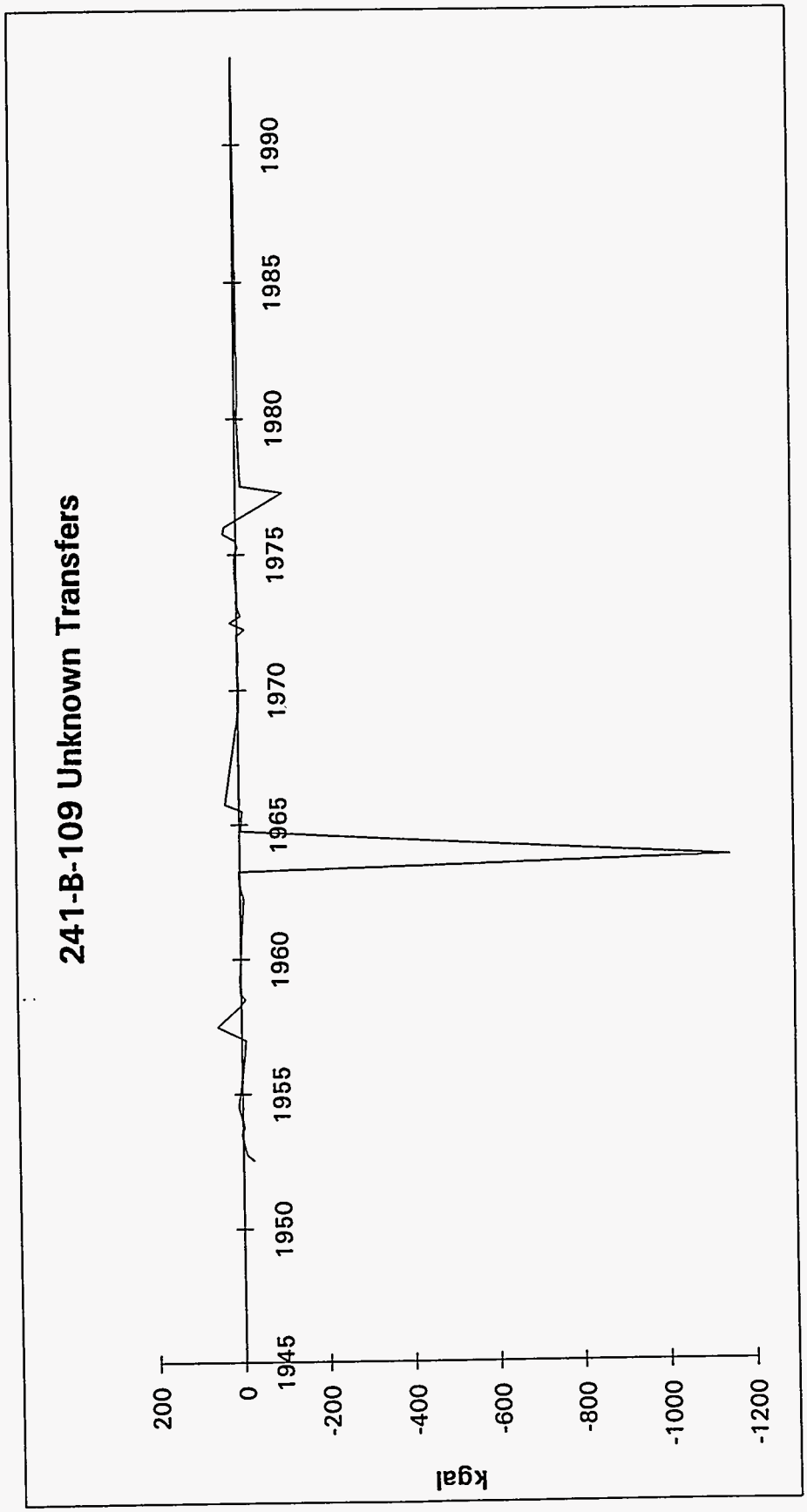

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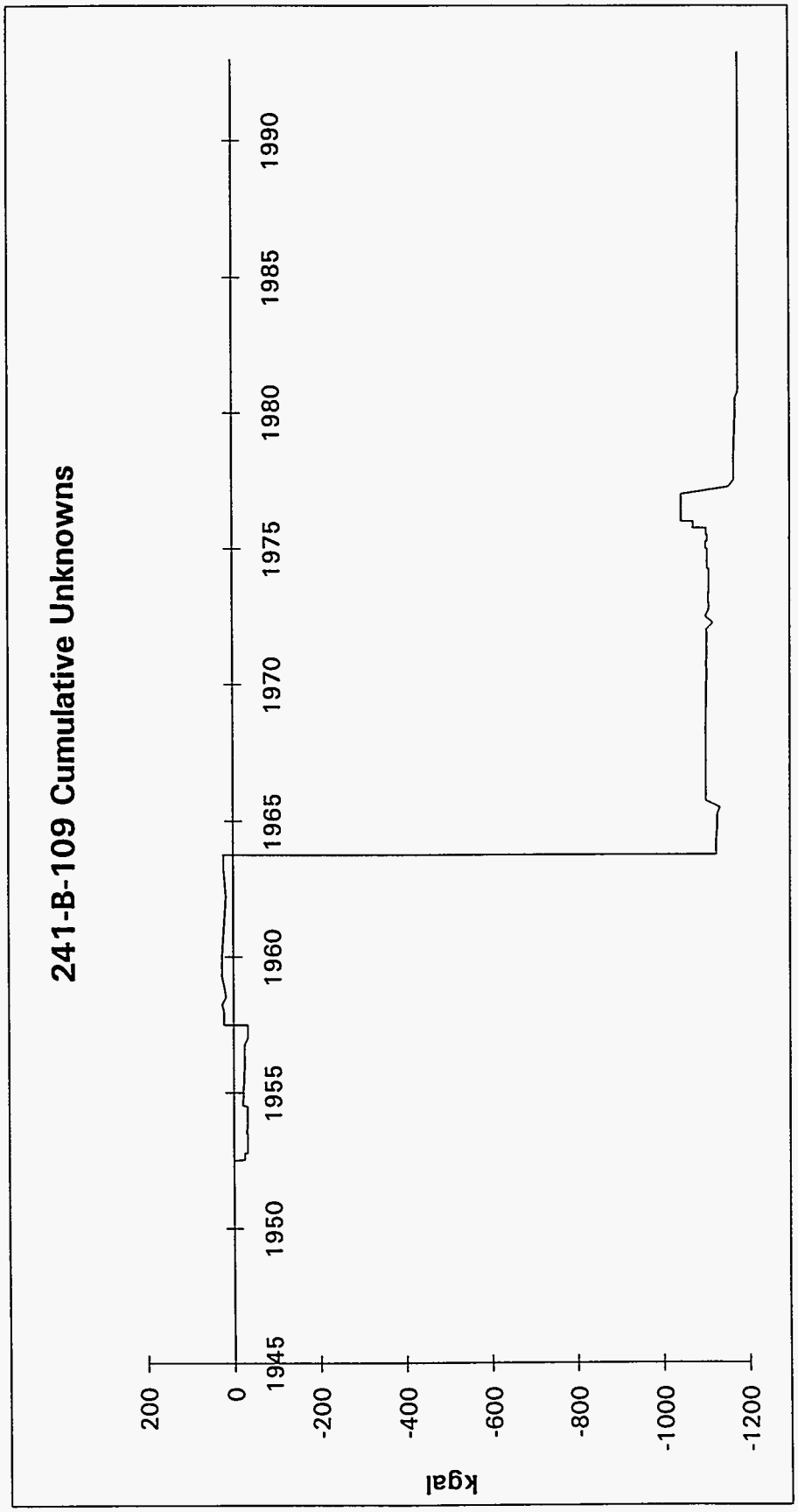
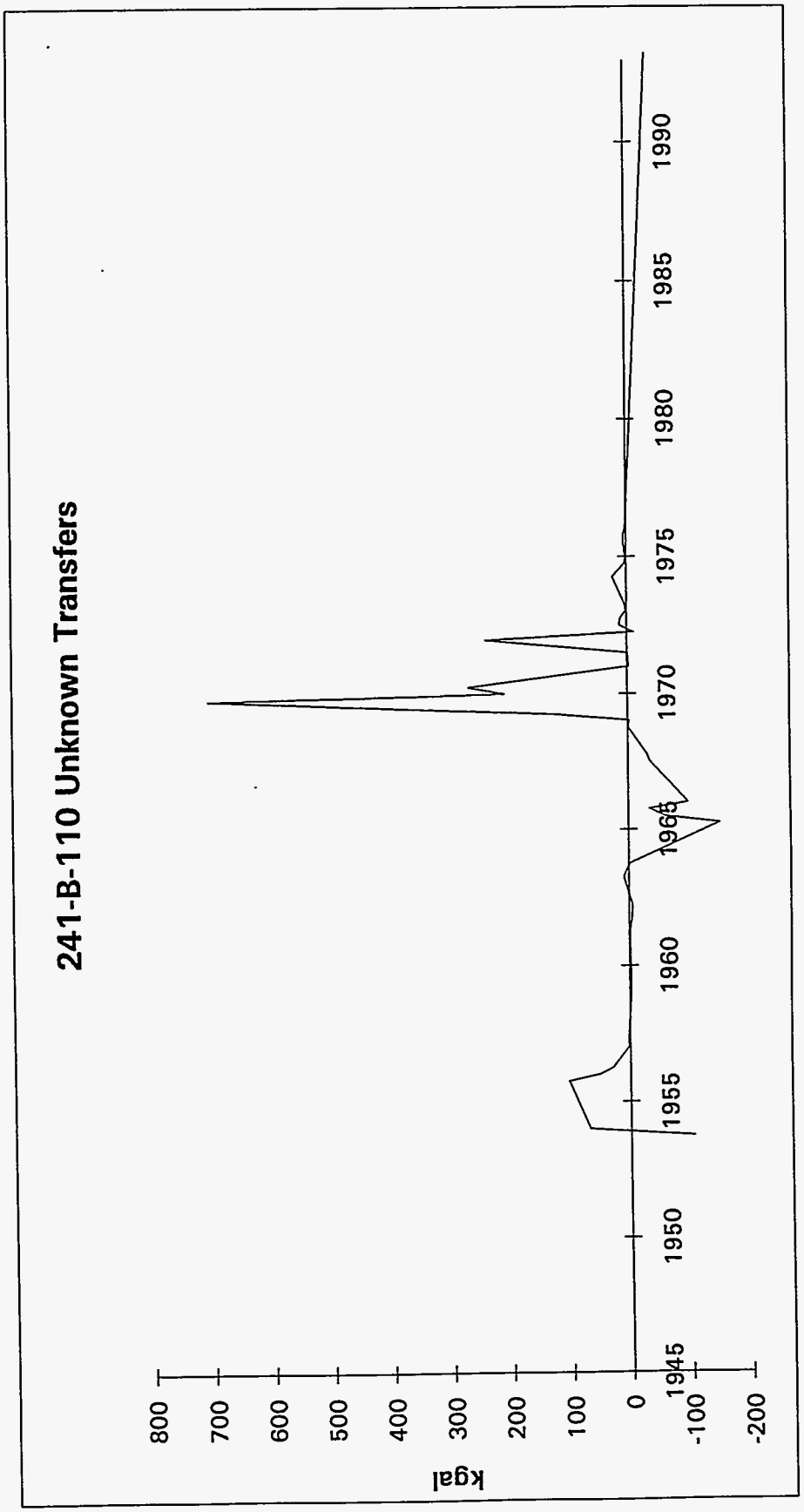
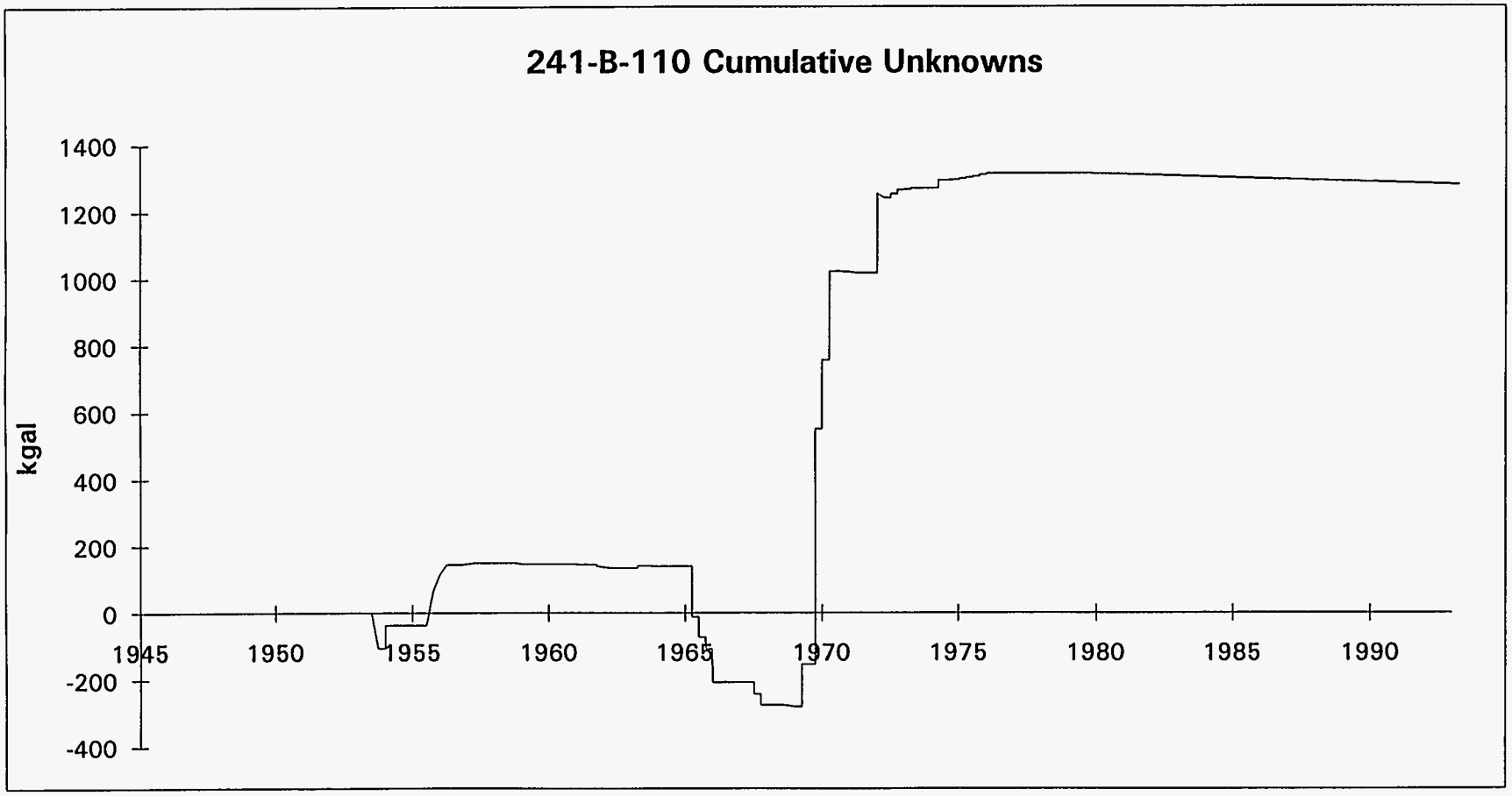


Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



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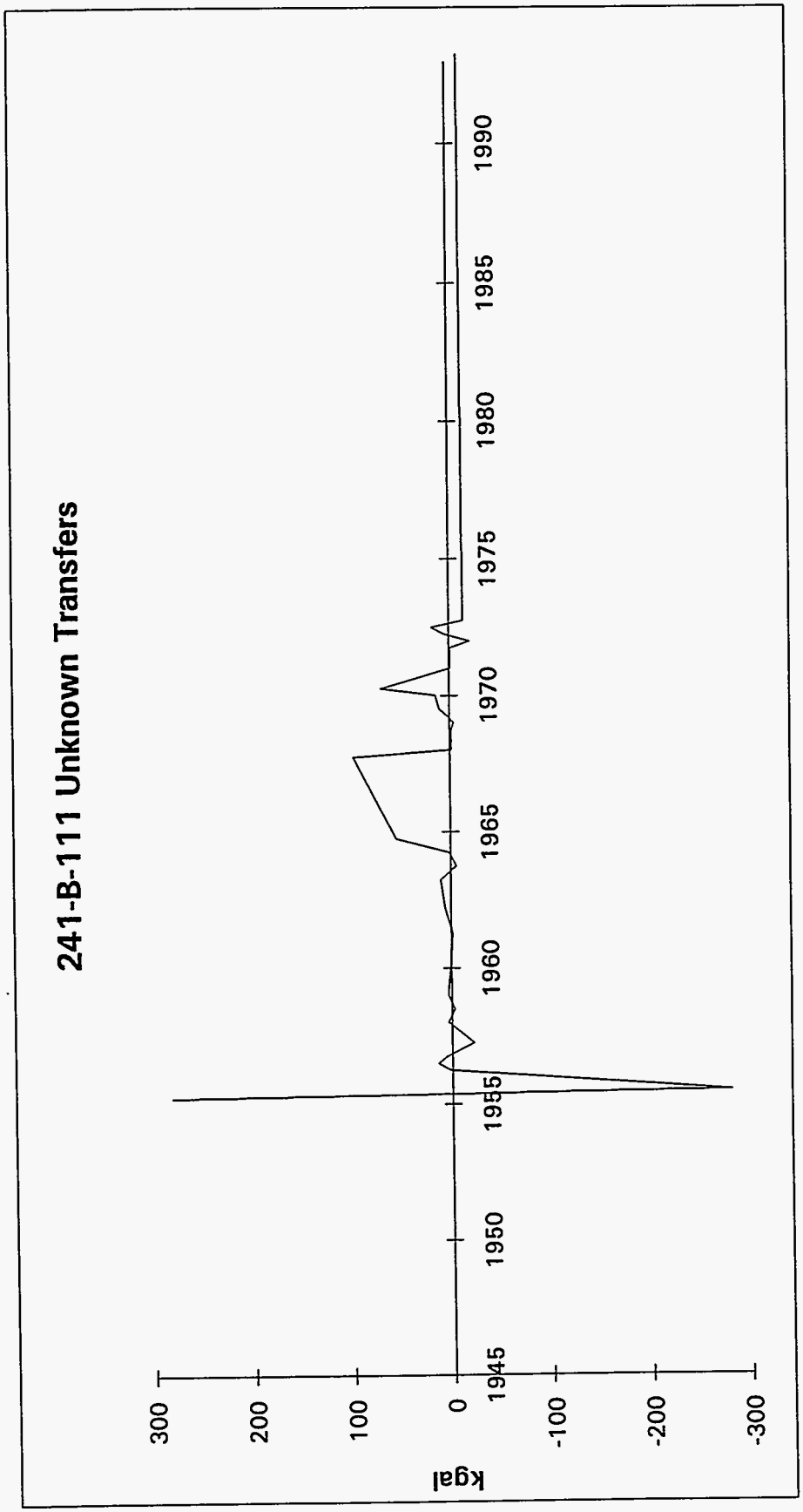
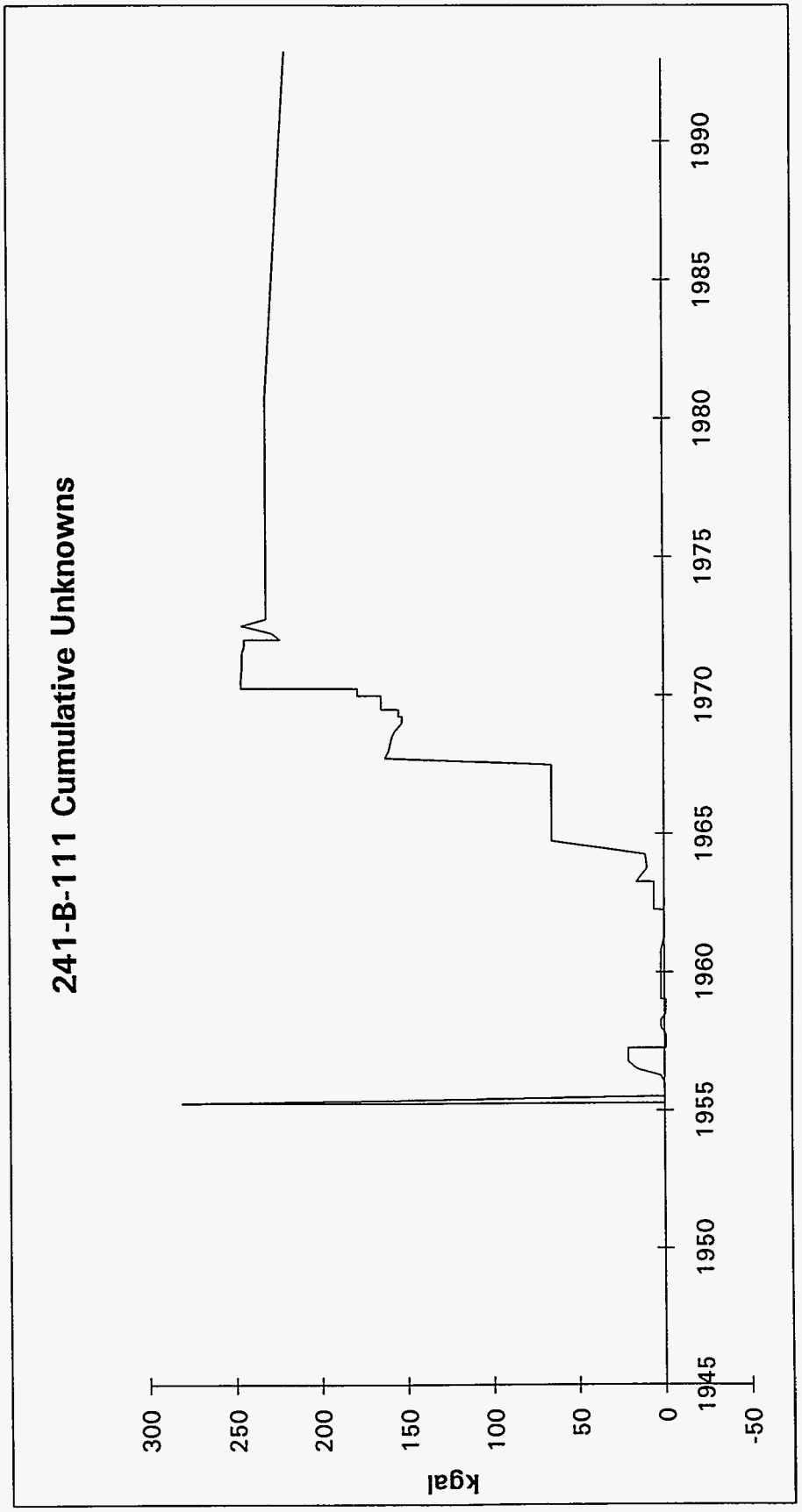
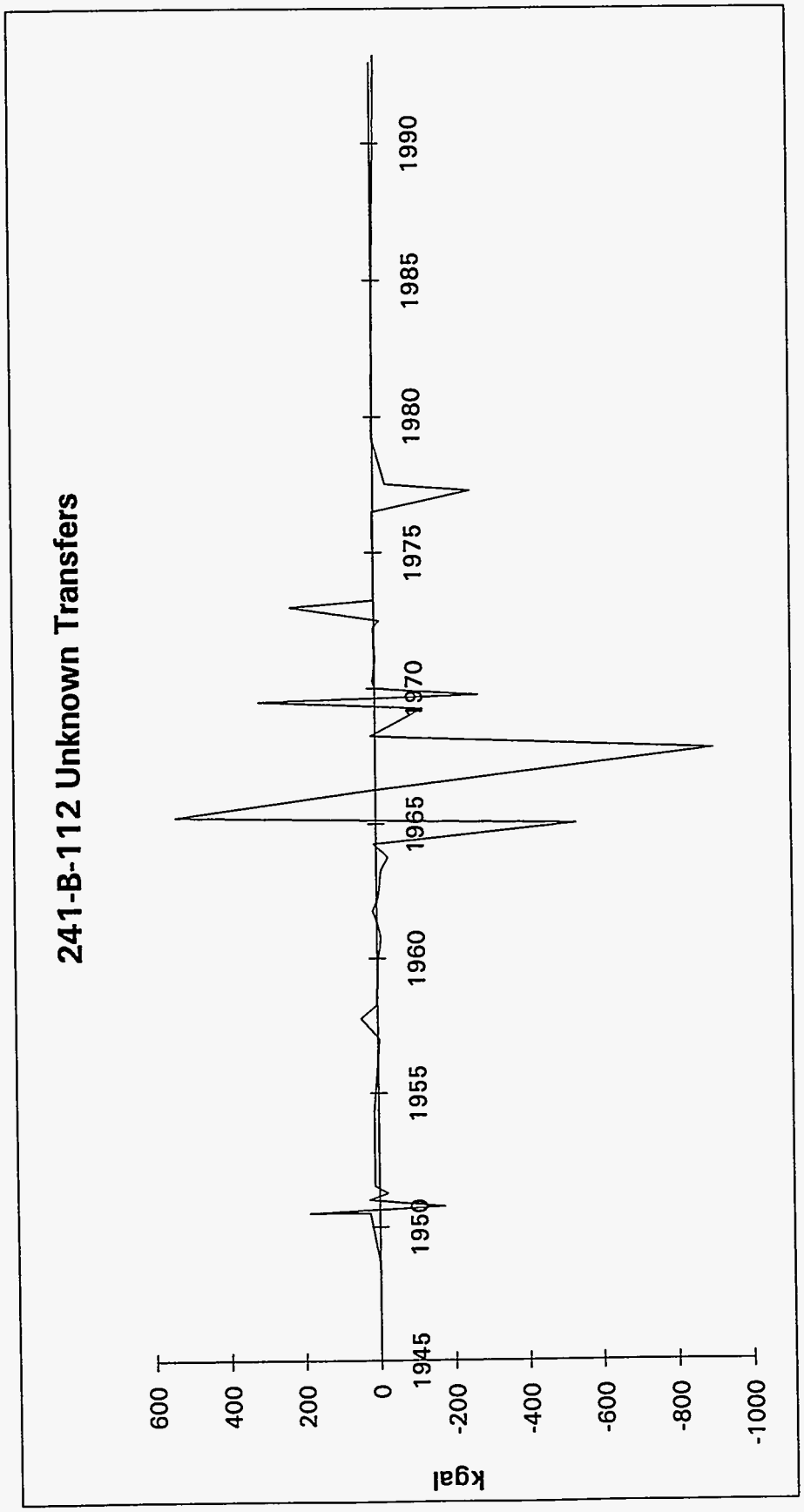


Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



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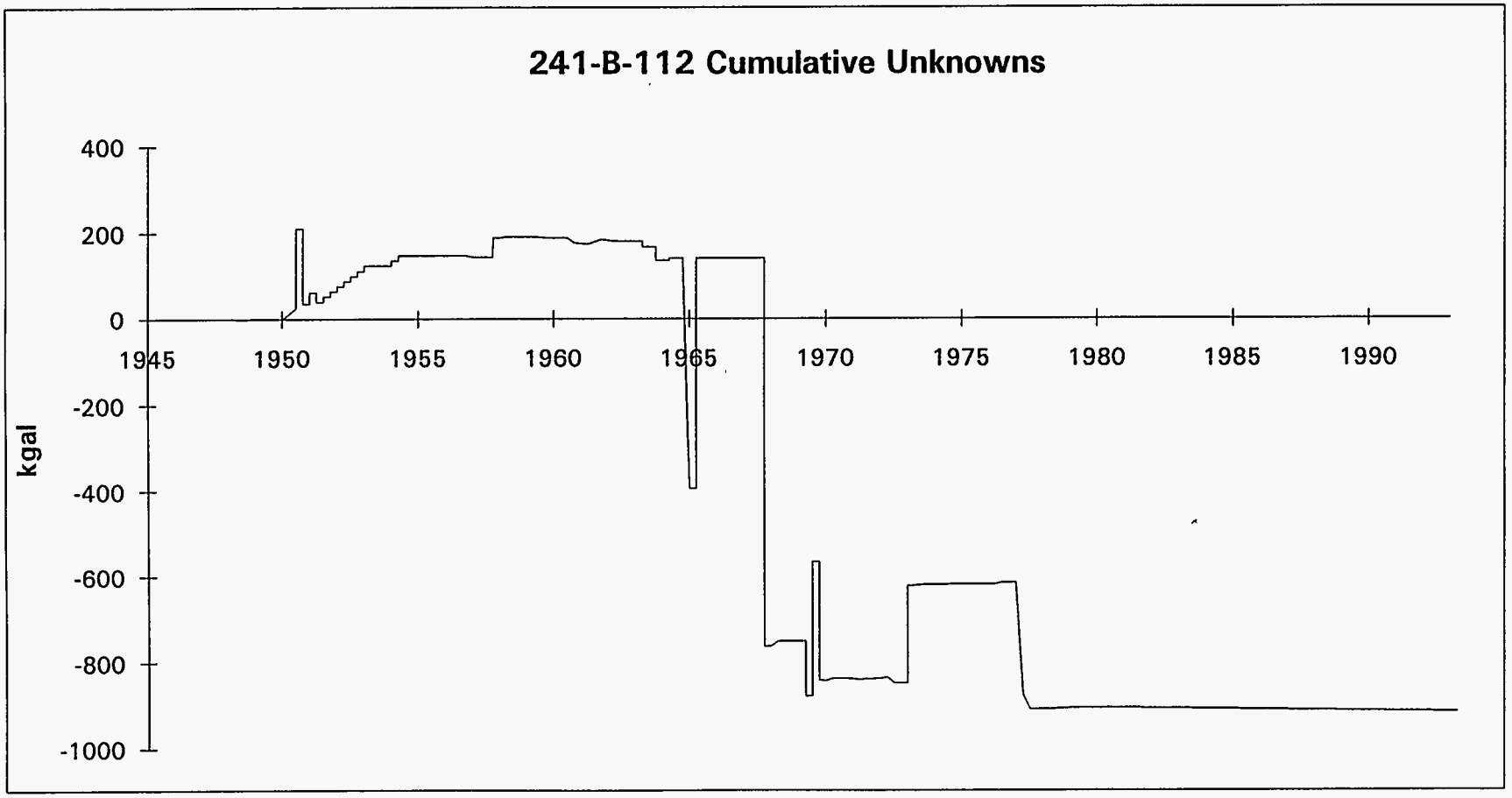

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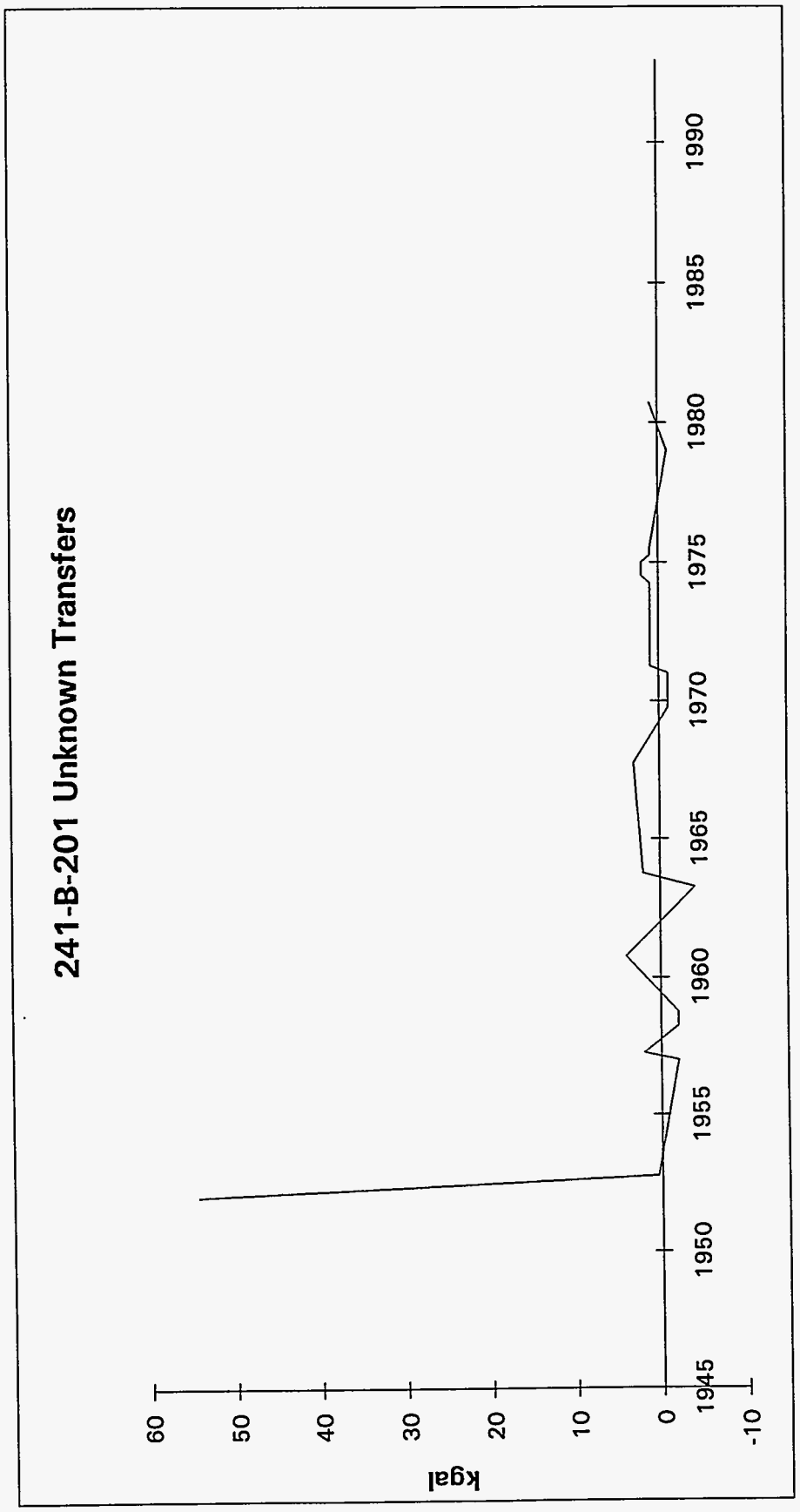
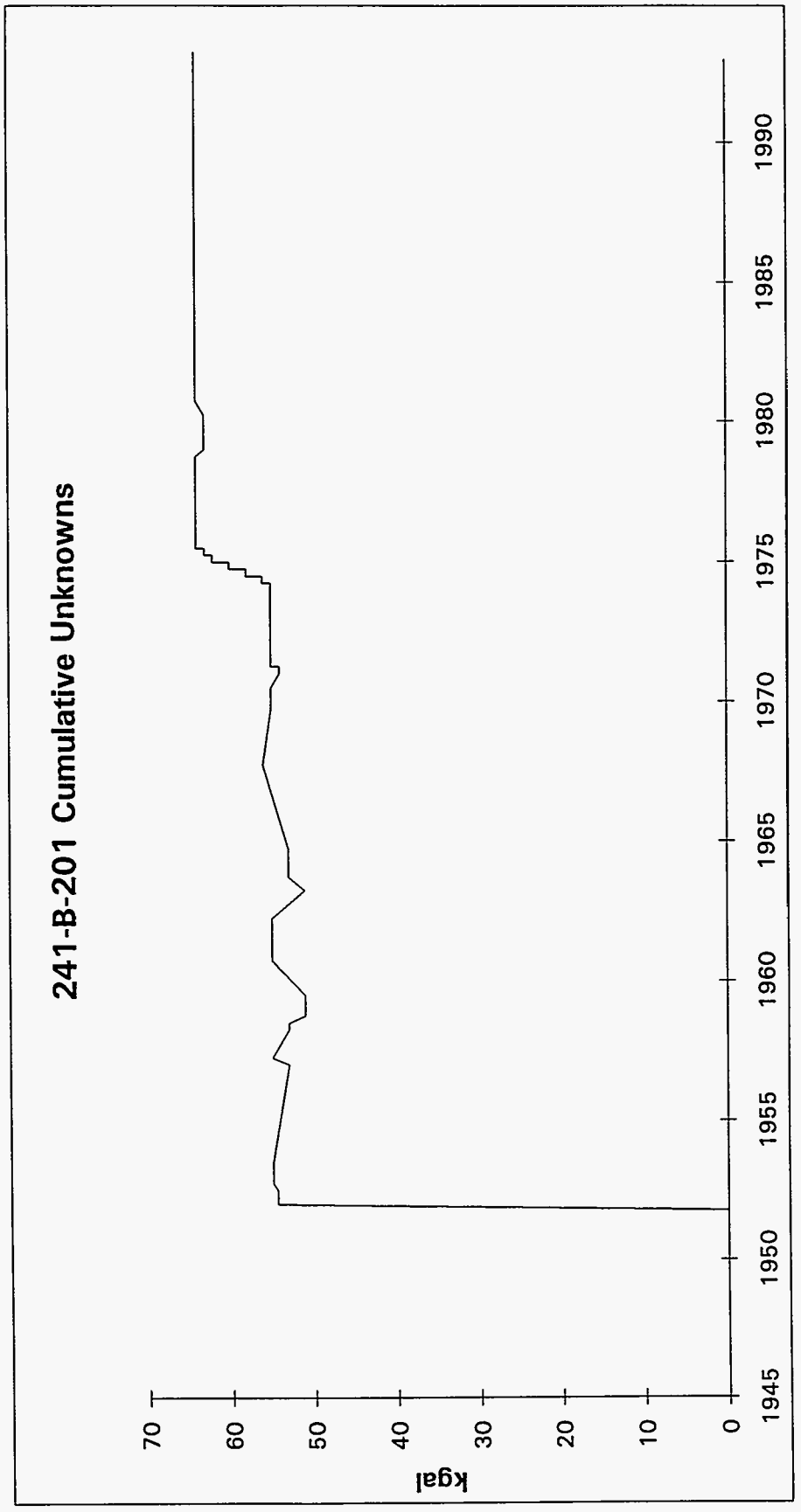


Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



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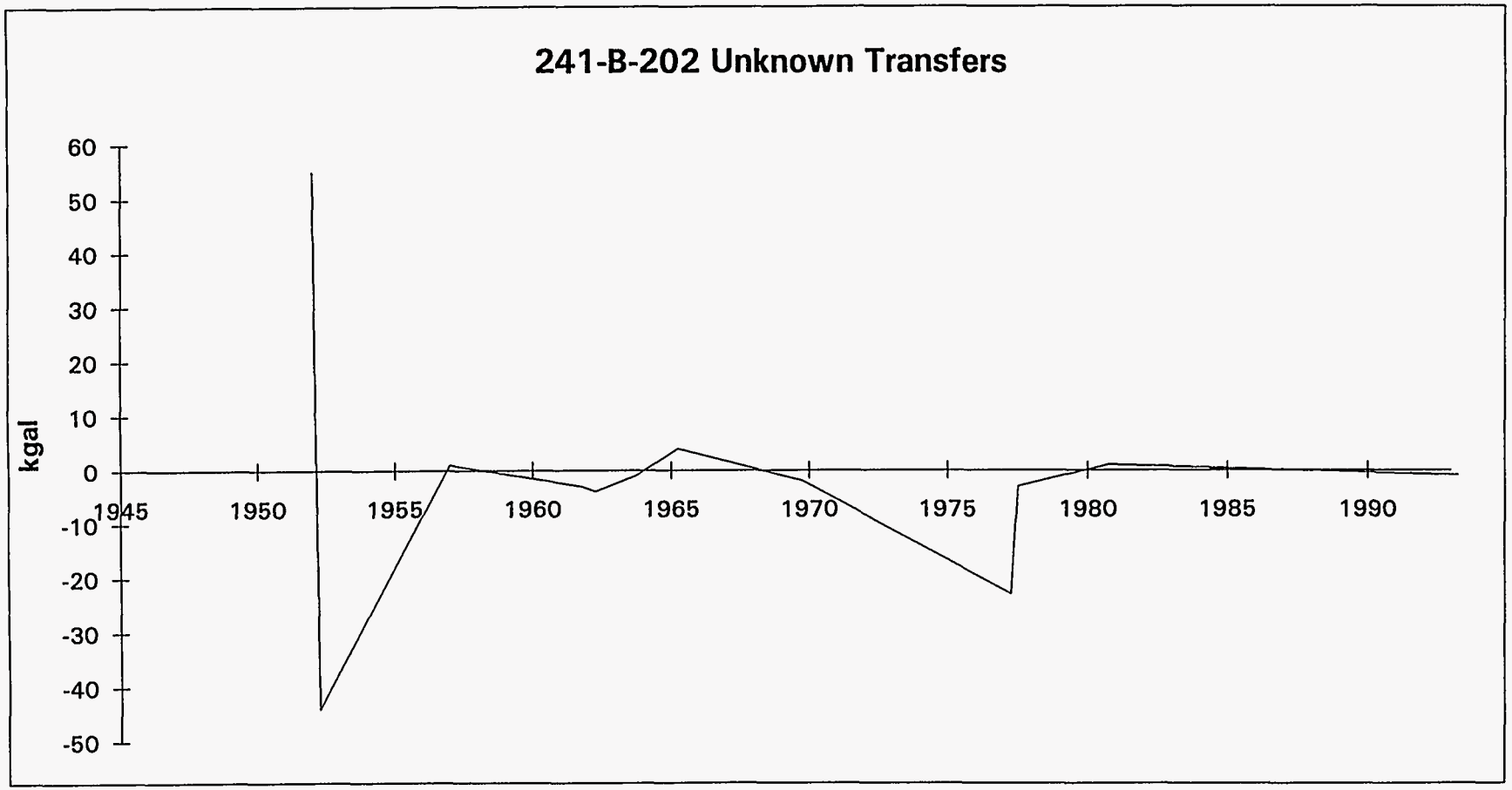
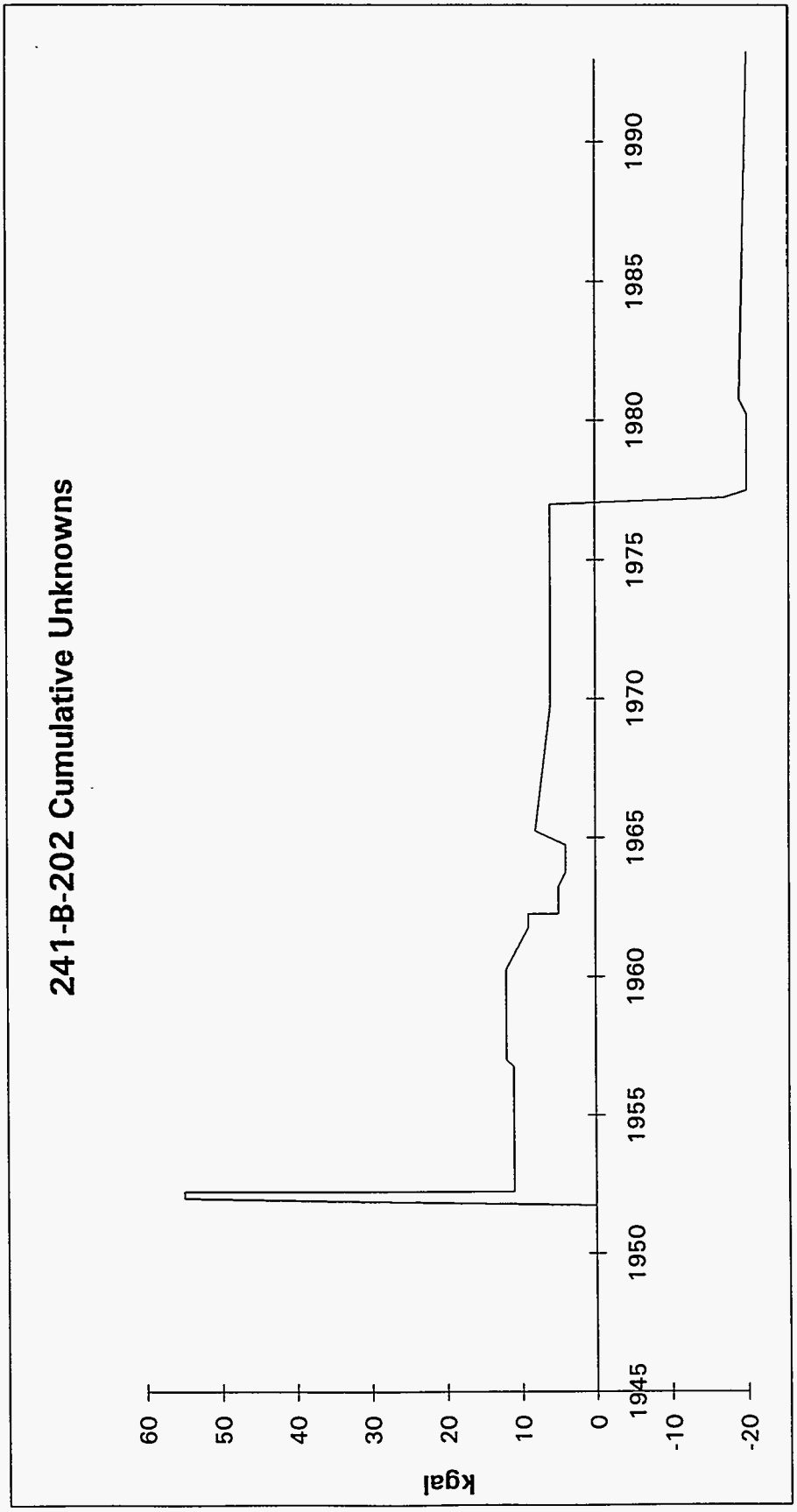
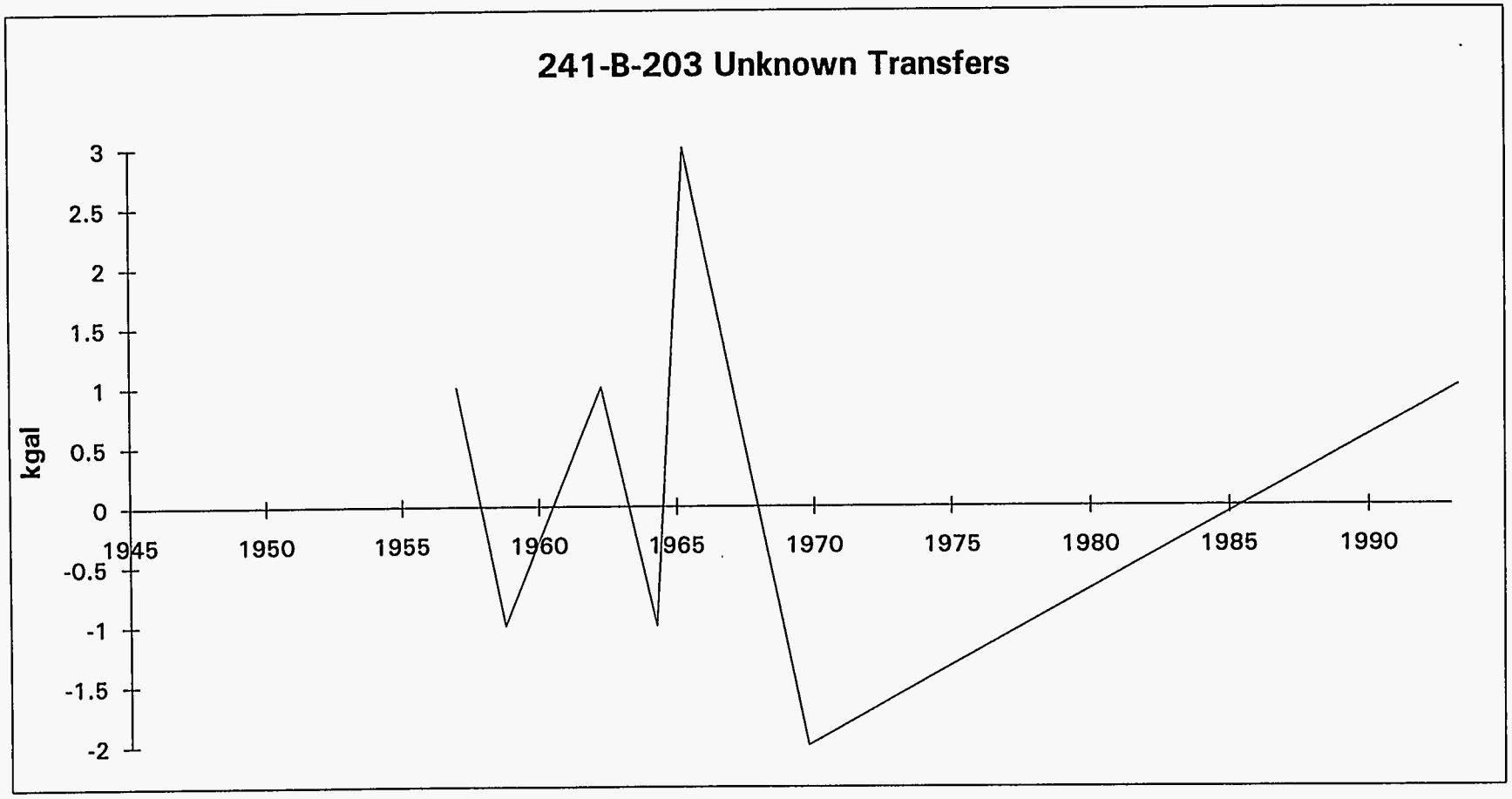


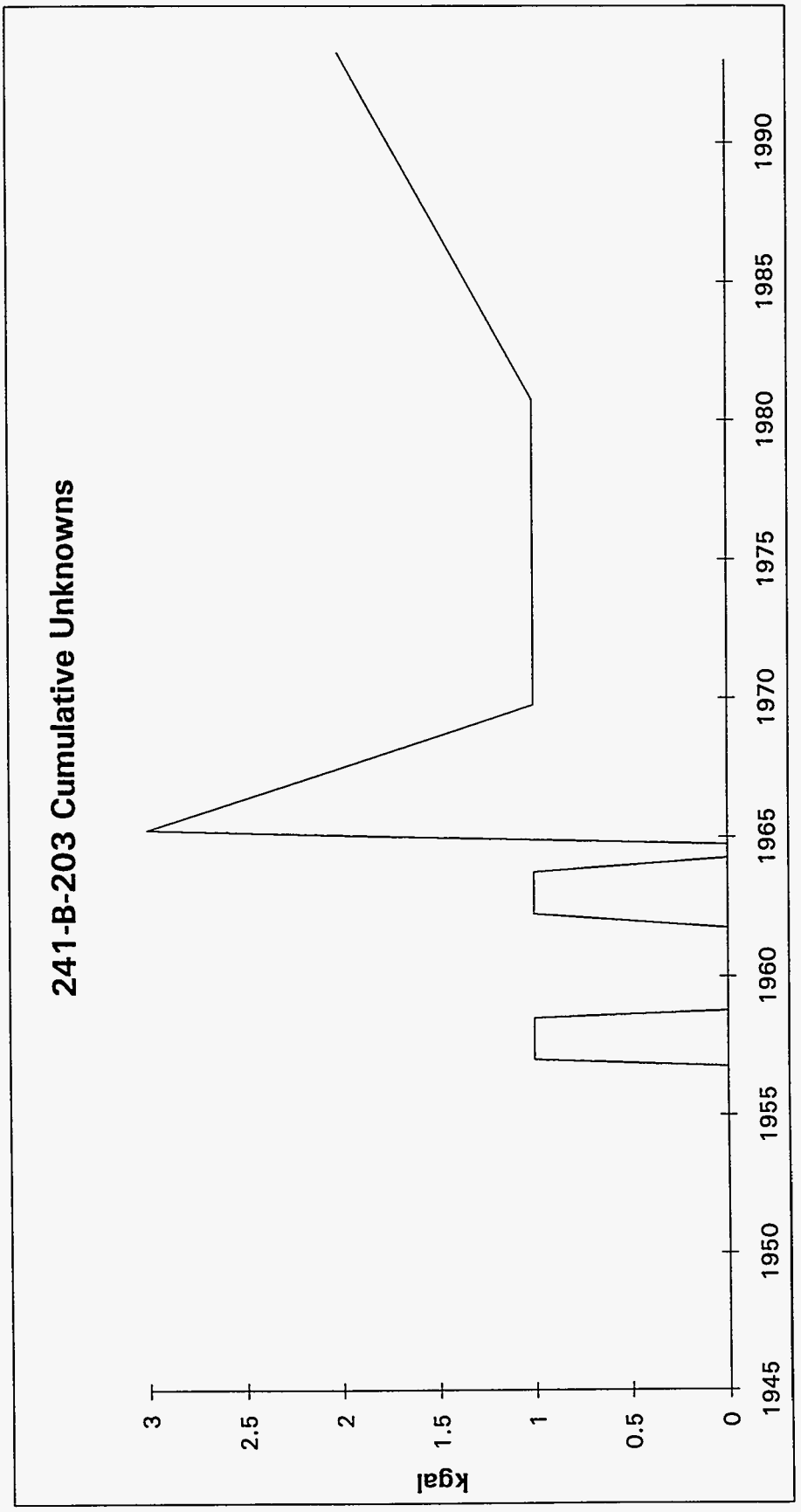
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



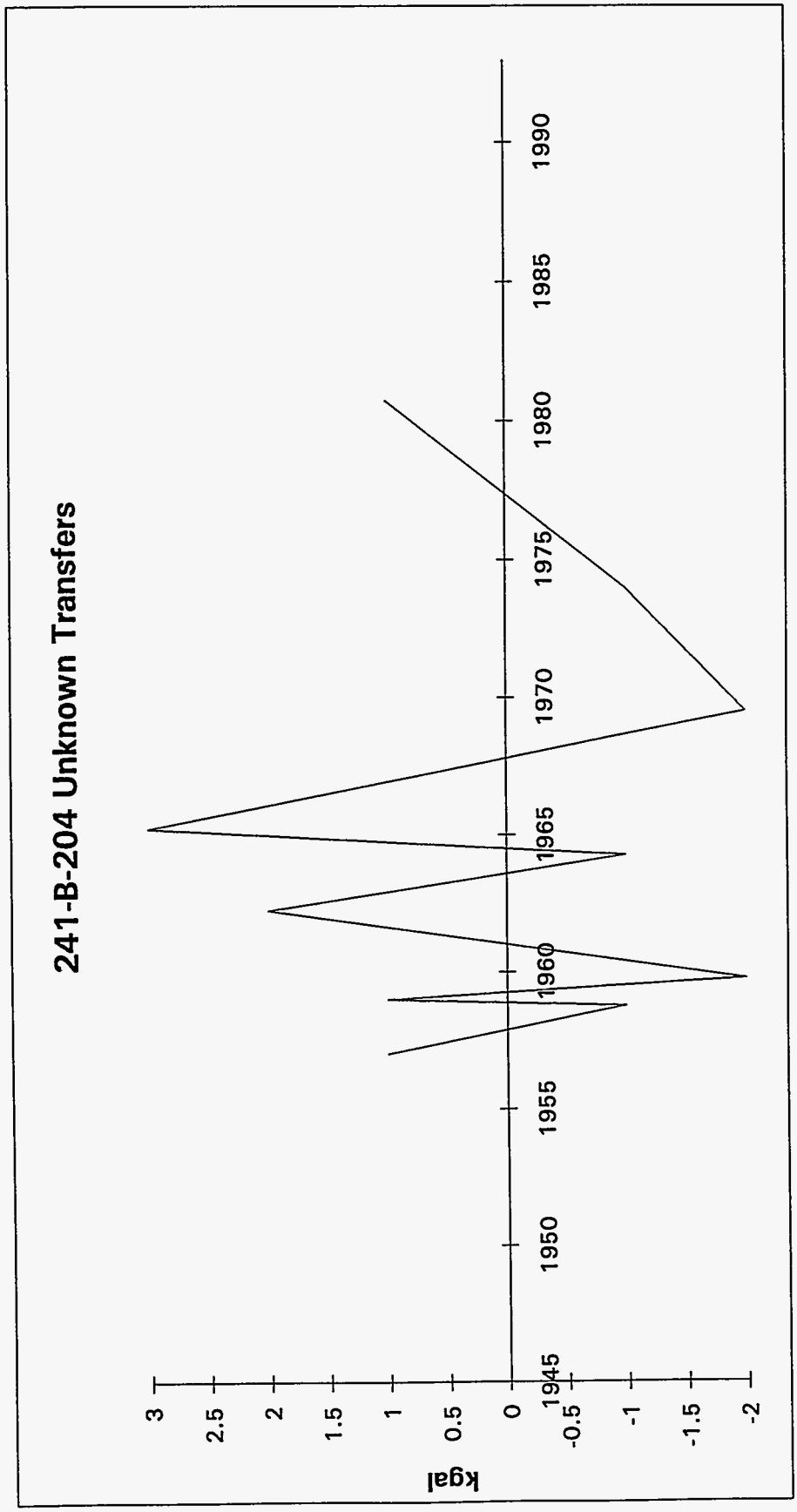
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



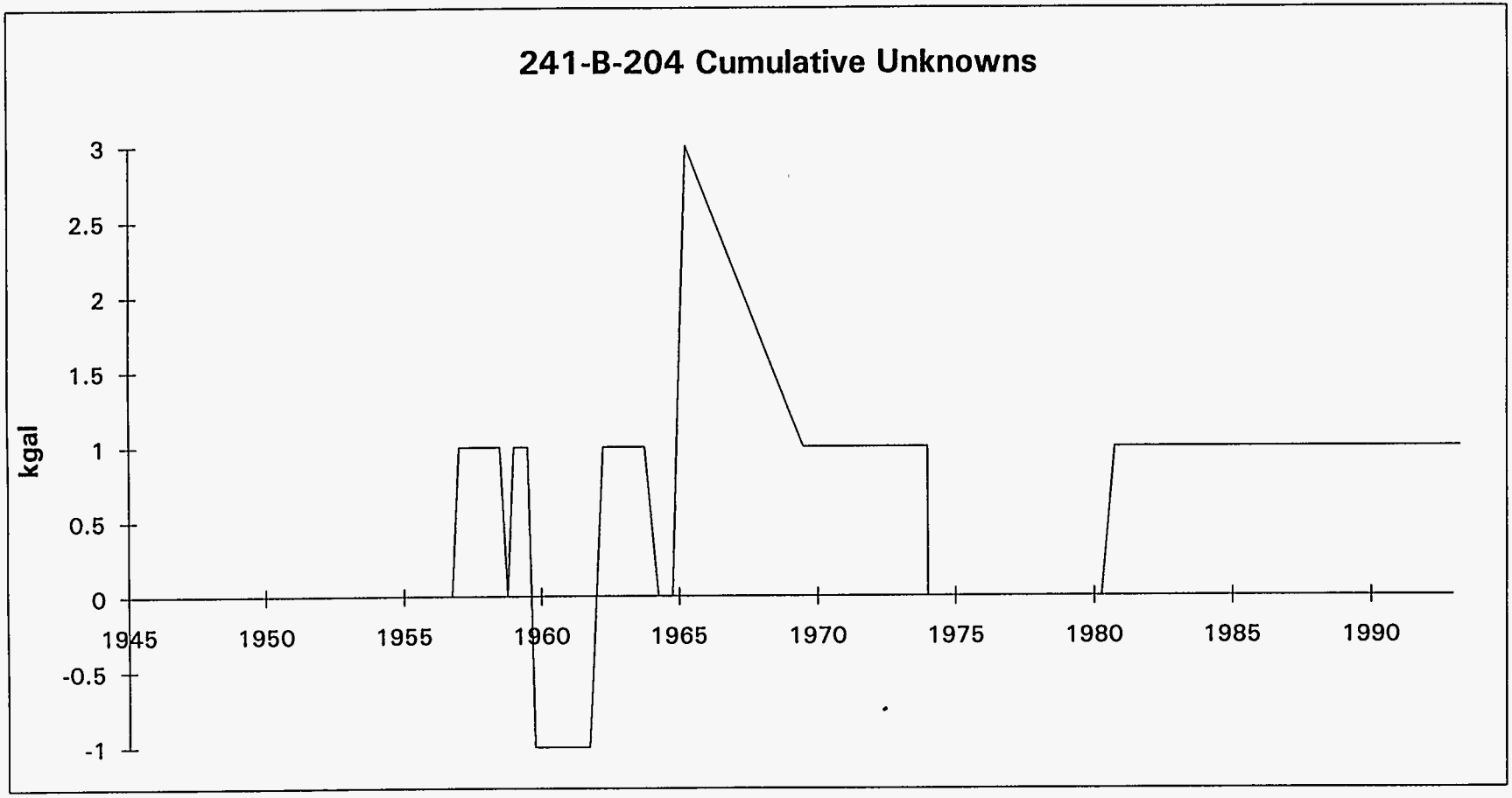
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



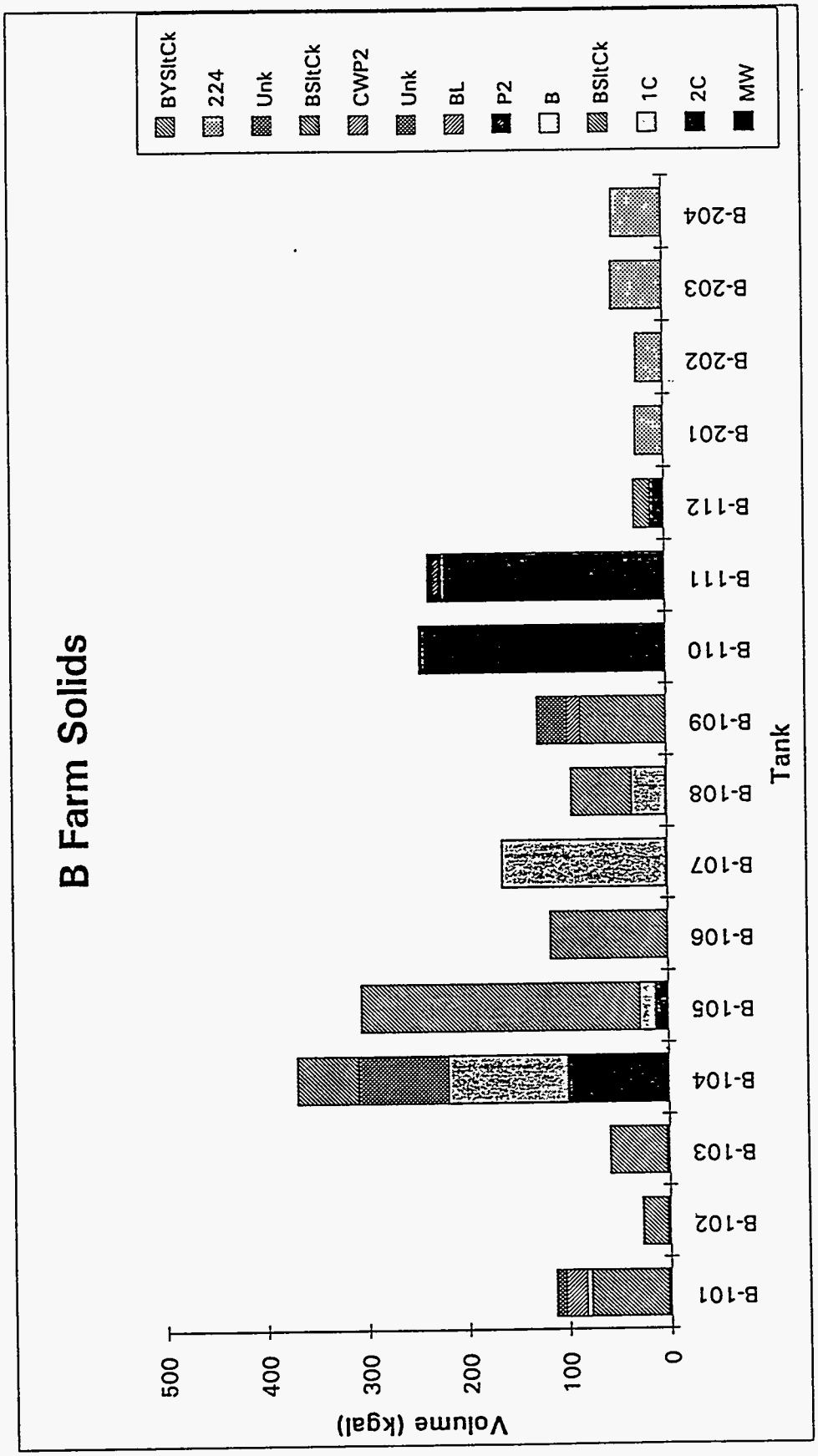
Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)



Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-101	1946	1		70		MW	1590
	1953	1					-530
	1953	4	0	-70			
	1957	1	0	3	3	MW	
	1957	2	106				
	1957	3	315	312		BSltCk	
	1963	2	202				
	1965	2	161				
	1969	1	151	-164			
	1970	2		5		B	1005
	1970	2	150	-6			
	1970	3	106				
	1970	4	103				
	1972	3	109	-41			
	1973	1		105		BL	4187
	1973	1		-78	75	BSltCk	
	1974	4	136		5	B	
	1976	1	103		20	BL	
	1993	2	113	-23	10	Unk	

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-102	1953	1					-530
	1953	4	0				
	1957	3	0	3	3	MW	
	1957	4	84	81	24	Bsltck	
	1963	2	40	-44			
	1965	2	24	-16	1	CWP/2	
	1970	2	55	31			
	1972	1	34				
	1972	3	33				
	1974	4	35				
	1976	4	51				
	1977	1	40				
	1978	4	37				
	1993	2	28	-27			
B-103	1953	1					1060
	1953	2					-1649
	1953	4	0				
	1957	2	0	3	3	MW	
	1957	3	227				
	1962	4	220				
	1963	2	59	56	56	BSltCk	
	1964	2		9		CWP2	314
	1969	3	55	-13			
	1971	2	59				
	1971	4	20				
	1972	1	52				
	1974	4	68				
	1993	2	59	4			

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-104	1950	2		98	98	2C	2873
	1950	3		121	121	1C	486
	1953	1	309	90	90	unk	
	1953	3					292
	1953	4		58		BSltCk	292
	1957	2	40				
	1957	3	365	-2			
	1957	4	530				
	1963	4	409				
	1970	2	414				
	1970	3	400				
	1976	2	395				
	1993	2	370	5	61	BSltCk	
B-105	1953	1	39				
	1953	4	28	28	12	2C	
	1954	3			16	1C	3753
	1957	4	490	462			
	1975	2	491				
	1975	3	293				
	1993	2	306	-184	278	BSltCk	
B-106	1953	1	0				
	1954	2	0				
	1954	3	137	137			
	1956	4	100				
	1957	2	125				
	1957	4	167				
	1963	2	114				
	1965	2	145				
	1971	2	172				
	1972	2	153				
	1973	1	147				
	1974	4	125				
	1993	2	116	-21	116	BSltCk	

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-107	1946	2		218		1C	1590
	1953	1	220	2			
	1953	3	172				
	1954	3	225				897
	1957	2	230				
	1957	4	261				
	1963	2	271	51			
	1963	3		8		CW	264
	1965	2	202	-77			
	1969	3	200				
	1972	2	193				
	1993	2	164	-38	164	1C	
B-108	1953	1	34	34	34	1C	975
	1954	4	65	31		BSltCk	
	1957	2	114				
	1963	2	120				
	1963	3		12		CW	410
	1965	2	125				
	1969	2	117				
	1971	2	122	45			
	1971	4	78				
	1972	1	113	-9			
	1973	1	112				
	1974	1	114				
	1976	2	112				
	1977	4	70				
	1993	2	94	-19	60	BSltCk	

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-109	1953	1	0				
	1954	3	128	128			1323
	1957	2	232	104			
	1957	3	76				
	1958	3	70				
	1963	2	84	-148	84	BSltCk	
	1963	4		13	13	CWP/2	457
	1965	2	134	37		unk	
	1970	2	161				
	1972	1	136				
	1974	4	117				
	1977	3	120				
	1993	2	127	-7	30	unk	
B-110	1953	1		355	243	2C	5216
	1953	1		57		2C	1333
	1953	3	378				
	1953	4	243				
	1955	1	348				
	1955	3	243				
	1963	2	282	-130			
	1963	4		1		5-6#	147
	1965	2	332	49			
	1967	3	243	-89			
	1967	4		26	2	P2	674
	1968	1		1		B	135
	1968	2	297	27			
	1972	2	282				
	1993	2	245	-52			

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Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-111	1953	3	237	237			
	1953	4	161	-76			
	1955	2	195				
	1955	3	249				
	1956	4	243	82			
	1957	1	161				
	1957	1			222	2C	
	1962	2		1	1	5-6#	216
	1963	2	300				
	1965	2	310	66			
	1967	3		13	13	FP	329
	1967	3	161				
	1968	3	241				
	1970	1	232				
	1970	2	244				
	1972	1	241				
	1972	2	246				
	1973	1	249				
	1976	2	246				
	1993	2	236	-87			
B-112	1953	3	0				
	1957	2	23	23			
	1957	4	43	20			
	1961	2	29				
	1962	2	35				
	1962	4		0		5-6#	5
	1962	4	40				
	1963	2	35				
	1967	3	40	11			
	1968	2	18				
	1972	3	14	-40	14	2C	
	1974	4	35				
	1977	2	37				
	1993	2	30	-16	16	BYSltCk	

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-201	1953	2	55	55			
	1958	2	28				
	1958	3	24				
	1958	4	29				
	1960	4	55				
	1963	2	50				
	1970	3	30				
	1973	1	26				
	1974	4	29				
	1979	1	27				
	1980	4	28	-27			
	1993	2	28		28	224	
B-202	1953	3	26	26			
	1954	3	25				
	1962	2		0		B	8
	1962	2	26				
	1963	2	25				
	1971	4	29				
	1973	4	27				
	1980	4	28				
	1993	2	27	1	27	224	
B-203	1953	2	55	55			
	1957	1	55				
	1963	4	54				
	1969	4	54				
	1971	4	49				
	1973	4	44				
	1974	1	44				
	1976	3	45				
	1977	3	47				
	1980	4	48				
	1993	2	50	-5	50	224	

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)

Tank	Year	Qtr	Meas. solids	Solids Change	Predicted Layer	Layer Type	Waste Volume (K Gal)
B-204	1953	2	55	55		224	372
	1957	1	55				
	1959	4	54				
	1971	4	48				
	1973	4	46				
	1980	4	47				
	1993	2	49	-6	49	224	

Derived from LANL Waste Status and Transaction Record Summary V2.0b (Agnew 1994)