ROMP 20 OSPREY
MONITOR WELL SITE
SARASOTA COUNTY, FLORIDA

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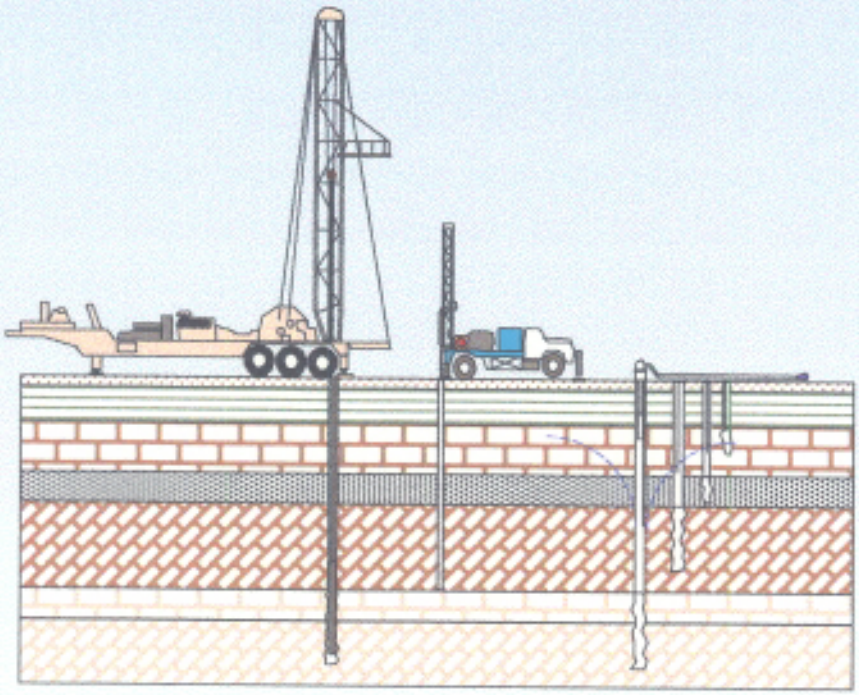
EXPLORATORY DRILLING AND TESTING



Geohydrologic Data Section
Resource Data Department
Southwest Florida Water Management District
APRIL 1997

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DRILLING AND TESTING REPORT
ROMP 20 OSPREY
SARASOTA COUNTY, FLORIDA

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The geological evaluations and interpretations contained in the ROMP 20 OSPREY DRILLING AND TESTING REPORT SARASOTA COUNTY, FLORIDA have been prepared by or approved by a certified Professional Geologist in the State of Florida, in accordance with Chapter 492, Florida Statutes.

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1.0 INTRODUCTION

The Southwest Florida Water Management District (SWFWMD), through the Regional Observation and Monitor-well Program (ROMP), has completed a hydrogeologic study and ground-water monitor well installation at the ROMP 20 site in northwest Sarasota County, Florida. The ROMP 20 site is the southernmost monitoring location included in an investigation of the Eastern Tampa Bay Water Use Caution Area.

The Water Use Caution Area, (WUCA) is a region encompassing southern Hillsborough County, most of Manatee County, and northern Sarasota County that has been subject to declines in potentiometric levels of the upper Floridan aquifer system. The District's Resource Projects Department has conducted a water resource investigation of the region that included intensive groundwater studies conducted through the ROMP at seven drilling sites in the WUCA (SWFWMD,1993). Results of the Water Resource Assessment Project, (WRAP) in the Eastern Tampa Bay WUCA will be used to determine future groundwater resource management practices and regulatory initiatives for the region. Data acquired from test drilling at the ROMP 20 wellsite was assimilated with other data within the WRAP study area, to aid in determining a "safe yield" threshold for groundwater withdrawals in the WUCA.

2.0 PROJECT LOCATION

The ROMP 20 monitor wellsite is in the coastal town of Osprey in west-central Sarasota County (Figure 1). The wellsite location is described as being in the NW-NW-NW quarters of Section 11, Township 38 south, Range 18 east, on property held by the Sarasota County School Board. The site is approximately 1000 feet south of Bay Street, 0.10 miles east of the intersection of Bay Street and Old Venice Road, or approximately 0.60 miles east of U.S. Highway 41. Wellsite coordinates from the 1973 U.S. Geological Survey Laurel topographic quadrangle are Latitude 27 11' 37", Longitude 82 28' 45", at an elevation of approximately 15 feet above sea level (NGVD).

3.0 DRILLING METHODS AND DATA COLLECTION

The hydrogeologic investigation and monitor-well drilling program at ROMP 20 was designed to collect and interpret detailed data from a series of test wells, and to complete a set of permanent monitor wells covering all significant aquifer units at the site. This was accomplished in three events: preliminary well construction; continuous test-core drilling; and final well construction. The final well construction phase also included additional exploratory drilling and testing. A layout of the wellsite is shown in Figure 2.

Preliminary well construction at ROMP 20 commenced in February 1991 using the District's Speedstar 22 drilling rig. Three wells were constructed to facilitate test drilling, and for use as permanent monitors and temporary observation wells upon completion of continuous test-coring and exploratory drilling. These wells included: a 6 inch diameter surficial aquifer monitor/water supply well with a screen interval from 12 feet to 32 feet below land surface (BLS); a 12-inch PVC surface casing set at a depth of 75-feet BLS for a temporary observation well; and a 6-inch PVC casing set at a depth of 500 feet BLS for the permanent Suwannee Formation-Floridan aquifer monitor.

Continuous core drilling was initiated, March of 1991 and was completed May 1991 to a total depth of 1439 feet BLS. All coring operations were conducted with the District's CME 75 drilling rig. Continuous sediment and rock samples were collected in three stages from three separate test wells (Figure 3). Data generated during core drilling included a detailed geologic description of well samples, water level and water quality profiling with depth, and a number of geophysical logs to aid in aquifer delineation and stratigraphic correlation.

Additional exploratory drilling was conducted below the test core total depth of 1439, to verify the presence of saline ground-water conditions in the highly permeable dolostone section of the Avon Park Formation. In the process of exploratory drilling, borehole geophysical data was collected, and a series of formation packer tests were completed, from 1300 to the exploratory depth of 1480 feet BLS.

3.1 Lithologic Data Collection Methods

3.1.1 Lithologic Sampling During Test-Core Drilling

The initial test drilling phase at ROMP 20 employed wire-line core drilling techniques. Lithologic samples were collected using a Longyear, wireline-retrievable, continuous core sampling system. Temporary 4-inch flush thread steel casing was advanced to successively greater depths during core drilling to stabilize the test hole and isolate aquifer units. A 3-inch diameter NQ® core barrel and flush threaded rods, with a retrievable 1 7/8-inch diameter inner barrel, was used to collect the core samples. This drilling technique was employed to collect lithologic and water quality samples from 44.5 feet to 1439.0-feet BLS. Core samples were described by the District's site hydrogeologist to produce a detailed lithologic description.

3.1.2 Lithologic Sampling During Reverse-Air Drilling

Well cuttings were sampled, during additional exploratory drilling, on ten foot intervals from 1439 feet to a total depth of 1480 feet BLS. The drill pipe volume and length of drill pipe were used to calculate the travel time for the drill cuttings to circulate to the surface to assure a representative collection of formation samples with depth. Additional lithologic descriptions of the well cuttings were included with the core log. All lithologic samples were archived by the Florida Geologic Survey (FGS). A lithologic log for ROMP 20, produced by the SWFWMD site hydrogeologist and checked by the FGS, is included as Appendix F.

3.2 Ground-Water Quality Sampling Methods

Ground-water samples and water level data were collected during the core drilling phase and additional exploratory drilling to develop a water quality profile and delineate hydrostratigraphy. Water samples were collected on regular 10 to 20 foot intervals, as determined from changes in lithologic character or by a marked increase in the potentiometric surface during drilling. Fluctuations in potentiometric levels and field water quality data dictated the collection schedule for analytical laboratory samples. Tables 1 through 6 presents the results of field and laboratory analyses of ground-water samples collected at ROMP 20. A detailed description of water sampling techniques used during core and exploratory drilling are included in the ROMP

comprehensive water quality sampling report (SWFWMD, 1994).

3.2.1 Water Quality Sampling During Test-Core Drilling

Prior to the collection of a water sample from the core rods the inner barrel is removed using the wireline retrieval system. With the drill rods positioned near the bottom of the hole, a reverse-air purging technique is utilized to remove excess cuttings and drilling fluid from the borehole. The purging process is continued with the drill rods raised 20 feet off the bottom of the borehole. Purging is continued until at least one-volume of water is removed. One volume of water is defined as the amount of fluid circulated during the core drilling process. The fluid circulated during drilling is measured via a totalizing flow meter. Fluid conductivity of the discharge water is measured periodically during the development process. When, stability is achieved in the measured fluid conductivity readings, the purging process is discontinued.

Following the purging process, a stainless steel bailer is lowered into the core rods on a wireline to a point approximately 12-feet below the core bit, which corresponds with the sample interval. The water is transferred from the bailer to a pre-cleaned 1 gallon plastic jug, and a small portion is used to measure temperature, fluid conductivity, and pH (i.e., standard field analysis). The remaining sample is run through a filtration apparatus equipped with a 0.45 micron filter membrane. The sample is split, and a portion is analyzed in the field for sulfate and chloride. The remaining sample portion is collected and retained for complete laboratory analysis, based on fluctuations in field data.

3.2.1 Water Quality Sampling During Reverse-Air Drilling

A similar purging process and sampling methods were also used during the additional exploratory drilling. Water samples were collected on 20 foot intervals at each drill pipe change during reverse-air circulation drilling. After advancing the exploratory drill string 20 feet, reverse-air circulation is maintained at the bottom of the hole for several minutes to remove drill cuttings, and continued until the discharge water appeared relatively clear. To collect a representative sample, the drill string was raised 20 to 30 feet off-bottom and circulation continued for several more minutes until a stable discharge fluid conductivity is achieved. Finally, the drill string is lowered back to bottom, and a wire-line bailer is lowered inside the drill pipe for sample retrieval. Water sample handling and field analysis techniques followed the same protocol as for core drilling sample collection.

3.3 Hydraulic Testing and Analysis

3.3.1 Core Permeameter Testing

Vertical hydraulic conductivity data was obtained by falling-head permeameter testing on ten core samples obtained from the Upper Floridan aquifer at ROMP 20. Core samples exhibiting low visible porosity were selected for testing, from sections of the Suwannee Limestone, Ocala Limestone, and Avon Park Formation, to determine relative confining properties between permeable zones in the Floridan aquifer. Permeameter test results are given in Table 13. Testing procedures and a description of the falling-head permeameter apparatus are presented in Appendix B.

3.3.2 Formation Packer Testing

Five off-bottom formation packer tests were conducted during additional exploratory drilling in the Suwannee/Floridan aquifer monitor, which was terminated below the saltwater interface. contained. Four packer tests were conducted in low permeability limestones of the upper Avon Park Formation. A final packer test was conducted in the fractured, sucrosic dolostones which comprise the major permeable unit within the Avon Park Formation. Packer tests were conducted to determine the relative confinement characteristics of low-permeability sections overlying this permeable unit, and to profile the water quality transition above the saltwater interface. The results of the packer tests conducted in the Avon Park Formation are presented in Table 12. Appendix C presents the results of the off-bottom packer testing.

3.3.3 Aquifer Performance Tests (APTs)

Following construction of the observation and monitor wells at ROMP 20, aquifer performance tests (APT) were conducted in the three aquifers delineated during test drilling. Hydraulic data was obtained from both the Upper and Lower Intermediate aquifers (Hawthorn Group) of the Intermediate aquifer system, and from the Suwannee Limestone of the Upper Floridan aquifer. Results of the three aquifer performance tests conducted at the site are summarized in Tables 9,10, and 11.

Pumping phases of the Upper and Lower Intermediate aquifer tests were run for 29 and 28 hours, respectively. The pumping phase for the Suwannee/Floridan APT was run for 25 hours. Time-drawdown and recovery data was collected in the pumping well and observation wells completed in the test zones. The APT designs and analysis methods are described in subsequent sections of this report. The test data and preliminary aquifer analysis for the Upper and Lower Intermediate APTs are presented in Appendix D and E, respectively. Data

and aquifer analysis for the Suwannee-Floridan APT are included in Appendix F.

3.4 Geophysical Logging

Borehole geophysical data was collected during various stages of the test drilling at ROMP 20 to aid in aquifer delineation and stratigraphic interpretation. Geophysical logs were run both during test-core drilling and additional exploratory drilling. Log data was also collected to evaluate borehole conditions during formation packer testing in the Avon Park Formation, and during the Suwannee-Floridan Aquifer APT. A discussion of selected geophysical logs with interpretations is included in Section 8.0 of this report.

4.0 SUMMARY OF DRILLING ACTIVITIES

4.1 Test Core Drilling

Test core drilling at ROMP 20 was conducted in three stages from land surface to a total depth of 1439 feet BLS. Continuous lithologic and ground-water samples were collected during core drilling to delineate stratigraphy and characterize aquifer systems at the site. Details of the three test coreholes are shown in Figure 4. Results of water quality sampling are given in Tables 1 through 5.

The first coring stage (Corehole No. 1) began with collection of continuous sediment samples by hollow stem auger drilling from land surface to a depth of 44.5-feet BLS. At this point, the augers were seated in clay sediments, and continuous wire-line core drilling was conducted through the hollow stem augers to a depth of 88.5-feet BLS. Prior to commencing the next stage of coring, Corehole No. 1 was abandoned by plugging the corehole and auger hole with neat cement grout.

The second stage of coring (Corehole No. 2) was conducted in the 12-inch PVC casing previously installed at the site to a depth of 75 feet. A 4-inch, flush threaded, temporary steel casing was set at 88 feet BLS in the well, and wire-line core drilling continued from 88 feet to a total depth of 519.0-feet BLS. Following completion of Corehole No. 2, the corehole was plugged with neat cement grout from 519 feet up to 362 feet. A temporary bentonite plug was then set from 362 feet up 123 feet, which was subsequently drilled out during construction of a temporary observation well.

The third and final stage of exploratory core drilling was conducted in the 6.0-inch, 500.0-foot deep well previously constructed on the permanent monitor site easement. Core drilling resumed after setting the 4.0-inch temporary steel casing to a depth of 500.0-feet BLS. The 4.0-inch steel casing was reset at depths of 900.0 and 1000.0-feet BLS as core drilling progressed to a total depth of 1439.0-feet BLS. The corehole was then plugged with neat cement grout from 1439 feet up to a depth of 1300 feet BLS, to isolate poor quality water encountered at the saltwater interface in the fractured dolostones of the Avon Park Formation. The temporary cement plug was drilled out during the additional exploratory drilling conducted in the well.

4.2 Additional Exploratory Drilling

Data collected during the exploratory drilling phase included lithologic cuttings description, packer testing, and water quality sampling above and into the saltwater interface. Additional exploratory drilling and testing was initiated following the analysis and interpretation of lithologic core and associated water quality data. All additional exploratory drilling and testing was conducted in the 6 inch well used for drilling of Corehole No. 3.

Exploratory drilling began by reaming the existing 3 inch corehole to a 6 inch nominal diameter hole from 900 feet to the top of the corehole plugback at 1300 feet BLS. The exploratory drilling plan specified that a series of four packer tests were to be conducted in the Avon Park Formation between 1200 feet, and the top of the dolostone section identified at a depth of 1430 feet. A final packer test was included, between 1430 feet and the total exploratory drilling depth of 1480 feet, to confirm the presence of the saltwater interface in the permeable dolostone section.

The packer testing schedule was designed to verify the water quality profile and provide an estimate of formation permeability in the section of Avon Park Formation above the saltwater interface. The packer testing schedule consisted of two sets of off-bottom tests on 50 and 100 foot intervals, plus a final packer test in the bottom 40 feet of test hole. Results of the five off-bottom packer tests conducted during exploratory drilling are summarized in Table 12.

Geophysical data was obtained between each test interval, including a caliper log to determine the best location for setting the formation packer assembly. The packer test interval was then pumped by air-lifting for a prescribed time and drawdown vs. time values were recorded. Subsequent to the drawdown phase of the tests, water quality samples were obtained with a point source bailer lowered through the drill pipe to a point

immediately above the formation packer setting depth. Field parameters were measured and the water samples were processed for submittal to the District laboratory for analysis. The results of water quality samples from packer tests conducted during exploratory drilling are presented in Table 8, with a comparison of water quality results during coring across the same interval.

5.0 GEOLOGY

The ROMP 20 wellsite is situated along the coastal margin of the west-central Florida peninsula within the Gulf Coastal Lowlands physiographic province (White,1970). The geomorphology surrounding the site is primarily a low relief terraced shoreline environment with tidal creeks and narrow barrier islands forming an estuarine setting. The wellsite is approximately 1.5-miles east of the Gulf of Mexico, between, two tidally influenced surface drainage features, North and South Creek. Numerous man-made drainage features also exist in the study area which may effect the shallow gound-water system. A generalized geologic and hydrostratigraphic framework in the region of the wellsite is presented on Figure 3. The following sections present a detailed discussion of the geologic framework underlying the ROMP 20 wellsite.

5.1 Undifferentiated Surficial Deposits (Pleistocene-Pliocene)

Corehole No. 1 penetrated sediments comprising the Undifferentiated Surficial Deposits. These deposits, described from land surface to 38.5 feet below land surface (BLS), are composed of fine grained, quartz sand with variable amounts of clay and phosphate grains. Iron oxidation was prevalent as a stain or coating on sand grains and other . A shelly sand unit was described at the base of the deposits which has been tentatively identified as Calooshatchee Formation.

5.2 Hawthorn Group (Miocene)

The Hawthorn Group sediments (Scott, 1988) consist of the Peace River Formation and Arcadia Formation, and are present from 38.5 to 479 feet BLS. The Peace River Formation extends from 38.5 to 70 feet, and includes the Venice Clay Member from 48.5 to 70 feet BLS. The Peace River Formation consists of sandy phosphatic clays, and phosphatic gravel with thin interbeds of carbonate rocks. The Arcadia Formation underlies the Peace River from 70 to 479 feet BLS, and including the Tampa Member from 247 to 398 feet BLS, with Undifferentiated Arcadia Formation continuing from 398 to 479 feet BLS. The upper Arcadia consists of phosphatic limestones, interbedded sandy phosphatic clays and silty dolostones. The Tampa Member of the

Arcadia Formation is composed primarily of sandy fossiliferous limestone, with minor amounts of clay, dolomite and phosphate. The lower Undifferentiated Arcadia is comprised of phosphatic dolostone and dolomitic limestone.

5.3 Suwannee Limestone (Oligocene)

The Suwannee Limestone (479 to 889 feet BLS) is composed mainly of a fossiliferous limestone, with varying amounts of sand and clay. Much of the Suwannee described at the site is a fossiliferous, biogenic calcarenite consisting of foraminifera (Sorites ?, Dictyconus cookei), mollusks and gastropod molds and fragments. The base of the Suwannee from 645 to 682 feet BLS consists of a low permeability dolostone unit forming the unconformable contact with the underlying Ocala Limestone. The dolostone unit was described as a dark to light brown, fine grained crystalline dolostone with variable amounts of organics throughout.

5.4 Ocala Limestone (Upper Eocene)

The Ocala Limestone was identified in the corehole from 885 feet to 1208 feet, and is composed of fine grained, low permeability calcarenite and crystalline dolostone. The limestone section is present from 885 feet to 1000 feet and is a poorly indurated, fine grained, foraminiferal calcarenite typical of Ocala lithology. A well indurated crystalline dolostone section occurring from 1004 feet to about 1165 feet BLS, forms a significant permeable zone in the Ocala. The dolostone unit contains fossil molds of foraminifera common to type Ocala lithologies, but partial tests and molds of the Eocene echinoids were also common and abundant in places. The echinoid fossil is typically identified in the Avon Park Formation, although other lithologic criteria, ie. grain size, organic content, and the presence of the foram Dictyoconus americanus warranted moving the Avon Park Formation contact lower. Presence of the echinoid fossil molds and vertical fractures in the dolostone imparted significant porosity and apparent permeability to this section of Ocala Limestone.

5.5 Avon Park Formation (Lower Eocene)

The Avon Park Formation (1208.0 to T.D.) was delineated from the overlying Ocala Limestone by lithologic changes and the presence of interbedded organic materials. Faunal indicators described in the Avon Park Formation include echinoids (Neologanum dalli) and diagnostic foraminifers (Dictyconus americanus, Coskinolina floridana). Interbedded fractured, crystalline dolostone, and dolomitic calcarenite are the predominant lithologies of the Avon Park Formation.

6.0 HYDROGEOLOGIC INTERPRETATION

The hydrogeologic framework interpreted from core data at ROMP 20 consists of a complex, multi-layered artesian aquifer system. Aquifers delineated during drilling and the relationship between geology and hydrostratigraphy is shown in Figure 3. Aquifer identification is based on lithology and water level data, as well as changes in water quality. Aquifer boundaries at ROMP 20 generally coincide with geologic contacts, where porosity and apparent permeability are the greatest. Vertical variation in porosity is most evident at lithologic contacts, where sediment character may be conducive to an increased dissolution from ground-water flow. This relationship may not continue on a regional scale, although a general correlation between geologic and hydrologic stratigraphy is useful when detailed aquifer data is not available.

Three aquifer systems were identified through the course of test drilling conducted at the site; the Surficial aquifer system, the Intermediate Aquifer System (IAS), and the Floridan Aquifer System (FAS). The following sections provide a detailed description of these three aquifer systems.

6.1 Surficial Aquifer System (SAS)

The Surficial Aquifer extends from land surface to a depth of 48.5 feet, and is composed primarily of fine grained, iron stained quartz sand and sandy clay. Less permeable clay beds containing phosphorite and limestone clasts are present from 10.5 to 13.5 feet, and again from 32 to 38.5-feet BLS. These erosional surfaces mark contacts of what may be Caloosahatchee Formation, or a unit of an equivalent Post-Miocene depositional age. Beds of phosphorite sand and gravel underlie the erosional contact marking the top of the Peace River Formation of the Miocene age Hawthorn Group. The Peace River Formation consists of clayey phosphatic sand with thin beds of carbonate rock, which extends to a depth of 70 feet. This thickness includes the non phosphatic clay unit referred to as the Venice Clay bed (Joyner and Sutcliffe, 1976), with the top of the clay bed marking the base of the Surficial Aquifer at a depth 48.5-feet. Water levels in the aquifer generally ranged from 3.0 to 5.0-feet BLS.

6.2 SAS Water Quality

Water levels and water quality data from the Surficial Aquifer were obtained from the surficial monitor well previously constructed on the site for use as a water supply during drilling operations. Water quality in the Surficial Aquifer was surprisingly poor. A sample retrieved from the monitor exhibited a heavy iron oxy-hydroxide coloration, and chloride levels were near the limit of potable water quality standards, measured at

a concentration of 240 parts per million. The iron coloration in the Surficial aquifer groundwater is from a prevalent iron stain or coating on quartz sand grains in the surficial sediments, and the elevated chloride concentrations are apparently an effect of tidal creeks and drainage features in the vicinity of the wellsite.

6.3 Intermediate Aquifer System (IAS)

The Intermediate Aquifer System includes two aquifer zones and three confining or semi-permeable units. The IAS is contained entirely within Hawthorn Group sediments, from a depth of 48.5 to 479 feet BLS. The upper section of Peace River Formation, above the Venice Clay bed may represent the first artesian zone described by Joyner and Sutcliffe (1976), but water level data was not obtained across the interval to verify the existence of this zone. The lack of a laterally continuous confining bed between this section and overlying surficial sand and clay supports including the upper section of Peace River Formation in the Surficial Aquifer.

The two artesian aquifers of the IAS described in this report are the Upper Intermediate Aquifer (UIA), and the Lower Intermediate Aquifer (LIA). These units are equivalent to the Tamiami-Upper Hawthorn aquifer and Lower Hawthorn-Tampa aquifer described by Wolansky (1983), and also correlate with Joyner and Sutcliffe's (1976) artesian zones 2 and 3 of the Intermediate Aquifer System. Generalized stratigraphic columns from core drilling data through the IAS is shown in Figures 3 and 4. Potentiometric levels in the IAS, ranged from about 10 feet BLS in the UIA, to about 1 foot above land surface (ALS), in the confining unit below the base of the LIA.

6.3.1 Upper Intermediate Aquifer

The Upper Intermediate Aquifer (UIA), was identified from 70 feet to approximately 125 feet BLS, in the upper Arcadia Formation of the Hawthorn Group sediments. The UIA consists of fossiliferous limestone and interbedded dolostone and is positioned immediately below the Venice Clay confining unit. Lithologies present below 125 feet are generally low permeability beds of phosphatic dolostone and clay that form the confining unit between the Upper and Lower Intermediate Aquifers. Potentiometric levels measured in the UNA during core drilling were 9.0 to 10.0-feet BLS.

The Upper Intermediate Aquifer at ROMP 20 is limited in thickness but is a productive water-bearing zone with comparatively fresh water quality. The shallow depth and restricted vertical extent of this zone, coupled with the close proximity to the coastal margin makes the aquifer potentially vulnerable to saltwater contamination from over pumping. A thick sequence of confining materials separates the Upper Intermediate Aquifer from poorer ground-water quality found in deeper aquifers, and provides a competent barrier from potential upward movement of mineralized waters from the Lower Intermediate Aquifer. The Venice Clay bed is an effective

upper confining unit in retarding downward movement of the higher chloride ground-water within the Surficial Aquifer, but also could restrict localized recharge to the Upper Intermediate Aquifer.

6.3.2 Upper IAS Water Quality

Water quality in the UIA was generally good, although sulfate concentrations were elevated above potable standards (Table 2). Chloride concentrations were stable at 92 ppm, and sulfate content was measured at 450 ppm, with a total dissolved solids concentration of 1100 ppm.

6.3.3 Lower Intermediate aquifer

The Lower Intermediate Aquifer (LIA), was penetrated during core drilling from 250 of 370 feet BLS, including the entire limestone section of the Tampa Member in the Arcadia Formation. Water levels measured in the test well increased steadily through the upper confining unit and into the top of the aquifer, ranging from 7.8 feet to 5.8 feet below land surface between the depths of 169 feet and 259 feet. A water level of 2.5 feet BLS measured at a corehole depth of 320 feet BLS was the highest static level observed in the LIA during test drilling.

Core drilling continued through a basal calcareous clay, below the permeable limestone of the Tampa Member, into dolostones and dolomitic limestones of the undifferentiated Arcadia Formation. The lower sequence of Arcadia Formation is a less permeable phosphatic carbonate sequence of the Hawthorn Group sediments that forms the lower semi-confining unit of the Intermediate Aquifer System. Macro-porosity features observed in core samples were variable through the section, and low effective porosity probably controls the low permeability characteristics of the unit.

Water levels continued to rise with increased corehole depth, and flowing artesian conditions were observed below a depth of 400 feet BLS. Water levels in the corehole measured across the lower semi-confining unit of the LIA were 1.0-foot ALS at the 400 foot interval, and increased to over 6 feet above land surface at a depth of 479 feet BLS. The highest water level measured was 7.6 feet above land surface as coring continued from 479 to 519 feet BLS into the top of the Suwannee Limestone of the Upper Floridan Aquifer System.

6.3.4 Lower IAS Water Quality

A major change in water quality was observed after the corehole penetrated the upper confining unit and was open to groundwater of the Lower Intermediate Aquifer (Table 2). Relative to the UIA, a twofold increase in total dissolved solids was observed in water samples collected from the Lower Intermediate aquifer. Total dissolved solids ranged from 2100 ppm to 2700 ppm in samples retrieved between 259 feet and 369 feet BLS, with the bulk of this TDS increase attributed to a sharp rise in sulfate concentration. Sulfate levels increased from 450 ppm in the UIA, to over 1500 ppm in the LIA. In contrast to the major jump in sulfate concentrations, a relatively minor increase in chloride concentrations was observed. Chloride levels rose from 92 ppm to 130 ppm between the Upper and Lower Intermediate Aquifers. The highest chloride concentration found in the LIA was 140 ppm, which occurred at a sampling depth of 349 feet below land surface.

Minor changes in water quality were observed along with the increases in potentiometric head. Both water levels and the water quality profile below 430 feet appears to show influences of conditions present in the underlying Floridan Aquifer, possibly due to an increase in porosity and apparent permeability near the base of the Arcadia Formation. Sulfate concentrations steadily from 1540 ppm at 400 feet to 1670 ppm at 479 feet BLS, while chloride concentrations level off and show a slight decrease from 100 ppm at 400 feet, to 85 ppm at 479 feet BLS. The resultant total dissolved solids (TDS) concentration was essentially stable through the lower confining unit and into the Floridan Aquifer System, with average concentrations in the range of 2600 to 2700 ppm. Results of field and laboratory analysis of ground-water samples collected from the Intermediate Aquifer System during core drilling are listed in Table 2. A composite water quality profile through the IAS is presented in Figure 11.

6.4 Floridan Aquifer System (FAS)

The Floridan Aquifer System (FAS), was identified during core drilling from the top of the Suwannee Limestone at 479 feet, to the total corehole depth of 1439 feet BLS, which terminated in the permeable dolostones of the middle Avon Park Formation. The aquifer is comprised of three permeable zones separated by thick sequences of less permeable rock that act as semi-confining units between the permeable zones (Figure 4). The water-bearing zones within the FAS appear to have distinct productivity and water quality characteristics, and are relatively isolated from one another due to the large vertical separation between zones. Overall water quality in the Floridan Aquifer at ROMP 20 is poor, with elevated sulfate levels throughout the aquifer system and high chloride concentrations observed below the first major permeable zone. Configurations of the test well as coring progressed through the Floridan Aquifer are shown in Figure 4, along with a generalized hydrostratigraphic column generated from the corehole data.

The upper permeable section of the Suwannee Limestone comprises the first significant transmissive zone within the FAS. The top of the permeable zone coincides with the stratigraphic top the Suwannee Limestone at a depth of 479 feet BLS, and continues to approximately 570 feet BLS. As stated previously, a portion of the Lower Arcadia Formation may have some degree of connection with the Upper Floridan Aquifer, based on similar water quality characteristics, although stable water levels were not observed until penetrating the top of the Suwannee Limestone. The potentiometric surface of the Floridan Aquifer System in the region of ROMP 20 varies seasonally from approximately 4 to 8 feet above land surface. Water levels measured when coring through the Suwannee Limestone were roughly 7 to 8 feet above land surface, and remained between 7 and 10 feet ALS until the saltwater interface was penetrated in the Avon Park Formation.

A large interval of the Suwannee Limestone from 570 feet to 840 feet BLS is composed of low porosity, fine grained calcarenite of apparently low permeability. Geophysical flow log data collected across the entire interval of Suwannee Limestone indicated most of the ground-water flow entering the well was from the upper 90 feet of the formation, with little contribution below 570 feet BLS. Water sample data from the corehole also indicated a steady degradation in groundwater quality below a depth of 600 feet (Table 3). The change in fluid conductivity is due to an increase in chloride concentration, with no significant change in sulfate levels observed at this depth. A diffuse water quality transition may be present in this less permeable section of the Suwannee Limestone, but chloride concentrations are too low to indicate any major influence of the saltwater interface across the interval.

The remaining section of Suwannee Limestone consists of a basal dolostone unit from approximately 835 to 884 feet BLS. The basal dolostone forms a very low permeability confining unit in contact with the underlying Ocala Limestone. A solution cavity was present directly below the basal dolostone at the formation contact which appeared to be infilled with poorly indurated organic silt. This cavity feature may be the result of a "washout" effect during the drilling process, and water levels and quality measurements did not indicate any hydrogeologic significance across the cavity feature. The cavity zone does not appear to have a significant contribution to groundwater flow in this section of the Floridan Aquifer.

The upper section of Ocala Limestone from 884 to 1004 feet BLS consists of a medium to fine grained limestone having low visible porosity and permeability. Potentiometric levels remained stable, with a slightly fresher water quality observed across this interval during core drilling. This limestone section forms the lower portion of the semi-confining unit between the permeable zone in the Suwannee Limestone and the remaining dolostone unit in the lower Ocala Limestone.

The dolostone section identified from 1004 to 1165 feet in the lower Ocala Limestone forms the second permeable zone within the Floridan aquifer system. This permeable zone is characterized by moldic porosity formed by the dissolution of fossils forams and small echinoids. Although visible porosity features were numerous along with minor fracture sand partings, permeability of this section appeared much less significant than the permeable zone observed in the overlying Suwannee Limestone.

There were notable changes in water levels and water quality compared to data collected through the Suwannee and upper Ocala Limestones. Water levels measured when coring the dolostone unit of the Ocala Limestone were the highest recorded in the Floridan Aquifer. Head measurements ranged from 6.8 to 7.6 feet above land surface when coring between 880 feet and 1000 feet BLS, and increased to 9.8 feet ALS at a corehole depth of 1020 feet BLS. A moderate degradation in water quality was also observed in the permeable dolostone unit, with corresponding increases in both chloride and sulfate concentrations (Table 6).

The last semi-confining unit penetrated during core drilling occurred from 1165 to 1431 feet BLS, comprising the lower 40 feet of Ocala Limestone, and the upper 225 feet of Avon Park Formation. The upper section of this interval is composed of fine grained limestone with interbedded dolostone across the contact between the Ocala Limestone and Avon Park Formation at an approximate depth of 1200 feet. Very fine grained, low porosity calcarenite with thin beds and laminations of organic material dominate the remaining interval of confining unit within the upper Avon Park Formation. Closed vertical fractures and fault planes were a common feature in the core samples, but no evidence of dissolution from ground-water movement across the fractures was present. The fault planes did exhibit vertical displacements on the order of inches to over one foot where the faults cut across organic laminations.

Fractured crystalline dolostone at 1431 feet BLS marks the top of the most permeable section of the Avon Park Formation in FAS at ROMP 20. The permeable zone consists of highly recrystallized, vugular, fractured dolostone and poorly lithified sucrosic dolostone. Large porosity features were present in core samples collected between 1431 feet and the total core depth of 1439 feet BLS. Lithologic cuttings samples collected during additional exploratory drilling indicated the highly permeable dolostone section continued to the total exploratory drilling depth of 1480 feet BLS.

Water levels measured in the corehole continued to increase through the Ocala/Avon Park semi-confining unit and into the top of the highly permeable dolostone. Water levels were recorded at 7.3 feet above land surface at a corehole depth of 1160 feet, which increased to 8.4 feet at 1410 feet, near the base of the semi-confining unit, and measured 9.6 feet above land surface at a core depth of 1439 feet BLS. A final water level measurement subsequent to collecting a ground-water sample from the 1439 foot interval was recorded at 2.8

feet ALS, reflecting a sharp head decline in the water column contained in the core rods. This drop in water level appears to be a density response from saline ground-water within the permeable dolostone, as evidenced by the water quality of the final sample collected from the corehole (Table 6).

6.5 FAS Water Quality

Overall ground-water quality in the Floridan aquifer system at ROMP 20 is very poor, with sulfate and TDS concentrations exceeding drinking water standards of 250 ppm and 500 ppm, respectively. Chloride concentrations ranged from less than 100 ppm to over 500 ppm through the Suwannee Limestone, with sulfate concentrations measured at 1600 to 1700 ppm (Table 3). An increasing trend in chloride concentration continued through the Ocala Limestone and upper Avon Park Formation, ranging from 650 to 1380 ppm, while sulfate levels remained stable. Specific conductance ranged from 2750 to 7600 umho/cm through the Suwannee and Ocala Limestones, and into the upper Avon Park Formation of the Floridan aquifer (Tables 4,5,6).

Water quality degraded sharply while core drilling into the top of the dolostone section in the Avon Park Formation. Ground-water specific conductance increased from 7500 umho/cm at a depth of 1430 feet, to a maximum value of 49,000 umho/cm at 1439 feet BLS. Chloride concentrations elevated from 1380 ppm to 15,600 ppm, reflecting very saline water quality conditions at this depth in the Floridan aquifer. Sulfate concentration also increased from 1700 ppm to over 2100 ppm, indicating a seawater type ground-water in the highly permeable section of the Avon Park Formation (Table 6). Seawater conditions dominated the ground-water quality profile to the total exploratory drilling depth of 1480 feet BLS at the ROMP 20 site.

Results of packer testing across the semi-confining unit (Table 11) indicated that chloride concentrations were significantly higher than values determined from corehole water samples. Groundwater samples retrieved from isolated packer zones below 1300 feet contained chloride concentrations of 3950 ppm to 4400 ppm, which were roughly three times higher than data from corehole water samples. The apparent low permeability of the upper section of Avon Park Formation inhibited the collection of a representative water sample through this interval during core drilling. Based on the packer test data, a diffuse water quality transition appears to be present in the semi-confining unit above the saltwater interface. Again, a much sharper seawater transition appears to dominate ground-water quality characteristics within the highly permeable dolostone section of the Avon Park Formation, based on water quality samples collected during test drilling.

7.0 WELL CONSTRUCTION AND AQUIFER TESTING

Three clusters of wells were constructed at ROMP 20 for use as permanent monitor wells and observation wells during Aquifer Performance Tests (APT) conducted at the site. Five monitor wells were constructed on the permanent site, completed in the aquifer zones identified during test drilling. Two wells, the surficial aquifer monitor and the Suwannee/Floridan aquifer monitor (Figures 5 and 6) were completed in February of 1991, prior to core drilling. Three other wells, the upper Intermediate and lower Intermediate monitors, and Ocala/Floridan monitor, were constructed following core drilling to complete the permanent monitor site. The three permanent wells also served as APT pumping wells for the Upper and Lower Intermediate Aquifers, and for the Upper Floridan Aquifer. Five additional temporary wells were drilled at two separate locations on the site, which were used as observation points for the pumping tests.

Following Aquifer Performance Testing the wellsite easement was fenced off and permanent monitors were equipped with water level recording devices by the District's Hydrologic Data section. Pertinent site data and well construction specifications were also forwarded to staff in the District Ambient Ground-Water Quality Monitoring Program for inclusion into various groundwater quality sampling networks. Water quality analysis from completed monitor wells is presented in Table 14.

7.1 Intermediate Aquifer System

The Upper Intermediate Aquifer monitor was constructed with 8 inch diameter PVC casing to a depth of 75 feet, with an open hole interval from 75 feet to 125 feet BLS (Figure 7). The 8-inch casing was of adequate size to install a high flow, 6-inch electric submersible turbine pump capable of producing the 200 gpm. proposed discharge rate for the APT. A temporary observation well was completed in the UNA approximately 240 feet west of the permanent monitor/pumping well, and is described in subsequent paragraphs of this report section. The Upper Intermediate APT was conducted in December 1992, consisting of a 29 hour pumping phase at a 200 gpm discharge rate. A summary of test data analyses are given in Table 9. A description of the APT setup and test data is included in Appendix D.

The Lower Intermediate Aquifer monitor was constructed with 12 inch diameter PVC casing to a depth of 250 feet, with an open hole interval from 250 to 370 feet BLS (Figure 8). The 12-inch casing diameter was sufficient to install a 6-inch lineshaft vertical turbine pump typically used for aquifer testing for the ROMP. The discharge rate for the Lower Intermediate APT was estimated at 500 gpm based on a specific capacity of 5 gpm\ft. of drawdown that was measured when developing the well at 100 gpm. A temporary observation well was also

completed in the LIA, located 240 feet west of the pumping well. The Lower Intermediate APT was conducted in July of 1992, consisting of a 28 hour pumping phase at a discharge rate of 400 gpm. A summary of the test results is given in Table 10. A description of the setup and test data for the Lower Intermediate APT is given in Appendix E.

7.2 Floridan Aquifer System

The last well drilled at ROMP 20 was a deep Floridan Aquifer monitor completed in the permeable dolostone section of the Ocala Formation. The well was constructed in two stages to facilitate testing of the Suwannee Limestone (Upper Floridan aquifer), prior to final completion as a deep Floridan aquifer monitor. A 12-inch diameter PVC casing was set in the top of the Suwannee Limestone at a depth of 500 feet, and drilled out to a depth of 840 feet below land surface, which comprised the entire limestone section of the formation.

The well was used for the 25 hour pumping phase, Upper Floridan APT, also conducted in July of 1993. Three observation wells, placed on both the permanent wellsite and at the two temporary observation sites, were used to measure drawdown response during the test. The 12-inch well was pumped with a 6-inch lineshaft vertical turbine pump at a discharge rate of 1300 gpm. A summary of the test data analysis results for the Suwannee/Upper Floridan APT is given in Table 11. A description of the test setup and test data are given in Appendix F.

Subsequent to the Suwannee/Upper Floridan APT, the 12-inch well was reconfigured as the deep Floridan monitor by drilling to a depth of 1100 feet and setting 6 inch diameter PVC casing at 1100 feet below land surface. The 6-inch casing was then drilled out to a total depth of 1160 feet BLS, to coincide with the base of the permeable dolostone section of the Ocala Limestone. The test configuration, and final well construction specifications for the Ocala\Floridan monitor is shown in Figure 9. The well was completed as a deep water quality monitor in the first productively permeable zone above the saltwater interface, according to specified criteria for the WRAP monitoring sites.

7.3 Temporary Observation Well Construction

Two groups of temporary observation wells were constructed for use as drawdown observation points during the aquifer pumping tests previously described. All temporary wells drilled at the site were constructed with small diameter casing, and were completed across similar intervals as the permanent test-monitor wells on the site. The observation wells were properly plugged and abandoned upon completion of aquifer testing at the wellsite.

The first temporary site was constructed approximately 240 feet west of the permanent wellsite. Three observation wells were completed in the Upper and Lower Intermediate Aquifers, and the Suwannee Limestone of the Upper Floridan Aquifer (Figure 10). The Lower Intermediate Aquifer well was constructed as a single zone well, and a dual zone well, containing the Upper Intermediate Aquifer and Floridan Aquifer observation wells, was completed from the existing test corehole No. 2. The two Intermediate aquifer observation wells were constructed with 2 inch diameter PVC casings and 2 inch slotted well screens. Silica gravel packs were then placed around the well screen across the observation interval. The Upper Floridan aquifer observation well was constructed with a 6 inch diameter open hole across the observation interval, and 2 inch PVC casing was set, at the top of the Suwannee Limestone, in the 6 inch hole with formation packers.

The second temporary observation site was positioned approximately 200 feet south of the permanent wellsite. This site contained a dual zone well constructed with 2 inch diameter PVC casings and screen/gravel pack completions in both the Suwannee Limestone and the permeable dolostone section of the Ocala Limestone (Figure 11). The dual zone well provided an observation point to measure response below the pumping zone during the Upper Floridan APT, and contained an extra observation well within the pumped zone, in addition to the other two Suwannee/Floridan aquifer observation wells at the other sites.

8.0 GEOPHYSICAL LOG INTERPRETATION

Borehole geophysical logs were collected during test-core drilling and exploratory drilling to obtain additional data for the site hydrogeologic interpretation. Full suites of logs, including caliper, natural gamma-ray, and electric logs, plus borehole fluid temperature and conductivity logs, were collected from land surface to the total exploratory depth of 1480 feet. Geophysical logs were run at many different stages of test drilling and well construction to assess borehole conditions and water quality, and to aid in the placement of downhole packer assemblies for hydraulic testing. Logs were also run following monitor well installation to verify well construction specifications. The following discussion describes geophysical data that was obtained in three phases of logging during core drilling, Suwannee/Floridan monitor construction, and from the exploratory section drilled below the total core depth.

8.1 Phase 1 Geophysical Logging

The first phase of geophysical logging was conducted in corehole 2 following completion of the second stage of test drilling. The test well was configured with temporary 4 inch HW steel casing set at 88 feet BLS, with a

3 inch diameter corehole extending from 88 feet to 519 feet BLS. A partial suite of logs were run, including natural gamma, spontaneous potential (SP), and a single point resistance log (Figure 12). This limited set of log data was obtained primarily for lithologic correlation through the Hawthorn Group formations and intermediate aquifer system. A more complete log suite was run across a similar interval during construction of the temporary Suwannee/Floridan observation well, which will be discussed in the subsequent report section on Phase 2 geophysical logging.

The natural gamma log in corehole 2 was collected from land surface to 517 feet BLS. The log exhibits a typical signature of gamma response through Hawthorn Group sediments, with packages of gamma peaks and troughs superimposed on vertical sequences of high and low gamma activity. Gamma response is directly related to lithology type, ie. carbonate rock or clay, and the relative amounts of accessory phosphate grains in the formations. This allows for a direct correlation of gamma log with lithologic formations, and to some degree, with hydrostratigraphic units.

The truncated section of Peace River Formation is distinguished by a low gamma response across the basal "Venice Clay" (approximately 50 to 65 feet BLS) and a moderate gamma peak marking the contact with the Arcadia Formation. The upper Arcadia Formation, comprising the upper Intermediate aquifer, is apparent by a low gamma intensity from roughly 70 feet to 120 feet BLS. The remaining portion of the upper Arcadia Formation shows variably high gamma activity, with a gamma peak at the contact with the Tampa member at about 245 feet BLS.

Gamma log response for the lower Arcadia Formation is characterized by low gamma activity, from 250 to 320 feet BLS, through the limestone section of the Tampa member, with slightly higher gamma response recorded from the lower portion of the Tampa member. Similar log response is seen through the lower undifferentiated Arcadia Formation to the top of the Suwannee Limestone, where a pronounced decrease in gamma activity is apparent at about 475 feet BLS.

Electric log data was collected in corehole 2 from the bottom of the 4 inch steel casing at 88 feet to 517 feet BLS. The single point resistance log is generally useful to delineate lithology within the wellbore, where carbonate rocks exhibit higher electrical resistance as compared to clay lithologies. Similarly, dolostones typically are more resistive than limestones, depending on the degree of cementation and porosity development. The spontaneous potential (SP) electric log is also useful for distinguishing lithologies, although SP log response is greatly dependant on borehole fluid composition. Geophysical log data from test wells at ROMP 20 were primarily collected while the wells were under flowing conditions, where the borehole fluid consisted of formation water of varied quality. The lack of contrast between borehole water quality and the

adjacent formation fluid quality renders the SP log uninterpretable. Where this fluid contrast between the wellbore and formation exists, the SP response can be used to qualitatively characterize formation and aquifer properties.

Electric log response from corehole 2 correlates, with lithology and gamma log response, formation contacts and aquifer units. A variably high resistance was recorded across the upper intermediate aquifer. The resistive carbonates of the Tampa member (lower Intermediate aquifer) and undifferentiated Arcadia Formation also show moderately high resistance in comparison to overlying clay units that separate the upper and lower Intermediate aquifers.

SP response from 517 feet to about 185 feet BLS is generally flat, due to upward flow of ground-water from the Floridan aquifer (Suwannee Limestone), penetrated at the bottom of the corehole. Water quality in the lower Intermediate aquifer was similar to that of upflowing Floridan waters with little apparent SP response. An SP deflection is apparent above 185 feet, where fresher ground-water of the upper Intermediate aquifer may provide sufficient contrast with borehole fluids. This would suggest that the upper Intermediate aquifer extends as deep as 165 to 185 feet BLS, although the most permeable section of the aquifer unit, as delineated from core analysis, did not extend below 130 feet BLS. The SP response at 185 feet is more likely due to interbedded clays and dolostone confining the lower Intermediate aquifer.

8.2 Phase 2 Logging

Phase 2 logging was conducted during construction of the temporary Suwannee/Floridan monitor, which was constructed by reaming and deepening the existing corehole 2 to a depth of 840 feet BLS. Phase 2 logging (Figures 12 and 12A), was conducted in a 12 inch diameter well cased to 75 feet BLS, with a 6 inch nominal diameter hole open from 75 to 842 feet BLS. A full suite of geophysical logs, ie. caliper, natural gamma, electrics, fluid resistivity and temperature, were run prior to finishing the well as a dual-zone, upper Intermediate/Suwannee Floridan observation well.

The caliper log data shows an approximate hole diameter ranging from just under 6 inches to over 14 inches between the casing bottom at 75 feet BLS and the total hole depth of 842 feet BLS. The size and form of the borehole as depicted on the caliper log trace is largely due to the effects of the drilling process on rock layers of different composition and induration. Tentative interpretations regarding lithology and formational boundaries can be inferred through caliper log inspection, but must always be correlated with, a lithologic description derived from well samples or, other geophysical data.

Variations in borehole diameter are evident at or near formation contacts between the Upper Arcadia and Tampa Member, at 240 to 250 feet BLS. Similarly, a larger borehole trend is apparent below the base of the Tampa into the lower undifferentiated Arcadia Formation. A relatively smooth, gauge-hole section was measured from 445 feet to the top of the Suwannee Limestone at 480 feet BLS, which corresponds to an indurated section of basal Arcadia Formation in the lithologic description.

Borehole diameter through the Suwannee Limestone averaged about 8 inches. The permeable section of the formation from 480 feet to 570 feet BLS is characterized by a rough gauge hole, enlarging to an average 13 inch diameter hole from 570 feet to 620 feet BLS. A smooth caliper trace averaging 9 inches in diameter from 620 to 790 feet correlates with a fine grained, low permeability calcarenite described through the middle section of the Suwannee Limestone. The hole tapers gradually back to a 6 inch diameter from 790 feet to the log bottom of 842 feet BLS, signifying a more indurated section of the formation as the Suwannee becomes dolomitic.

Natural gamma response is similar to the gamma log run in Phase 1 (corehole 2), with typical Hawthorn Group gamma ray signature for this region of the District. Recognizable patterns of gamma response are present across the lower Peace River Formation (Venice clay), through the Arcadia Formation (Tampa Member), and at the contact with the underlying Suwannee Limestone. Gamma activity across the Suwannee Limestone is generally low, with a section of higher gamma response recorded between 640 feet and 690 feet, and near the bottom of the hole from 810 feet to 840 feet BLS.

A suite of four electric logs were run during Phase 2 geophysical logging. These include S.P., single point resistance, and both 16" and 64" normal resistivity logs. S.P. response shows variations through the upper Arcadia Formation and the upper Intermediate aquifer, plus minor deflections at the top of the Tampa Member. A strong baseline shift is evident at the Tampa-lower undifferentiated Arcadia contact, where distinct changes in lithology exist. This S.P. shift also correlates to a water quality change between the lower Intermediate aquifer and a transition in the lower Arcadia Formation to a predominant Floridan aquifer geochemistry. S.P. response remained relatively flat along the shifted baseline through the Suwannee Limestone, with a minor inward deflection near the bottom of the well at 825 feet BLS.

The single point resistance and 16-64 normal resistivity logs exhibit interbedded lithology response through the upper Arcadia Formation. A general correlation is also apparent between gamma log bed response and the electric log curves. A pronounced flat section was recorded through clay above the Tampa Member contact from 200 feet to 250 feet, with a minor resistivity peak marking the unconformity between the units. A second moderate resistivity peak near 380 feet BLS marks the top of a basal clay bed in the Tampa Member,

and the unconformable contact with the lower Undifferentiated Arcadia Formation.

Electric log response showed moderately low resistance and resistivity through the lower Arcadia Formation and into the upper Suwannee Limestone to a depth of 570 feet. Below this depth, electric log response becomes flat, measuring relatively low resistances. The muted response recorded on the log traces appears to be a borehole effect, due mainly to an increase in borehole diameter, as measured by the caliper log. The section of borehole between 570 feet and 800 feet BLS consists of a poorly lithified, low permeability limestone that exhibits an enlarged, smooth "washed" character as a result of the reverse-air drilling process. The formation becomes more competent and lithified below 800 feet, and a slight increase in resistivity is observed on the logs as the borehole narrows to a true drilled diameter of about 6 inches.

Borehole fluid logs were run in Phase 2 of logging as part of the full suite of borehole geophysical parameters. Both fluid resistivity and temperature logs were run from approximately 840 feet up to land surface. Since the wellbore was logged under flowing artesian conditions, ground-water from Suwannee Limestone flowed upward across the Hawthorn Group sediments and the Intermediate aquifers, before exiting the well casing at land surface. Therefore, fluid log response above 480 feet is controlled by borehole waters flowing up from the upper Floridan aquifer, and is not representative of ground-water conditions in the Intermediate aquifer system.

Minor deflections in both fluid resistivity and temperature were recorded in two places, at 495 feet, and between 540 feet and 570 feet BLS. The fluid temperature and resistivity changes are in response to slightly cooler and fresher waters entering the borehole at these depths from permeable zones in the Suwannee Limestone. A third and more pronounced temperature and fluid resistivity response was recorded between 600 feet and 620 feet, marking the base of the permeable section of the Suwannee Limestone. A gradual increase in both parameters was measured from 620 feet to the total log depth of 840 feet, indicating only minor contribution to borehole flow across this interval.

8.3 Phase 3 Logging

Phase 3 geophysical logging was conducted after completion of corehole 3, and upon completion of the additional exploratory drilling. A series of geophysical logs were run during packer testing to assess borehole conditions and verify water quality across the saltwater interface. A full suite of logs was collected from 500 feet to the total exploratory depth of 1480 feet BLS following the final packer test in the fractured dolostone of the Avon Park Formation. Figures 14 and 14A depict a composite of geophysical data collected, from 850 feet to 1480 feet, following exploratory drilling. The log suite recorded geophysical response from the basal dolostones

of the Suwannee Limestone, through the Ocala Limestone, and across the upper-middle Avon Park Formation.

The caliper log shows a smooth borehole of a gauge diameter between 5 ½ to 6 inches. A subtle borehole enlargement, to about 10 inches in diameter, was recorded across calcarenites of the Ocala Limestone from just above 900 feet to 1000 feet BLS. A gauge hole diameter continued from 1000 feet to below 1200 feet through recrystallized dolostones of the lower Ocala Limestone and upper Avon Park Formation. Borehole diameter remained stable through fine grained, well indurated calcarenites of the Avon Park Formation, and across the highly recrystallized dolostone section below 1440 feet. A gauge borehole was recorded on the caliper trace to the bottom of the exploratory well at 1480 feet BLS.

The gamma ray log shows a high gamma activity across the basal Suwannee dolostone section, which sharply decreases at the Suwannee/Ocala contact below 880 feet. Gamma intensity increased below 1100 feet, where a higher degree of dolomite recrystallization is present in the lower Ocala Limestone. A spike of gamma activity was recorded at 1150 feet BLS, possibly marking the Ocala-Avon Park contact, although analysis of core lithology placed the contact lower, based on the presence of Ocala-type foraminifera molds below this depth. Gamma intensity decreased from 1150 feet to just below 1200 feet, which correlated with lithologic interpretations from core analysis.

Low to moderate relative gamma response was observed through the upper Avon Park Formation, which continued to below 1300 feet. Slightly higher gamma activity was recorded from 1340 feet to the top of the highly recrystallized dolostones at 1440 feet BLS. High to moderate gamma continued through the permeable dolostone section to the bottom of the exploratory hole.

Electric log response in the exploratory hole indicated lithologic variations and changes in formation water quality. Dolostone sections in the lower Suwannee, Ocala, and Avon Park Formation all exhibited higher resistance and resistivity. A low resistivity section was apparent, across upper Avon Park calcarenites, from below 1200 feet to the top of the permeable dolostone section at 1440 feet BLS. High resistivity response remained through the dolostone section, with little affect from saline water below 1440 feet to the well bottom.

The SP log response correlates closely with changes in formation fluid at the bottom of the exploratory section. SP signal across most the log run was stable, with only minor positive deflections apparent across the dolostone sections of the borehole. A significant negative shift in SP response was recorded at the top of the permeable dolostone at 1440 feet, where a sharp saline transition was observed in water quality samples. The baseline shift in SP signal is in response to a contrast in borehole fluid composition relative to the adjacent formation water quality, and supports the presence of a sharp saltwater interface. This steep vertical gradient

is apparent from the SP log interpretation, although borehole fluid logs do not readily correlate to the electric response in the exploratory hole.

Borehole fluid logs recorded in Phase 3 logging correlate generally with lithology in the upper part of the well, where changes in fluid temperature and resistivity occur across more permeable dolostone sections. Borehole fluid response in the middle and lower intervals of the exploratory hole appear to be heavily influenced by wellbore flow dynamics. Both temperature and fluid resistivity logs show a stable or gradual response from the well bottom up to 1150 feet, the base of the lower Ocala dolostone unit. This appears to be the result of upward movement of bottom-hole waters from the permeable dolostone section, with little contribution from the overlying formation. A marked temperature decrease and resistivity increase was recorded from 1150 feet to the top of the dolostone unit at about 1010 feet. This is a result of fresher waters entering the borehole from the Ocala dolostones, with fluid parameters stabilizing and remaining fairly constant above 1000 feet. Similarly, a minor deflection in both fluid parameters was observed across the lower Suwannee dolostone unit above 880 feet. BLS.

9.0 SUMMARY

A comprehensive hydrogeologic investigation was conducted at the ROMP 20 Osprey monitor site from February, 1991 through September, 1992. Detailed lithologic and ground-water quality data presented in this report was collected through an exploratory and test drilling program to delineate and assess the hydrogeology at the monitor site. A suite of permanent monitor wells was constructed at ROMP 20 for the purpose of collecting long term, regional ground-water levels and water quality data. The results of this investigation have been incorporated in the report on the Eastern Tampa Bay WRAP, and will also be included in the ongoing assessment of the District's Southern Ground-Water Basin.

Detailed aquifer delineation was accomplished through continuous test core drilling conducted from land surface to a depth of 1439 feet BLS. Additional exploratory drilling was completed, from 1300 feet to a total depth of 1480 feet BLS, to conduct formation packer tests and confirm the position of the saltwater interface in the Upper Floridan aquifer. Several suites of geophysical logs were collected to aid in geologic and hydrostratigraphic analysis, for borehole characterization during packer testing, and for water quality assessment during test drilling.

A series of aquifer pumping tests were completed in the upper and lower Intermediate aquifers, and the Suwannee Limestone of the Upper Floridan aquifer, during and following test drilling and monitor well construction. Hydraulic parameters were derived from drawdown data collected in temporary test-zone observation wells for the three pumping tests conducted at ROMP 20. Tests results will be incorporated in flow models used by District Resource Evaluation and Regulatory staff to aid in determining a "safe yield" threshold for ground-water withdrawals in the region.

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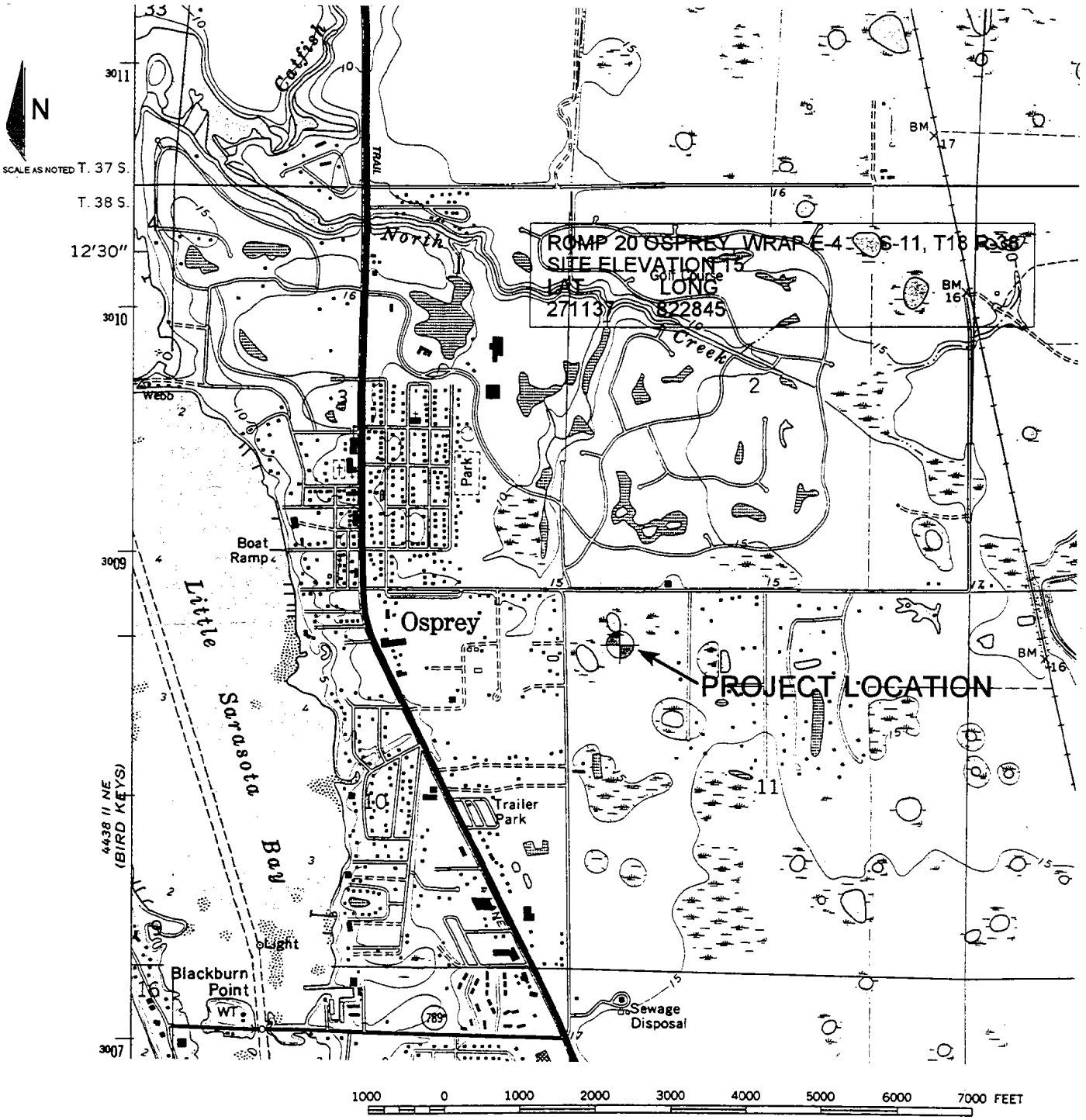
Figures



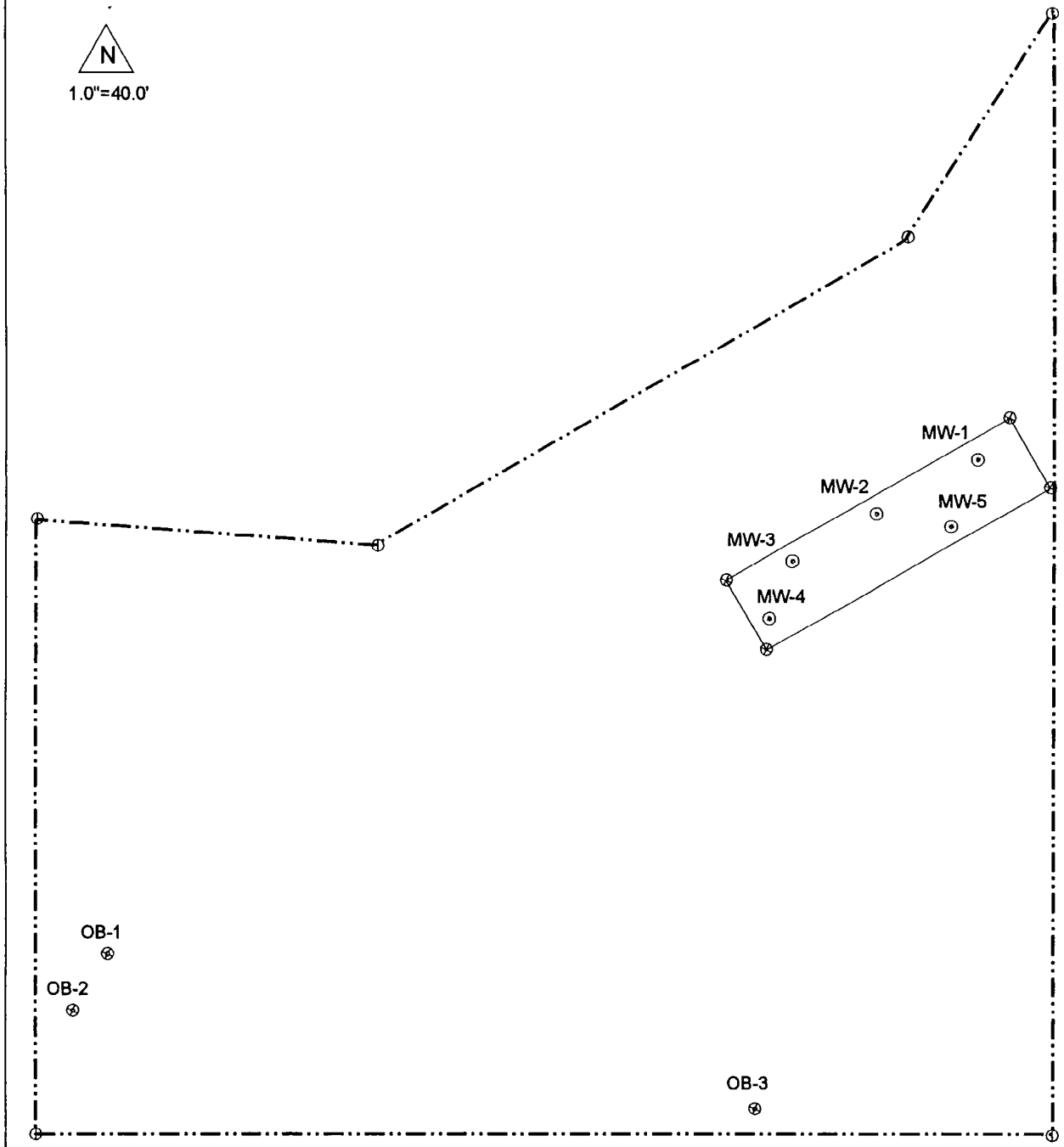
LAUREL, FLA.
27082-B4-TF-024

1973
PHOTOREVISED 1987
DMA 4538 III NW-SERIES V847

FIGURE 1	
ROMP 20 OSPREY	PROJECT LOCATION MAP

QUADRANGLE LOCATION

CONTOUR INTERVAL 5 FEET
NATIONAL GEODETIC VERTICAL DATUM OF 1929
DEPTH CURVES AND SOUNDINGS IN FEET—DATUM IS MEAN LOWER LOW WATER
THE RELATIONSHIP BETWEEN THE TWO DATUMS IS VARIABLE
SHORELINE SHOWN REPRESENTS THE APPROXIMATE LINE OF MEAN HIGH WATER
THE MEAN RANGE OF TIDE IS APPROXIMATELY 2.1 FEET



WELL DESIGNATION	MONITOR ZONE
MW-1	SURFICIAL
MW-2	UPPER HAWTHORN
MW-3	LOWER HAWTHORN
MW-4	SUWANNEE
MW-5	AVON PARK
OB-1(DUAL)	SUWANNEE/UPPER HAWTHORN
OB-2	LOWER HAWTHORN
OB-3(DUAL)	OCALA-AVON PK./SUWANNEE

EXPLANATION

- TEMPORARY CONSTRUCTION EASEMENT BOUNDARY
- PERMANENT EASEMENT BOUNDARY
- TEMPORARY CORNER MARKER
- PERMANENT CORNER MARKER
- MONITOR WELL LOCATION AND DESIGNATION
- OBSERVATION WELL LOCATION AND DESIGNATION

FIGURE 2. ROMP 20 OSPREY

SITE MAP | WELL LOCATIONS

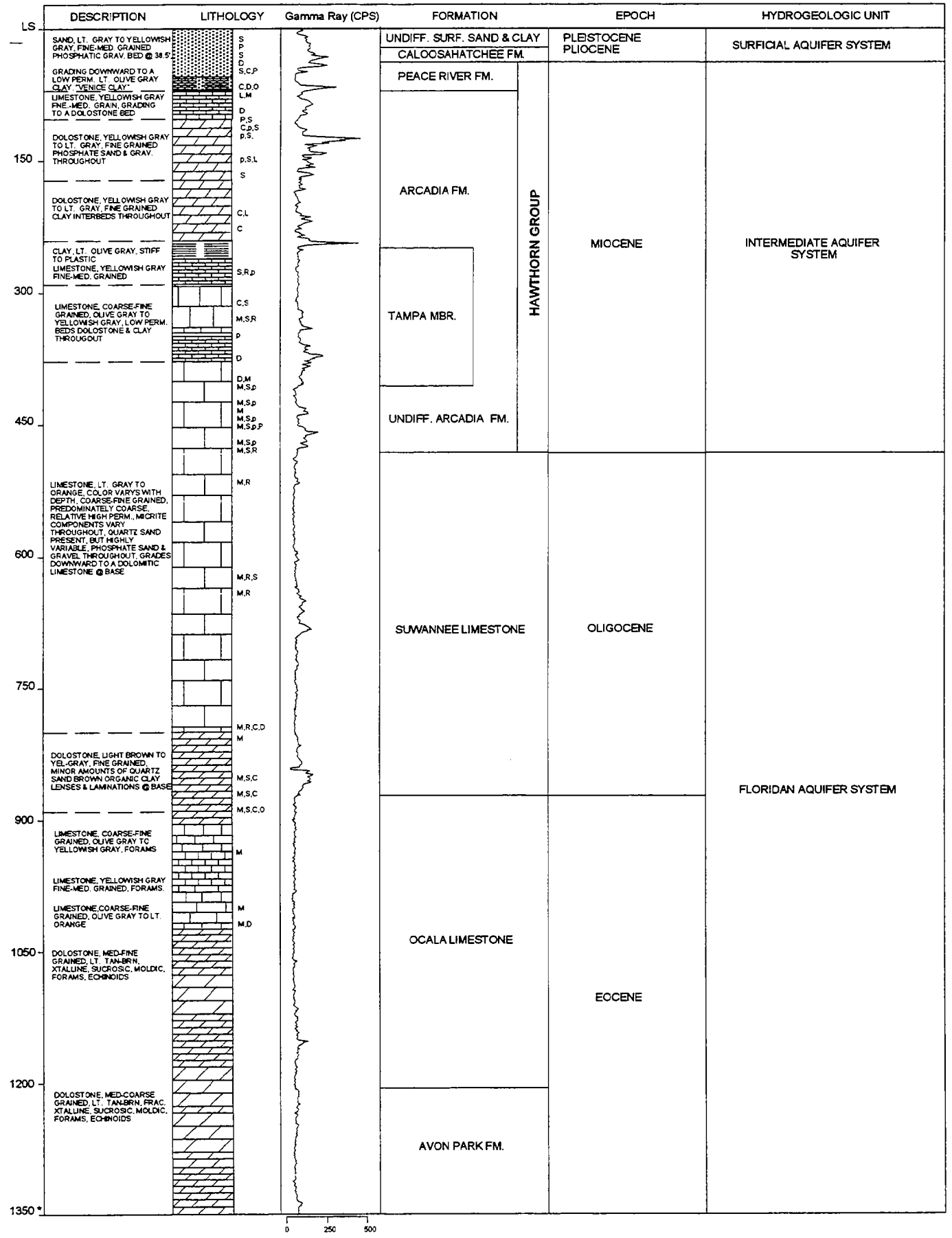
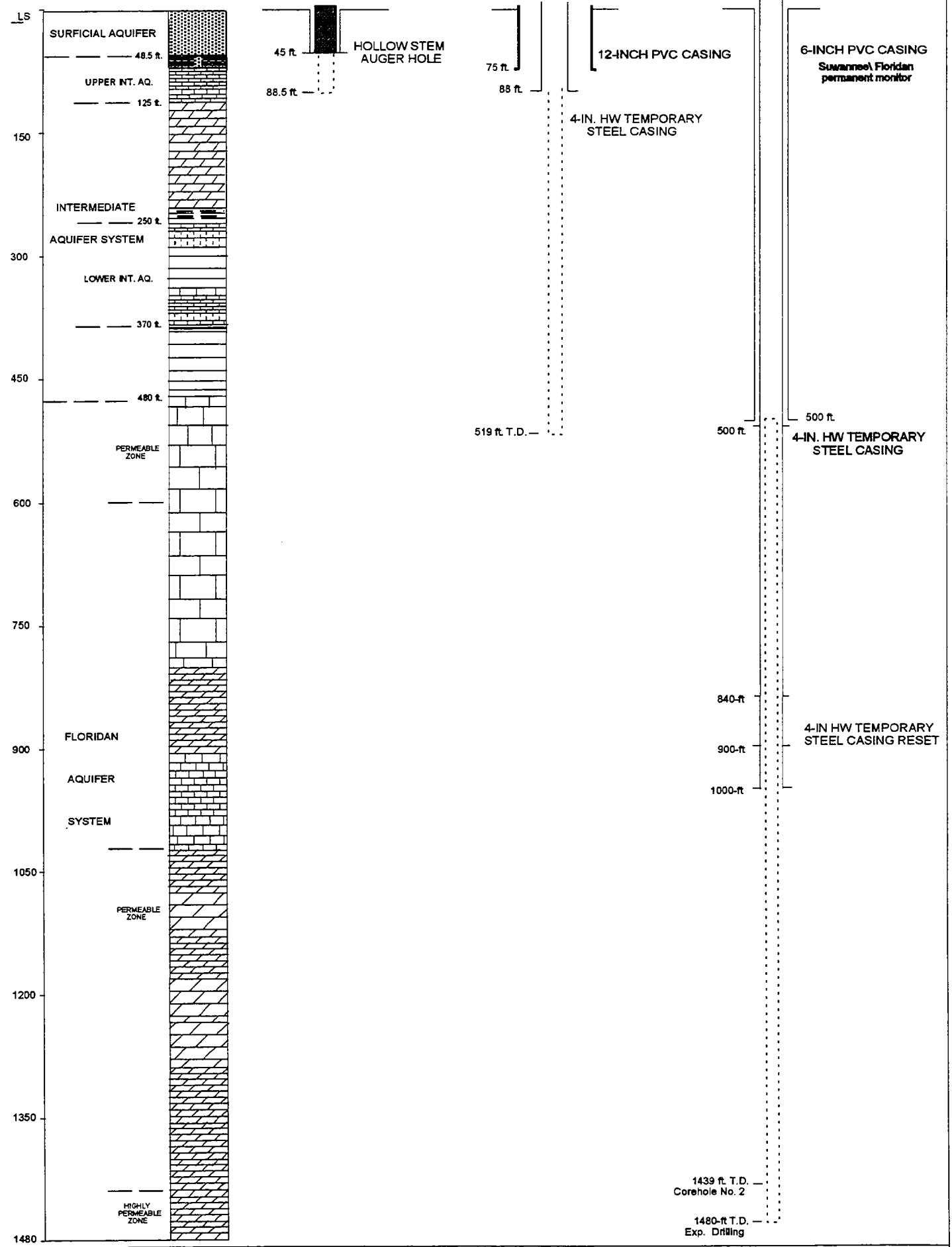


FIGURE 3. ROMP 20 OSPREY

GEOLOGY AND HYDROGEOLOGIC UNITS

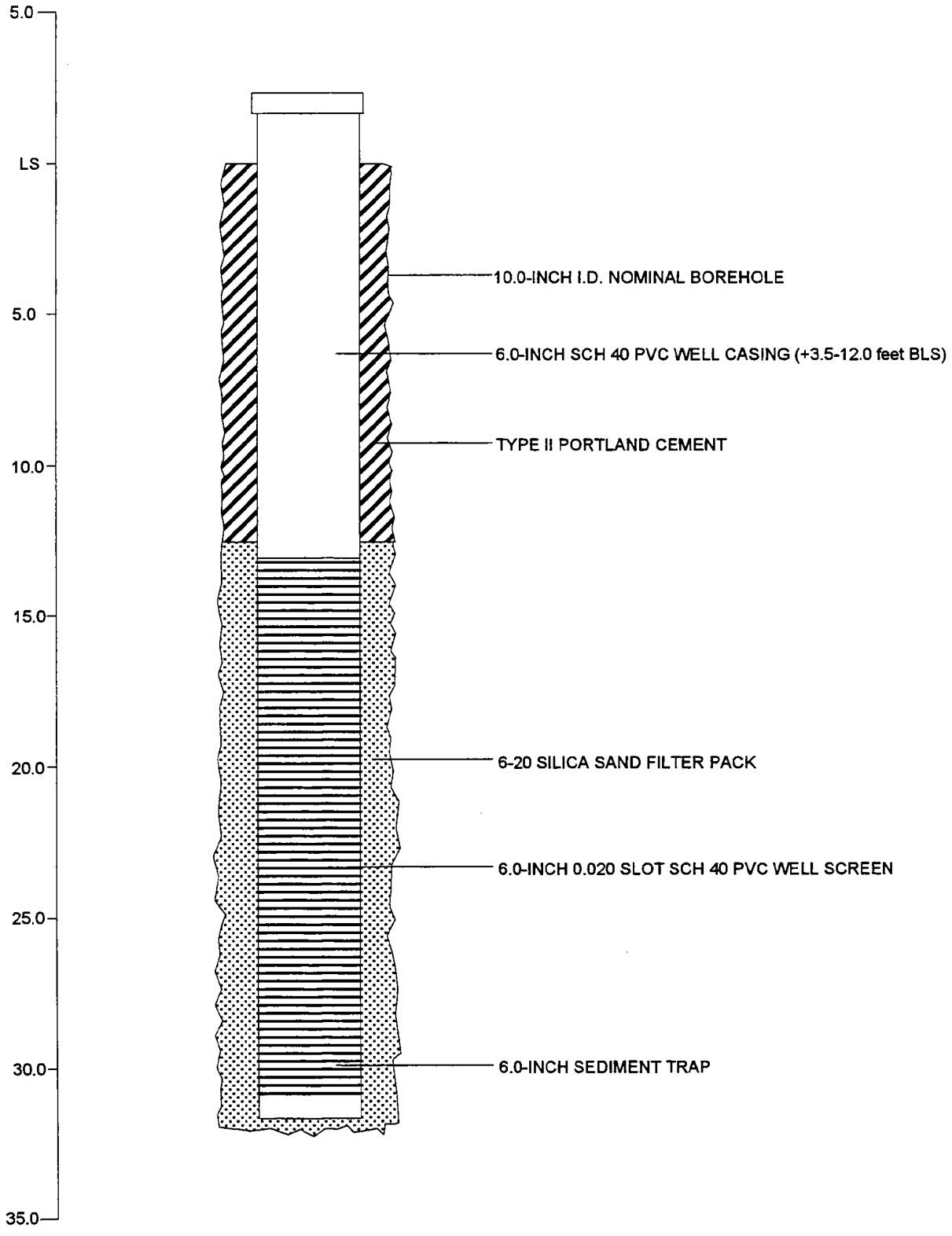
* EXPLORORATORY DRILLING DEPTH, 1480 ft BLS



ROMP 20 OSPREY

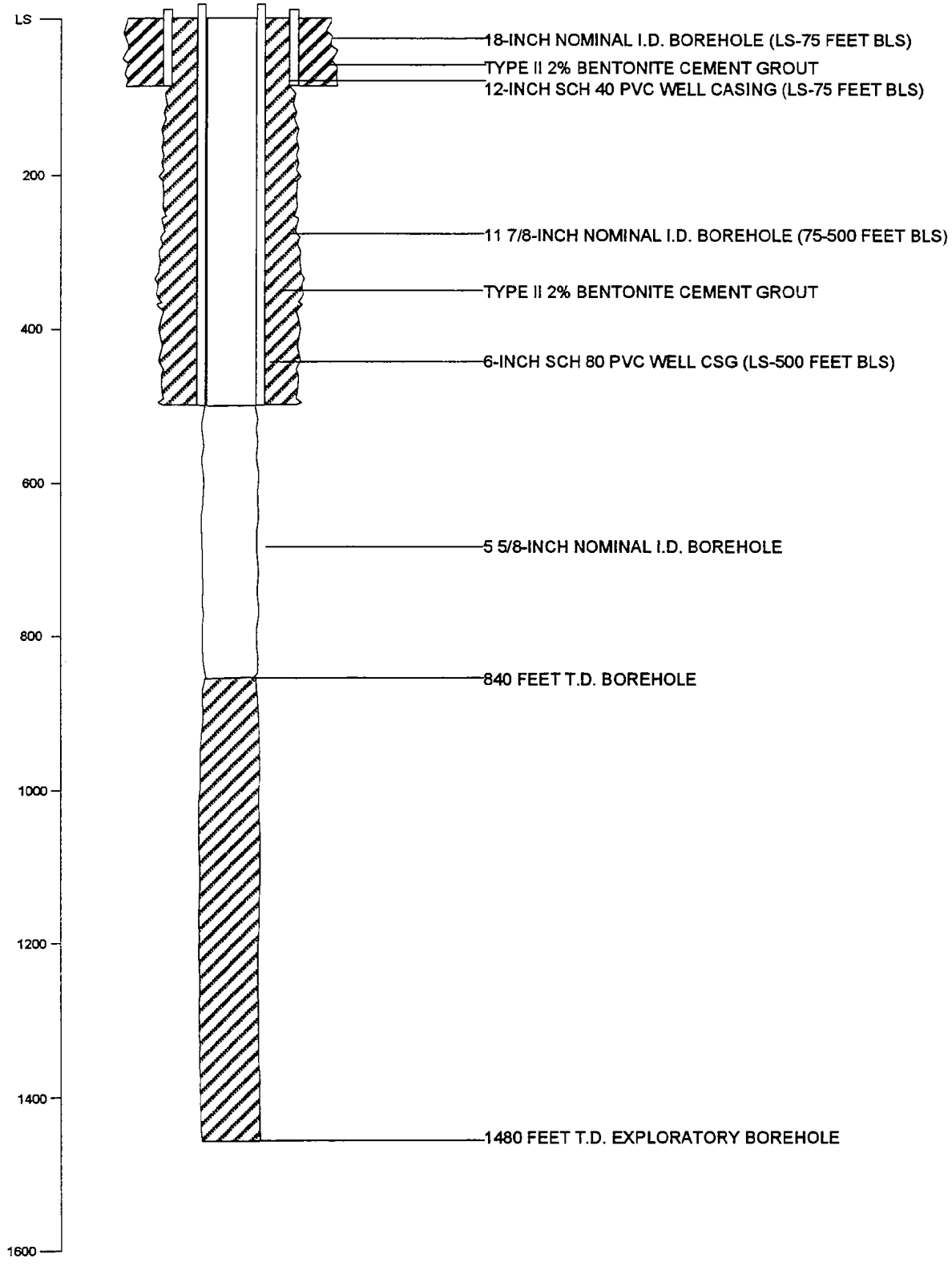
FIGURE 4. CONFIGURATION OF TEST COREHOLES AND GENERALIZED HYDROSTRATIGRAPHY

R20SRF.WPG/12/95/DT



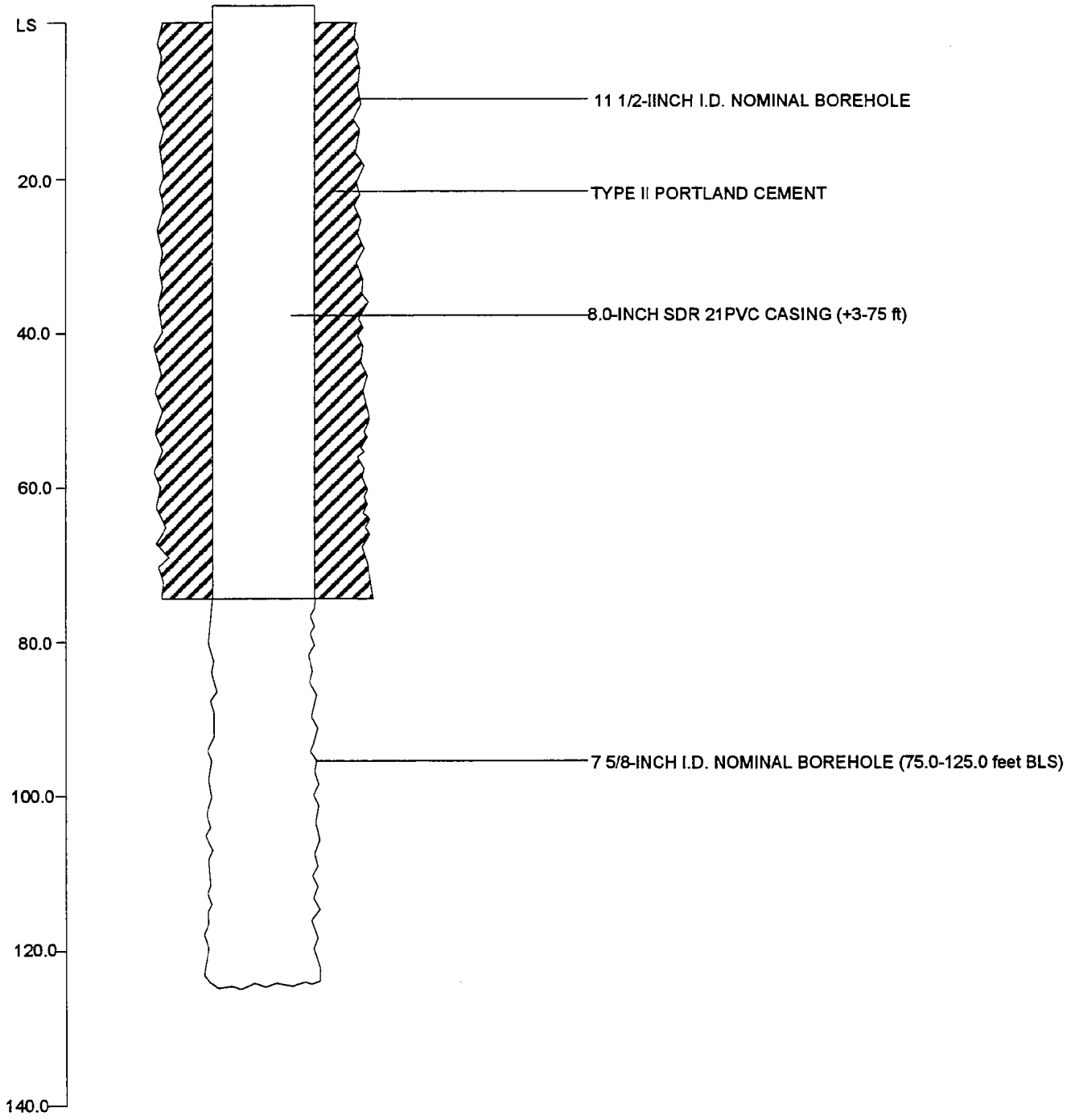
ROMP 20 OSPREY	FIGURE 5. SURFICIAL MONITOR AS-BUILT

R20SUW.WPG/12/05/DT



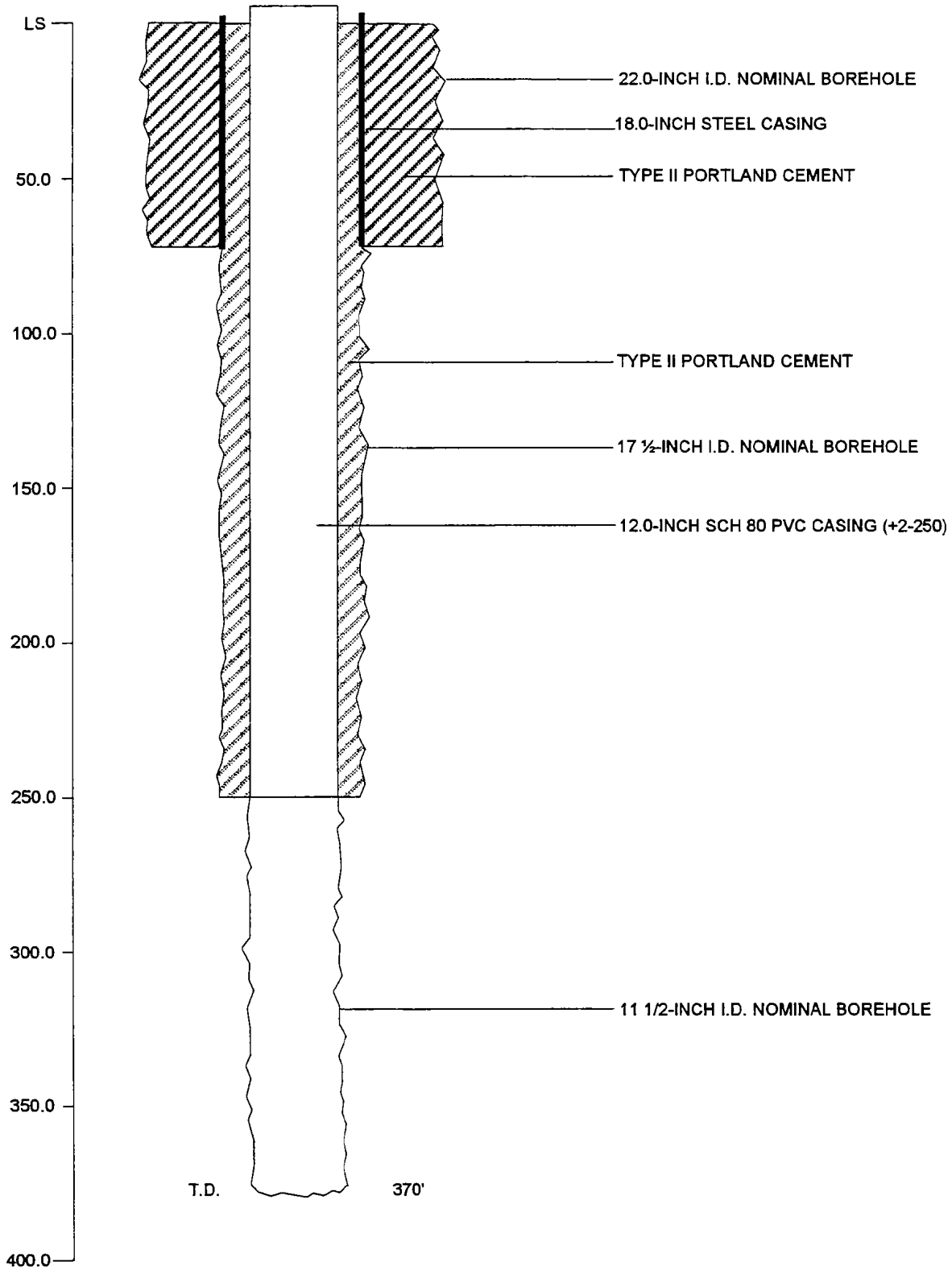
ROMP 20 OSPREY	FIGURE 6. SUWANNEE/UPPER FLORIDAN MONITOR AS-BUILT

R20UINT.WPG/12/95/DT



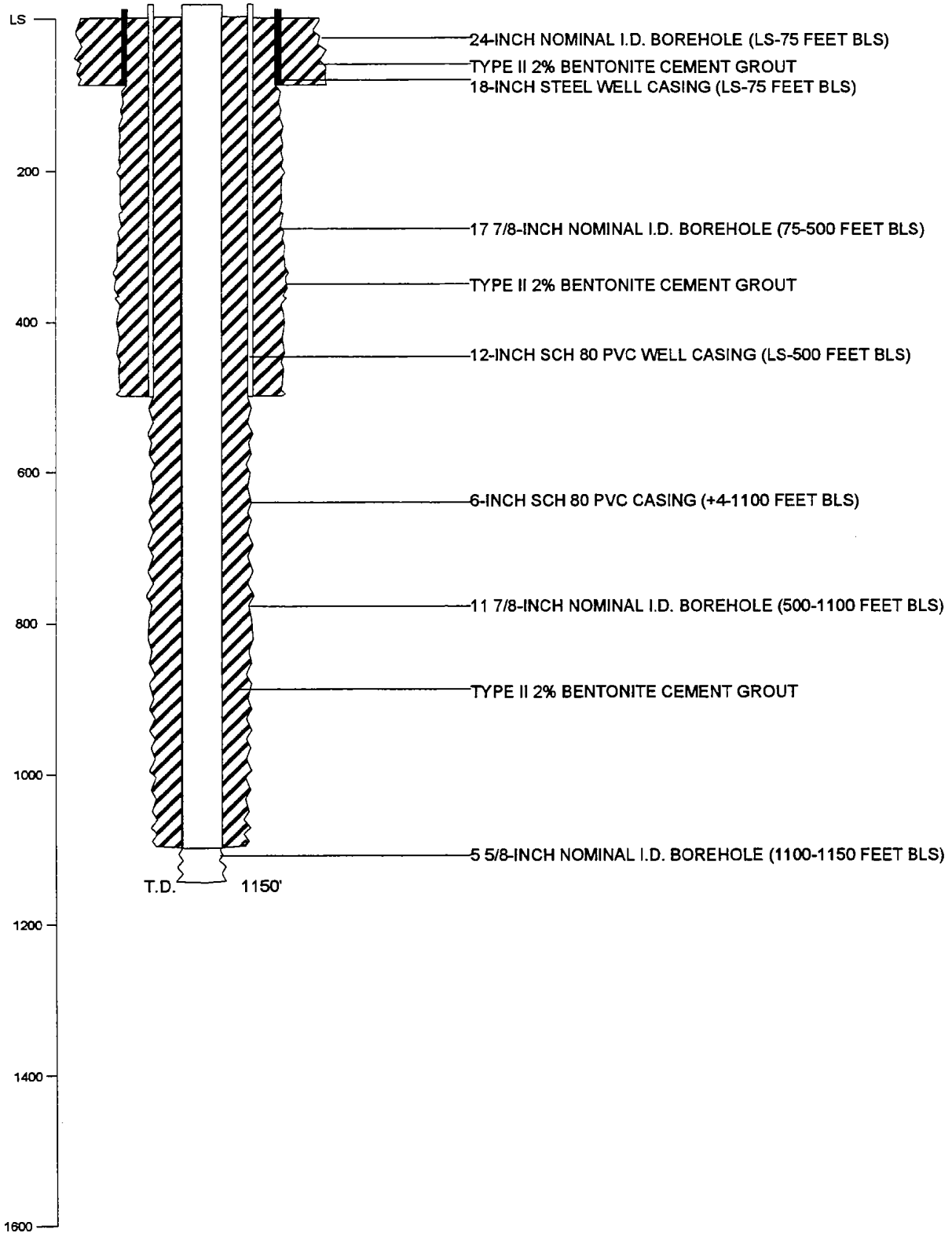
ROMP 20 OSPREY	FIGURE 7. UPPER INTERMEDIATE MONITOR AS-BUILT

R20LINT.WPG/12/95/DT

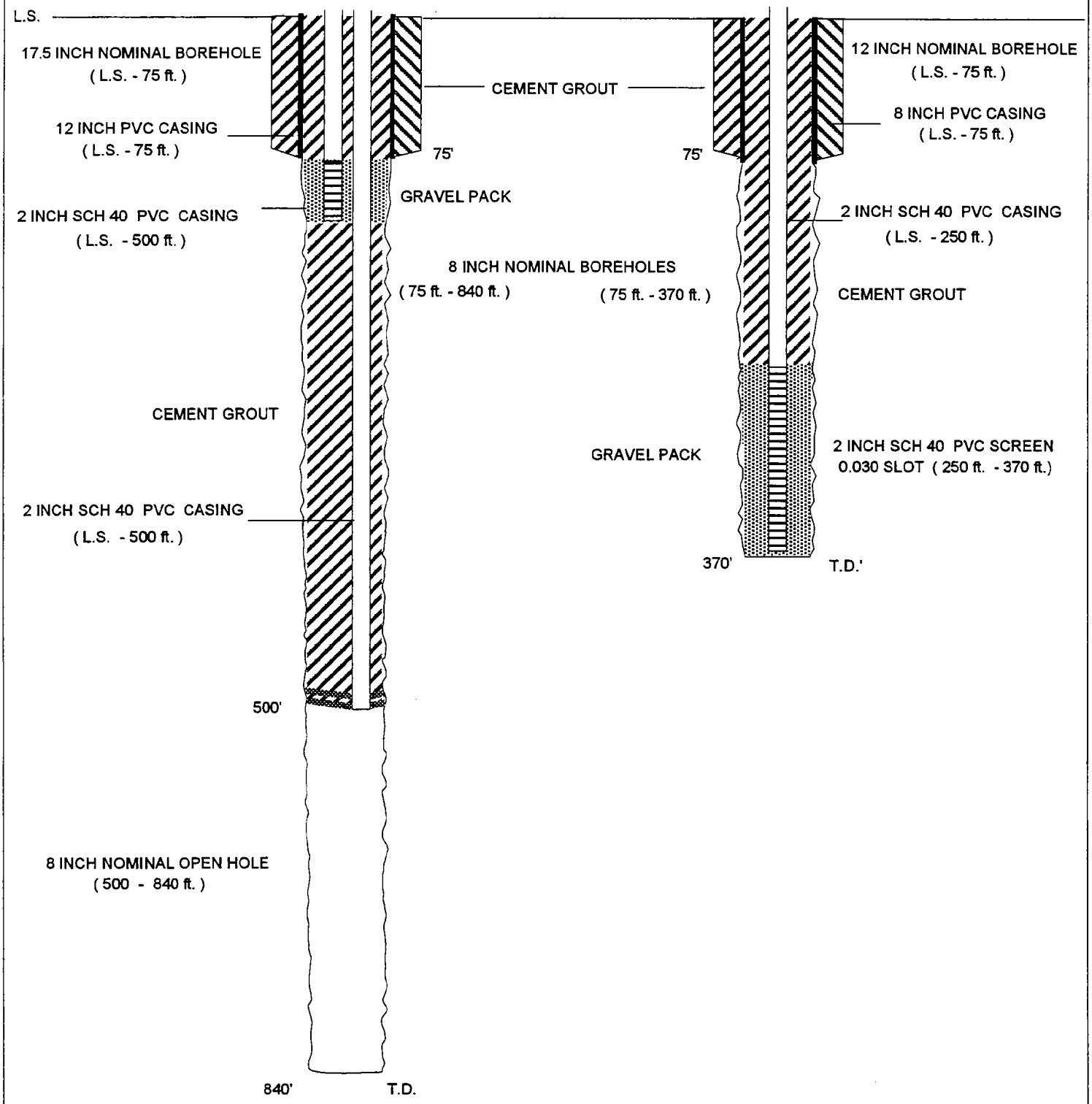


ROMP 20 OSPREY	FIGURE 8. LOWER INTERMEDIATE MONITOR AS BUILT

R20AVPK.WPG/12/96/DT

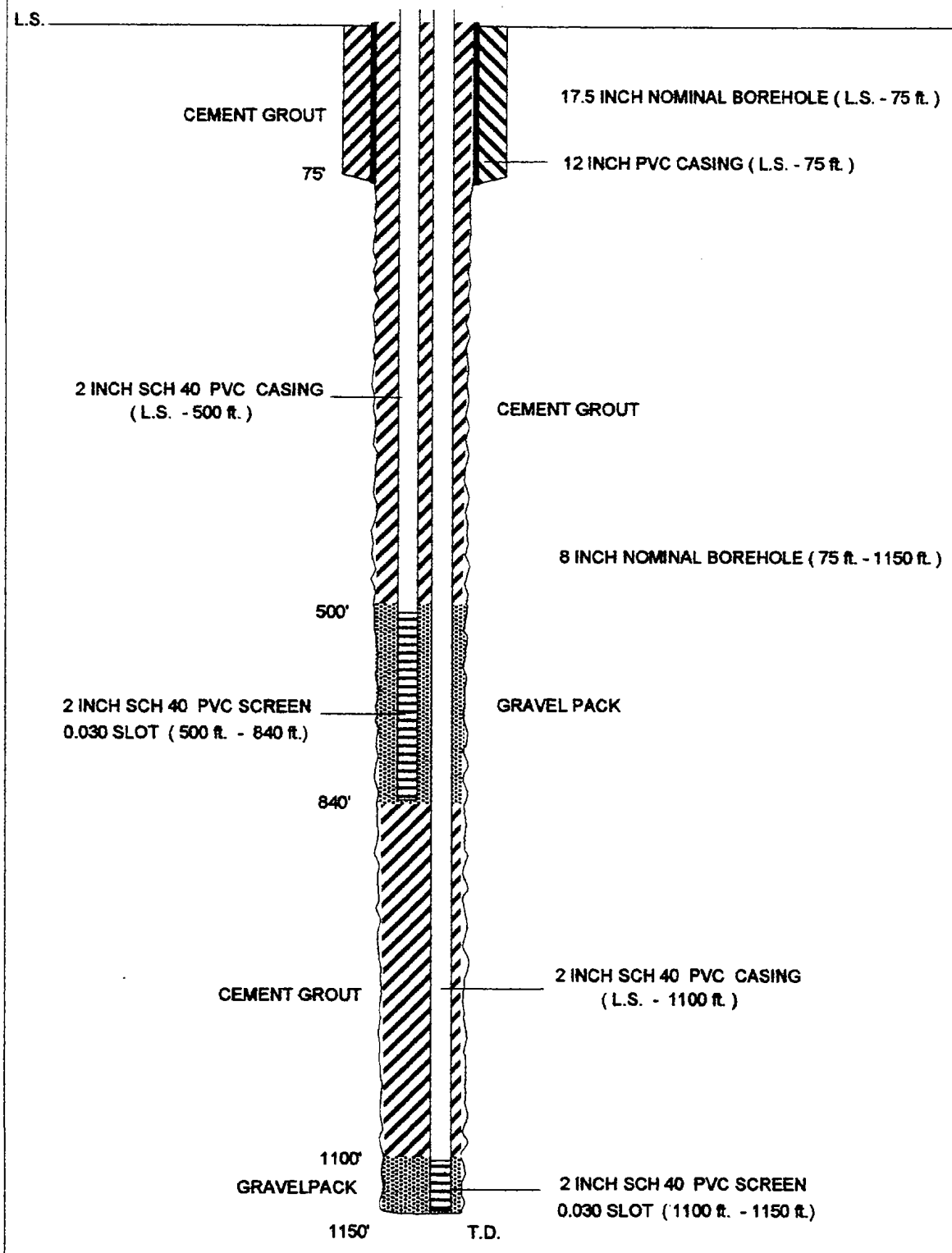


ROMP 20 OSPREY	FIGURE 9. LOWER OCALA MONITOR AS-BUILT

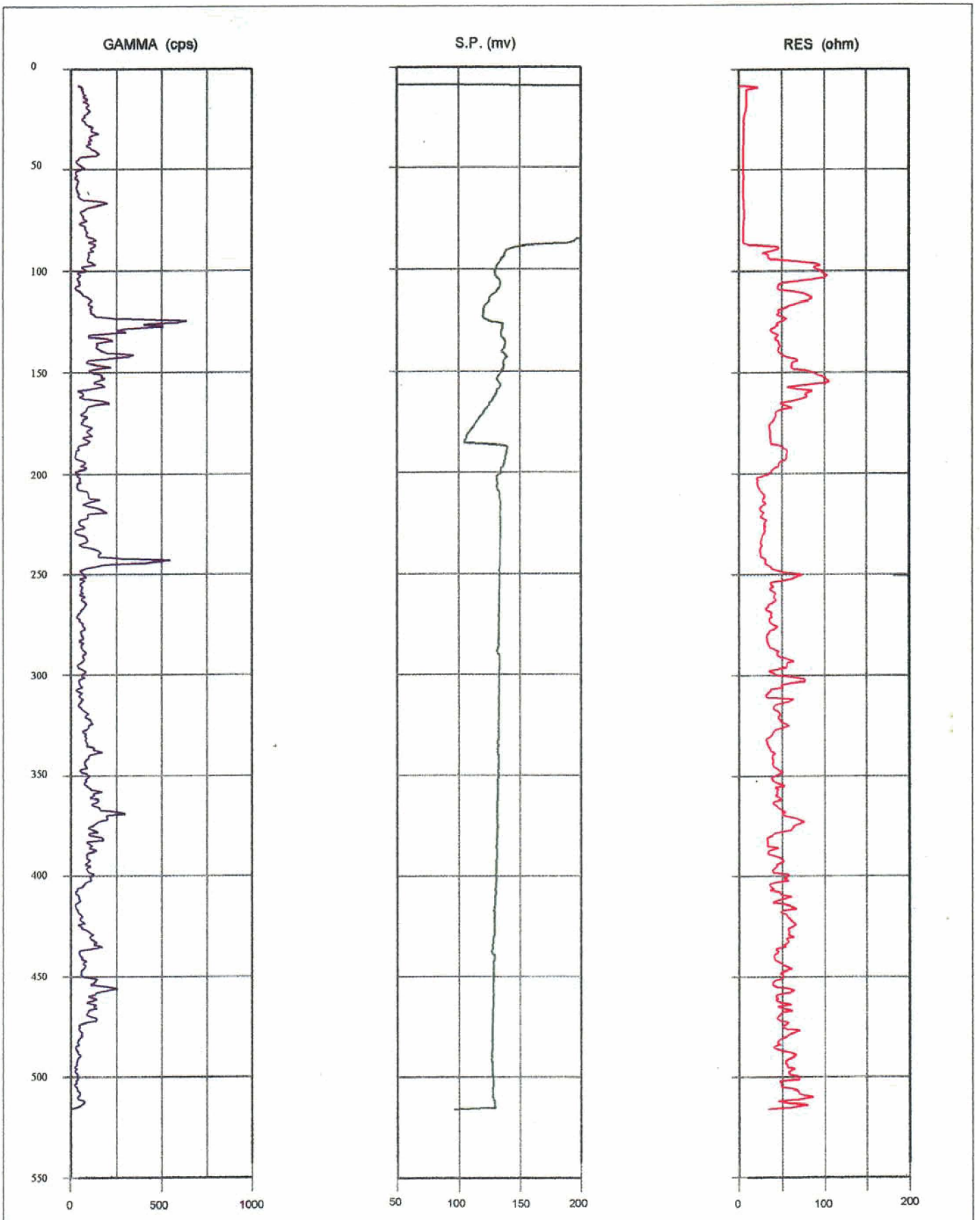


ROMP 20 OSPREY	FIGURE 10. WEST-240 OBSERVATION WELLS AS-BUILT DIAGRAMS

DUAL ZONE SUWANNEE - LOWER OCALA FLORIDAN AQUIFER OBSERVATION WELLS

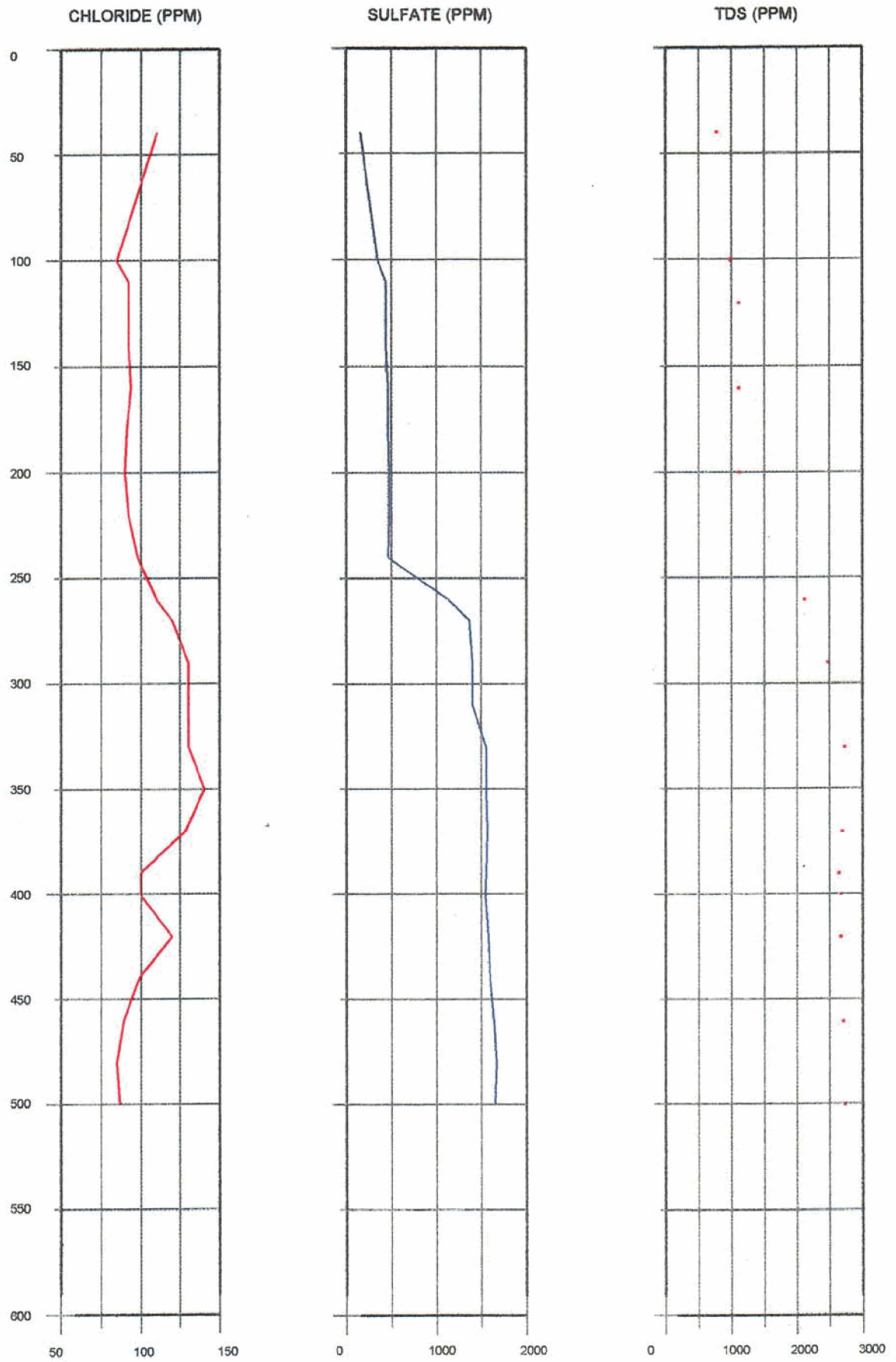


ROMP 20 OSPREY	FIGURE 11. SOUTH-200 OBSERVATION WELLS AS-BUILT



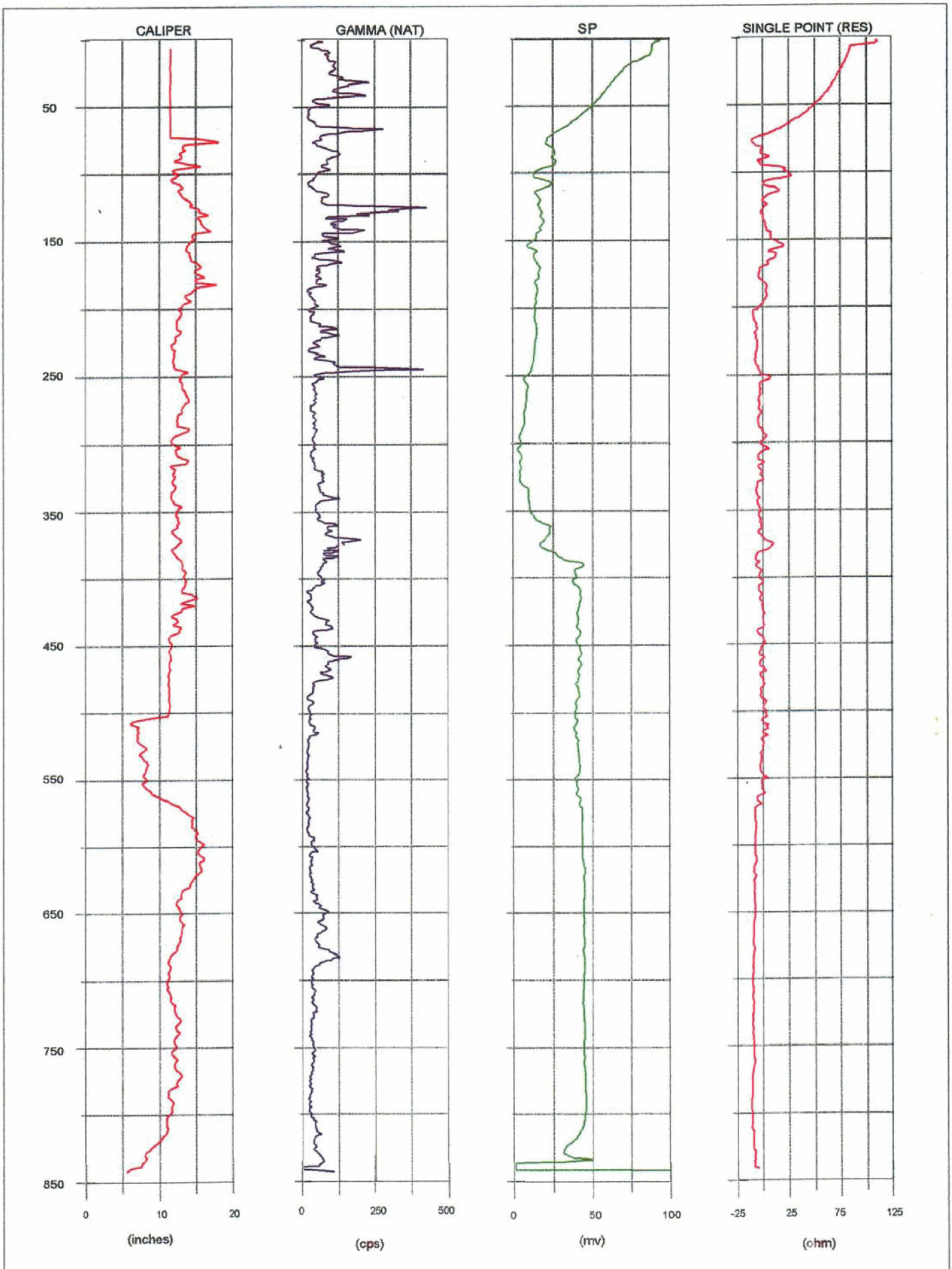
ROMP 20 OSPREY

FIGURE 12. GEOPHYSICAL LOGS, COREHOLE No. 1



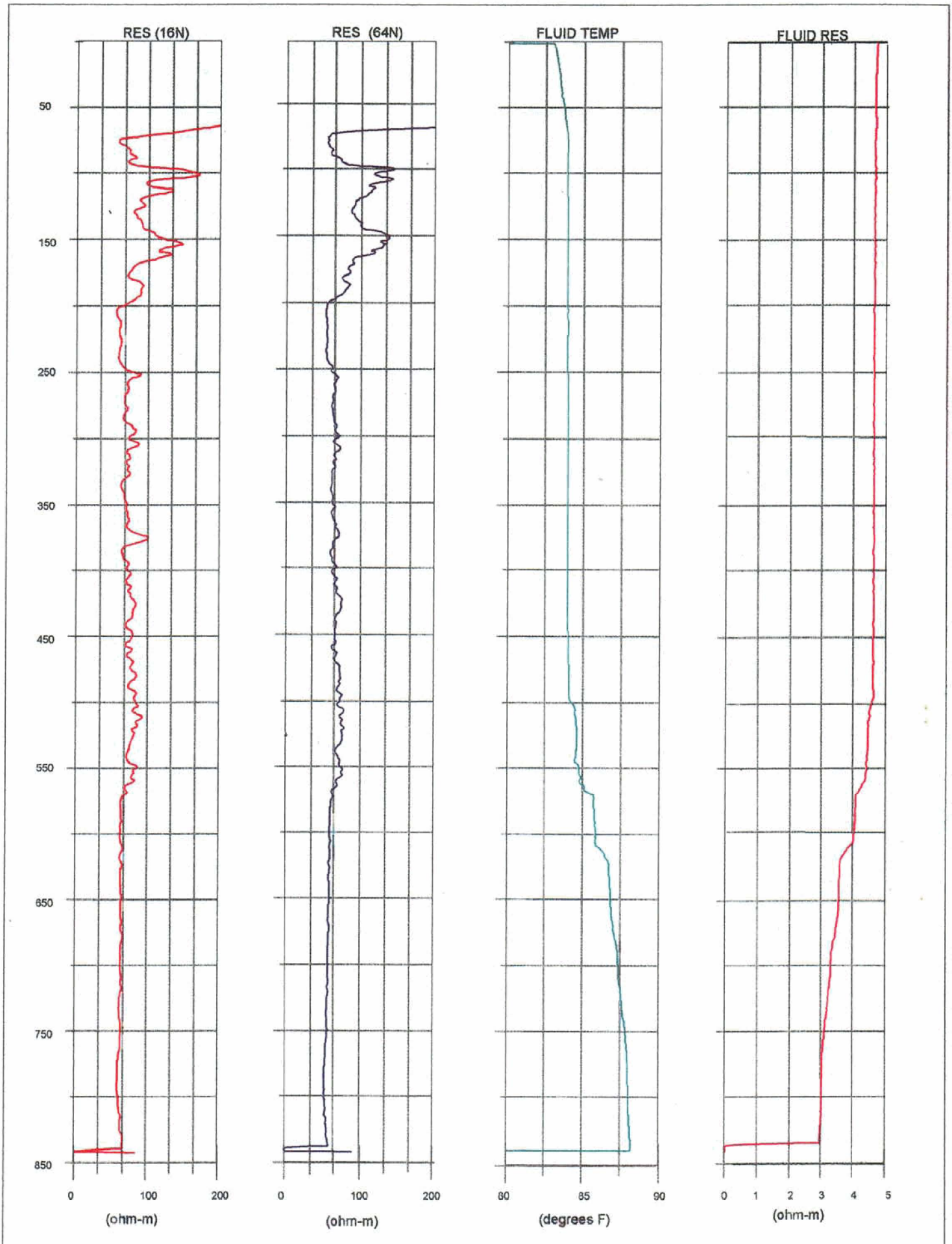
* WATER QUALITY PROFILES GENERATED FROM FIELDAAND NALYTICAL LABORATORY DATA

ROMP 20 OSPREY	FIGURE 12A. COMPOSITE WATER QUALITY PROFILE THROUGH THE INTERMEDIATE AQUIFER SYSTEM



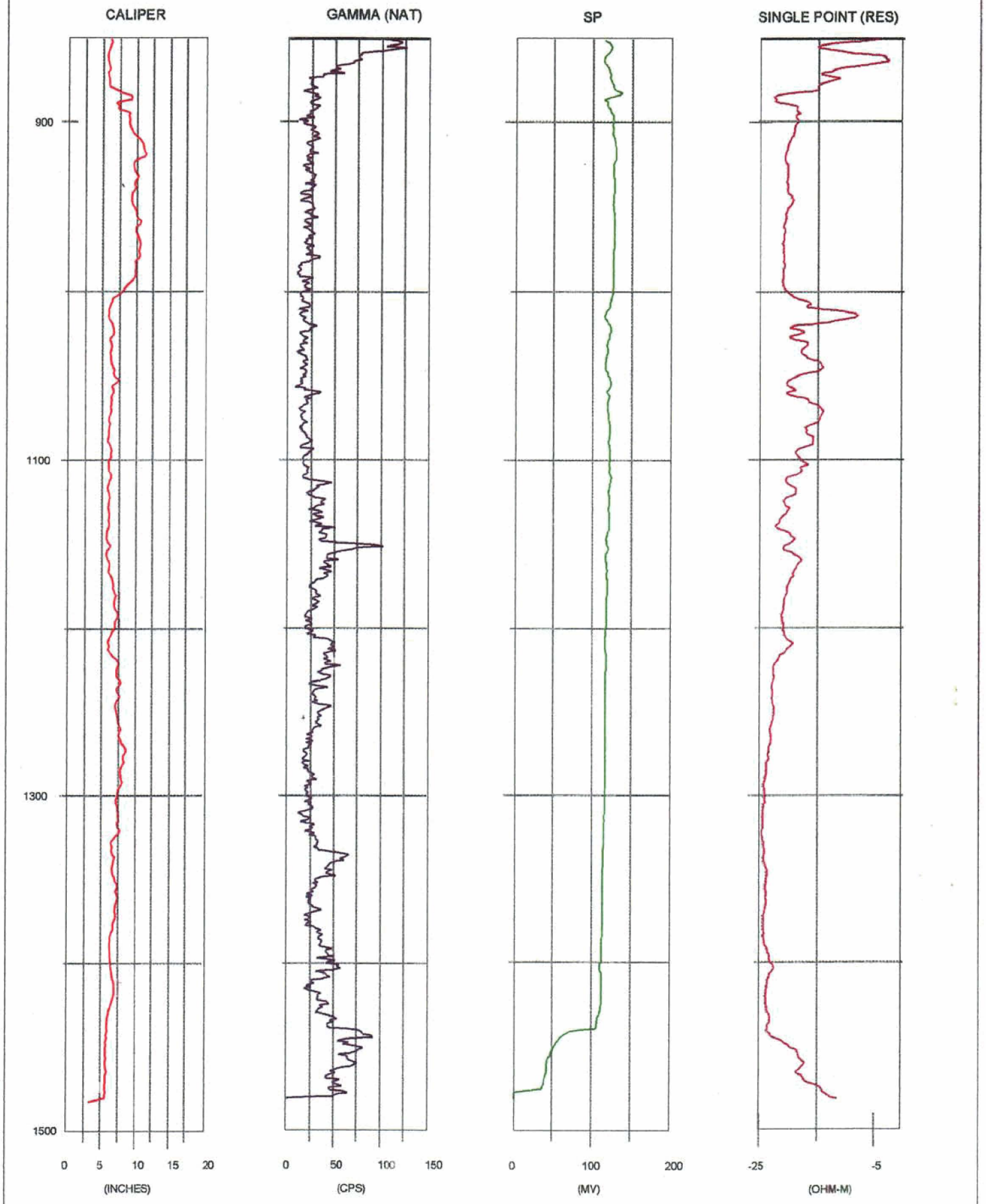
ROMP 20 OSPREY

FIGURE 13. SUWANNEE MONITOR COMPOSITE GEOPHYSICAL LOGS



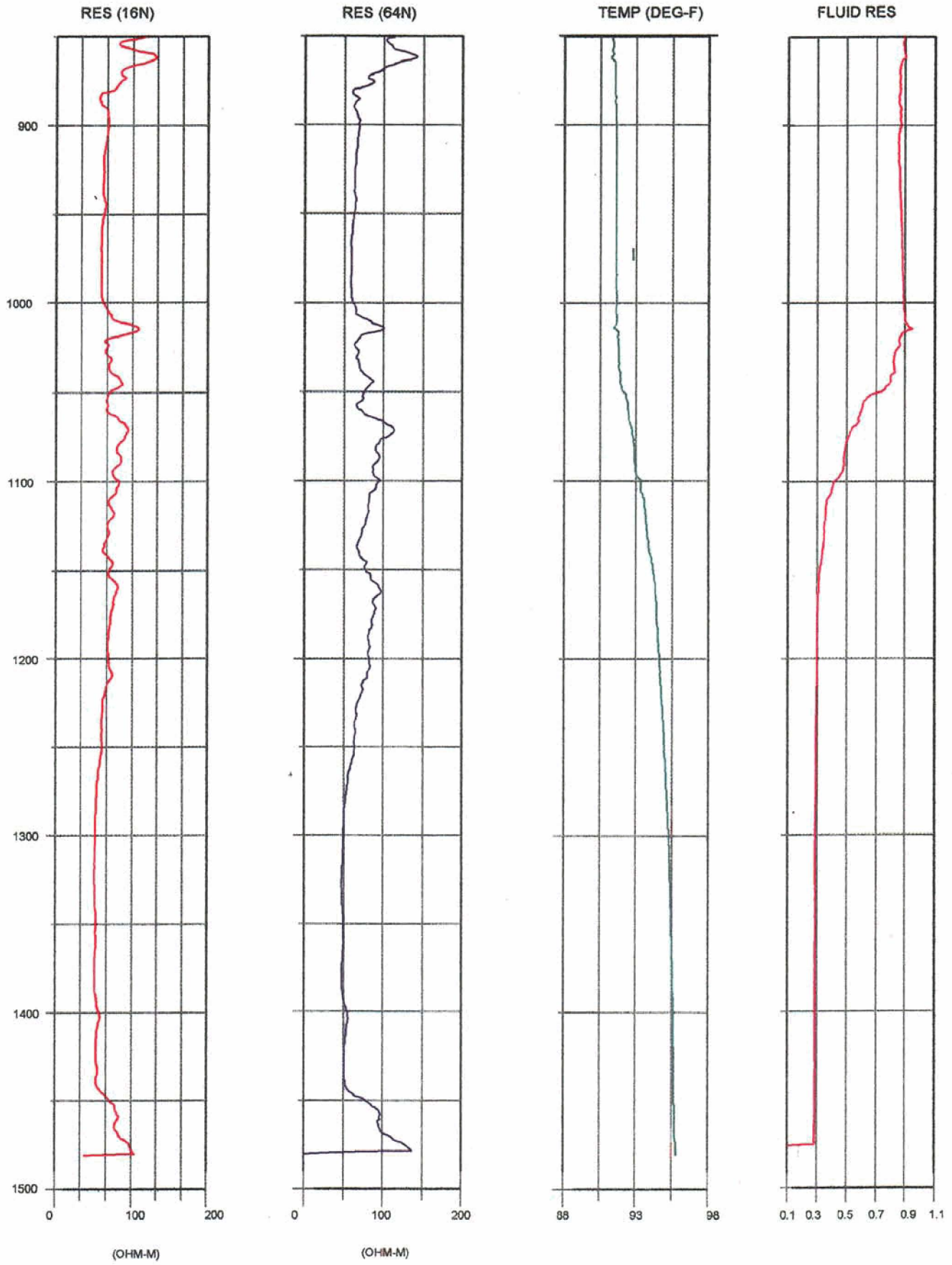
ROMP 20 OSPREY

FIGURE 13A. SUWANNEE MONITOR COMPOSITE GEOPHYSICAL LOGS

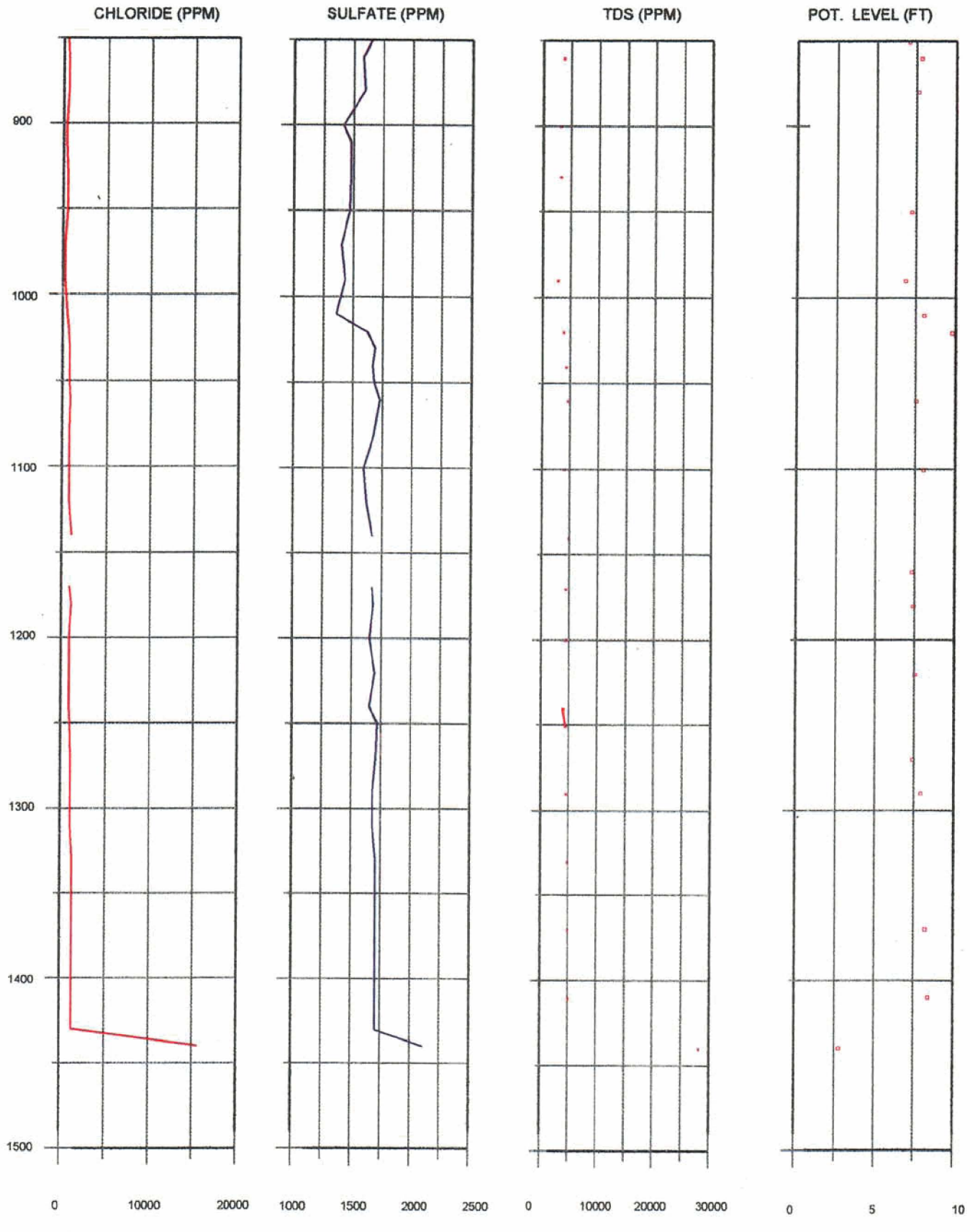


ROMP 20 OSPREY

FIGURE 14. DEEP TEST WELL COMPOSITE GEOPHYSICAL LOGS



ROMP 20 OSPREY	FIGURE 14A. DEEP TEST WELL COMPOSITE GEOPHYSICAL LOGS



* WATER QUALITY PROFILES GENERATED FROM FIELD AND ANALYTICAL LABORATORY DATA

ROMP 20 OSPREY	FIGURE 14B. COMPOSITE WATER QUALITY PROFILE THROUGH THE FLORIDAN AQUIFER SYSTEM

Tables

TABLE 1. RESULTS OF FIELD AND LABORATORY ANALYSES FOR COREHOLE NO. 1

		FIELD ANALYSIS							LABORATORY ANALYSIS									
DATE m-d-y	DEPTH (bls) feet	W.L. feet	TEMP (deg. C)	COND (us/cm)	pH	DENSITY	CHLORIDE (ppm)	SULFATE (ppm)	pH	TDS	CHLORIDE	SULFATE	ALKALINITY	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	HARDNESS
										reported in ppm unless otherwise noted								
3-05-91	43 *	-9.70	NA	NA	NA	NA	NA	NA	NA	764.0	110.0	160.0	NA	NA	NA	NA	NA	NA
3-11-91	98	-9.20	NA	1325	NA	NA	100.0	350.0	7.6	970.0	85.0	350.0	229.0	152.0	53.0	28.0	3.40	598
	109	NA	23.00	1380	7.42	NA	80.0	NA	NA	NA	92.0	440.0	NA	NA	NA	NA	NA	NA
	119	NA	23.00	1360	7.48	NA	80.0	400.0	7.8	1096.0	92.0	450.0	230.0	180.0	65.0	NA	NA	NA
	129	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	139	NA	22.00	1400	7.39	NA	110.0	400.0	NA	NA	92.0	440.0	NA	NA	NA	NA	NA	NA
	149	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	159	NA	22.00	1410	7.36	1.0005	130.0	400.0	7.6	1091.0	94.0	470.0	228.0	190.0	66.0	NA	NA	NA
3-12-91	169	-7.80	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	179	NA	22.50	1460	7.43	1.0000	130.0	450.0	NA	NA	91.0	470.0	NA	NA	NA	NA	NA	NA
	189	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	199	NA	22.50	1470	7.39	1.0000	130.0	450.0	7.6	1103.0	90.0	480.0	225.0	190.0	66.0	NA	NA	NA
	209	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	219	NA	22.90	1420	7.37	NA	120.0	450.0	NA	NA	92.0	450.0	NA	NA	NA	NA	NA	NA
	229	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
3-13-91	239	NA	22.80	1480	7.39	NA	140.0	525.0	7.9	NA	98.0	470.0	233.0	200.0	65.0	NA	NA	NA
	249	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	259	-5.80	24.00	2390	7.33	1.0005	170.0	1000.0	7.6	2105.0	110.0	1140.0	168.0	370.0	130.0	69.0	6.00	1448
	269	-5.20	NA	2710	NA	NA	NA	NA	NA	NA	120.0	1370.0	NA	NA	NA	NA	NA	NA
	279	NA	24.50	2730	NA	NA	190.0	1000.0	NA	NA	120.0	1420.0	NA	NA	NA	NA	NA	NA
	289	-4.30	24.00	2710	7.27	1.0005	200.0	1000.0	7.5	2458.0	130.0	1400.0	153.0	440.0	150.0	NA	NA	NA
	299	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	309	NA	24.50	2850	7.29	1.0005	190.0	1200.0	NA	NA	130.0	1520.0	NA	NA	NA	NA	NA	NA
3-14-91	319	-2.50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	329	NA	25.00	2910	7.18	1.0005	220.0	1200.0	7.4	2710.0	130.0	1560.0	140.0	480.0	160.0	NA	NA	NA
	339	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	349	NA	25.00	2890	7.21	1.0005	220.0	1200.0	NA	NA	140.0	1560.0	NA	NA	NA	NA	NA	NA
	359	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	369	NA	24.90	2940	7.16	1.0005	200.0	1600.0	7.5	2680.0	128.0	1568.0	134.0	440.0	170.0	NA	NA	NA
	379	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	389	NA	24.90	2800	7.27	1.0005	140.0	1400.0	7.5	2629.0	100.0	1560.0	132.0	440.0	160.0	NA	NA	NA
	399	0 (LS)	NA	2800	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
3-18-91	399	1.00	NA	NA	NA	NA	NA	NA	7.5	2647.0	100.0	1540.0	130.0	460.0	170.0	NA	NA	NA
	409	2.00	25.00	2890	7.23	1.0010	160.0	1300.0	NA	NA	120.0	1570.0	NA	NA	NA	NA	NA	NA
	419	NA	25.00	2850	7.22	1.0010	160.0	1300.0	7.4	2648.0	120.0	1580.0	131.0	440.0	165.0	NA	NA	NA
	429	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	439	3.00	25.00	2840	NA	1.0010	150.0	1400.0	NA	NA	99.0	1600.0	NA	NA	NA	NA	NA	NA
	449	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	459	6.00	25.00	2870	7.08	1.0008	140.0	1400.0	7.4	2692.0	89.0	1640.0	128.0	480.0	150.0	NA	NA	NA
	469	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
3-19-91	479	6.40	25.50	2860	NA	1.0010	130.0	1500.0	NA	NA	85.0	1670.0	NA	NA	NA	NA	NA	NA
	489	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	499	7.60	26.00	2890	7.14	1.0010	130.0	1500.0	7.4	2711.0	87.0	1650.0	127.0	490.0	146.0	46.0	5.00	1832
	509	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
T.D. #1	519	NA	25.10	2830	7.20	1.0010	120.0	1600.0	NA	NA	89.0	1640.0	NA	NA	NA	NA	NA	NA

* AUGER HOLE SAMPLE

NA NOT ANALYZED

12-IN PVC WELL CASING TO 76.0-ft BLS

4.0-IN HW STEEL CASING TO 88.0-ft BLS, NQ CORE TO 519.0-ft BLS

TABLE 2. RESULTS OF FIELD AND LABORATORY ANALYSES FOR COREHOLE NO. 2 HW-CASING SET NO. 1

		FIELD ANALYSIS							LABORATORY ANALYSIS									
DATE m-d-y	DEPTH (bls) feet	W.L. feet	TEMP (deg. C)	COND (us/cm)	pH	DENSITY	CHLORIDE (ppm)	SULFATE (ppm)	pH	TDS	CHLORIDE	SULFATE	ALKALINITY	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	HARDNESS
									reported in ppm unless otherwise noted									
3-26-91	529	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	539	NA	27.00	2900	7.04	1.0075	130.0	1600.0	7.5	2660.0	89.0	1650.0	124.0	510.0	150.0	NA	NA	NA
	549	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	559	7.60	27.50	2890	7.15	1.0075	130.0	1600.0	NA	NA	90.0	1640.0	NA	NA	NA	NA	NA	NA
	569	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
3-27-91	579	NA	27.00	2750	7.10	1.0050	130.0	1500.0	7.4	2700.0	99.0	1630.0	124.0	510.0	150.0	NA	NA	NA
	589	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	599	7.60	27.00	2850	7.18	NA	NA	NA	NA	NA	97.0	1640.0	NA	NA	NA	NA	NA	NA
	609	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
3-28-91	619	NA	27.00	2800	7.28	1.0005	150.0	1600.0	7.4	2700.0	120.0	1590.0	125.0	490.0	150.0	NA	NA	NA
	629	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	639	7.60	27.00	2840	7.15	1.0005	150.0	1600.0	NA	NA	120.0	1600.0	NA	NA	NA	NA	NA	NA
	649	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
4-1-91	659	7.10	28.00	2990	7.20	1.0005	220.0	1600.0	7.4	2790.0	170.0	1600.0	125.0	480.0	160.0	NA	NA	NA
	669	NA	26.90	2930	7.28	1.0008	230.0	1500.0	NA	2910.0	180.0	1620.0	130.0	450.0	160.0	NA	NA	NA
	679	7.10	27.00	3220	7.29	1.0008	240.0	1600.0	NA	NA	200.0	1590.0	NA	NA	NA	NA	NA	NA
	689	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	699	7.20	NA	3200	NA	NA	NA	NA	NA	2980.0	210.0	1610.0	125.0	450.0	160.0	NA	NA	NA
	709	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	719	NA	27.00	3410	7.23	1.0005	320.0	1600.0	NA	NA	270.0	1630.0	NA	NA	NA	NA	NA	NA
	729	NA	26.50	3590	7.21	1.0010	350.0	1500.0	NA	NA	300.0	1640.0	NA	NA	NA	NA	NA	NA
4-2-91	739	7.00	26.10	3620	7.09	1.0010	370.0	1500.0	NA	3140.0	330.0	1670.0	96.0	470.0	170.0	NA	NA	NA
	749	NA	27.00	3790	7.28	1.0013	400.0	1600.0	NA	NA	380.0	1640.0	NA	NA	NA	NA	NA	NA
	759	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	769	7.10	27.00	3880	7.31	1.0010	400.0	1600.0	NA	3390.0	390.0	1660.0	129.0	470.0	170.0	NA	NA	NA
	779	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	789	7.00	26.00	3750	7.16	1.0010	380.0	1500.0	NA	NA	340.0	1630.0	NA	NA	NA	NA	NA	NA
	799	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
4-3-91	809	6.80	26.00	4220	7.11	1.0015	530.0	1500.0	NA	3580.0	480.0	1700.0	130.0	490.0	180.0	NA	NA	NA
	819	NA	NA	4350	NA	NA	NA	NA	NA	NA	530.0	1700.0	NA	NA	NA	NA	NA	NA
	829	NA	27.75	4380	7.28	1.0010	600.0	1600.0	NA	3640.0	520.0	1690.0	128.0	490.0	180.0	NA	NA	NA
	839	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

NA NOT ANALYZED

6-IN PVC WELL CASING TO 500.0-ft BLS

4.0-IN HW STEEL CASING TO 520.0-ft BLS, NQ CORE TO 840.0-ft BLS

TABLE 3. RESULTS OF FIELD AND LABORATORY ANALYSES FOR COREHOLE NO. 2 HW-CASING SET NO. 2

DATE m-d-y	DEPTH (bls) feet	FIELD ANALYSIS W.L. feet	TEMP (deg. C)	COND. (us/cm)	pH	DENSITY	CHLORIDE (ppm)	SULFATE (ppm)	LABORATORY ANALYSIS pH	TDS	CHLORIDE	SULFATE	ALKALINITY	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	HARDNESS
									reported in ppm unless otherwise noted									
4-16-91	849	7.00	27.50	4370	7.33	1.0010	620.0	1700.0	NA	NA	510.0	1650.0	NA	NA	NA	NA	NA	NA
	859	7.80	27.50	4400	7.43	1.0018	660.0	1500.0	NA	3599.0	580.0	1580.0	NA	NA	NA	NA	NA	NA
	869	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	129.0	470.0	280.0	NA	NA	NA
4-17-91	879	7.60	26.00	4400	7.46	1.0020	700.0	NA	NA	NA	610.0	1600.0	NA	NA	NA	NA	NA	NA
	889	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	899	NA	27.00	3620	7.24	1.0015	460.0	1250.0	NA	3023.0	380.0	1420.0	127.0	380.0	150.0	170.0	7.00	1570

NA NOT ANALYZED
6-IN PVC WELL CASING TO 500.0-ft BLS
4.0-IN HW STEEL CASING TO 840.0-ft BLS, NQ CORE TO 900.0-ft BLS

TABLE 4. RESULTS OF FIELD AND LABORATORY ANALYSES FOR COREHOLE NO. 2 HW-CASING SET NO. 3

DATE m-d-y	DEPTH (bls) feet	FIELD ANALYSIS W.L. feet	TEMP (deg. C)	COND. (us/cm)	pH	DENSITY	CHLORIDE (ppm)	SULFATE (ppm)	LABORATORY ANALYSIS pH	TDS	CHLORIDE	SULFATE	ALKALINITY	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	HARDNESS
									reported in ppm unless otherwise noted									
4-22-91	909	NA	28.00	3950	7.32	1.0015	500.0	1150.0	NA	NA	420.0	1480.0	NA	NA	NA	NA	NA	NA
	919	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	929	NA	26.00	3750	7.24	1.0015	480.0	1000.0	NA	3090.0	430.0	1480.0	133.0	440.0	280.0	NA	NA	NA
	939	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-9-91	949	7.20	28.20	4000	7.39	1.0020	520.0	960.0	NA	2680.0	280.0	1390.0	144.0	320.0	130.0	126.0	8.00	1330
	959	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	969	NA	27.00	3290	8.17	1.0010	380.0	1250.0	NA	NA	300.0	1400.0	NA	NA	NA	NA	NA	NA
	979	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	989	6.80	28.00	3460	7.65	1.0015	380.0	1200.0	NA	2670.0	310.0	1430.0	146.0	370.0	150.0	NA	NA	NA
	999	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

NA NOT ANALYZED
6-IN PVC WELL CASING TO 500.0-ft BLS
4.0-IN HW STEEL CASING TO 900.0-ft BLS, NQ CORE TO 1000.0-ft BLS

TABLE 5. RESULTS OF FIELD AND LABORATORY ANALYSES FOR COREHOLE NO. 2 HW-CASING SET NO. 4

DATE m-d-y	DEPTH (bs) feet	FIELD ANALYSIS W.L. feet	TEMP (deg. C)	COND (us/cm)	pH	DENSITY	CHLORIDE (ppm)	SULFATE (ppm)	LABORATORY ANALYSIS pH	TDS	CHLORIDE	SULFATE	ALKALINITY	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	HARDNESS
										reported in ppm unless otherwise noted								
5-13-91	1009	8.00	NA	3480	NA	NA	NA	NA	NA	NA	430.0	1360.0	NA	NA	NA	NA	NA	NA
	1019	9.80	NA	4800	NA	NA	NA	NA	NA	3750.0	650.0	1620.0	136.0	480.0	180.0	300.0	8.00	1940
	1029	NA	NA	5300	NA	NA	NA	NA	NA	NA	790.0	1690.0	NA	NA	NA	NA	NA	NA
	1039	NA	28.00	5400	7.47	1.0025	890.0	1250.0	NA	4080.0	770.0	1670.0	137.0	510.0	190.0	370.0	9.00	2060
	1049	NA	28.00	5700	7.31	1.0025	900.0	1200.0	NA	NA	810.0	1680.0	NA	NA	NA	NA	NA	NA
5-14-91	1059	7.50	27.00	5600	7.28	1.0025	900.0	1200.0	NA	4440.0	920.0	1730.0	143.0	530.0	200.0	430.0	9.00	2160
	1069	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1079	NA	28.50	5300	7.40	1.0020	840.0	1250.0	NA	NA	790.0	1680.0	NA	NA	NA	NA	NA	NA
	1089	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1099	8.00	28.50	5100	7.39	1.0025	840.0	1200.0	NA	3900.0	760.0	1600.0	147.0	490.0	185.0	370.0	8.00	1999
	1109	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-15-91	1119	NA	28.50	5200	7.41	1.0020	840.0	1200.0	NA	NA	760.0	1620.0	NA	NA	NA	NA	NA	NA
	1129	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1139	NA	28.00	6400	7.26	1.0020	1160.0	1500.0	NA	4750.0	1150.0	1670.0	143.0	520.0	210.0	540.0	11.00	2160
	1149	NA	29.00	NA	7.50	1.0020	1280.0	1500.0	NA	NA	1120.0	1620.0	NA	NA	NA	NA	NA	NA
	1159	7.30	28.00	6500	7.32	1.0025	1240.0	1500.0	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-16-91	1169	NA	28.10	5800	7.36	1.0020	1000.0	1700.0	NA	4230.0	870.0	1670.0	143.0	510.0	200.0	420.0	9.00	2100
	1179	7.40	28.00	6400	7.34	1.0020	1280.0	1500.0	NA	NA	1140.0	1680.0	NA	NA	NA	NA	NA	NA
	1189	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1199	NA	29.00	5900	7.44	NA	1200.0	1300.0	NA	4350.0	910.0	1650.0	141.0	510.0	200.0	440.0	9.00	2100
	1209	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1219	7.50	28.50	6000	7.43	1.0025	960.0	1200.0	NA	NA	930.0	1700.0	NA	NA	NA	NA	NA	NA
	1229	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-20-91	1239	NA	27.00	5600	6.65	NA	900.0	NA	NA	3970.0	890.0	1650.0	67.0	460.0	170.0	NA	NA	NA
	1249	NA	NA	6200	NA	NA	NA	NA	NA	4300.0	990.0	1720.0	138.0	500.0	190.0	NA	NA	NA
	1259	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-22-91	1269	7.40	28.50	6900	7.15	1.0030	1450.0	1500.0	NA	NA	1170.0	1710.0	NA	NA	NA	NA	NA	NA
	1279	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1289	7.90	28.50	6800	7.20	1.0030	1450.0	1509.0	NA	4480.0	1100.0	1680.0	141.0	520.0	210.0	NA	NA	NA
	1299	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-23-91	1309	NA	29.00	6800	7.22	1.0025	1500.0	1500.0	NA	NA	1160.0	1680.0	NA	NA	NA	NA	NA	NA
	1319	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1329	NA	29.50	7300	7.24	1.0030	1600.0	1500.0	NA	4800.0	1290.0	1710.0	136.0	530.0	210.0	NA	NA	NA
	1339	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-28-91	1349	NA	29.50	7200	7.35	1.0030	1700.0	1500.0	NA	NA	1350.0	1710.0	NA	NA	NA	NA	NA	NA
	1359	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1369	8.20	29.00	7400	7.28	1.0030	1700.0	1500.0	NA	4810.0	1300.0	1710.0	137.0	540.0	220.0	640.0	22.00	2250
	1379	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-29-91	1389	NA	29.00	7700	7.21	1.0030	1650.0	1600.0	NA	NA	1380.0	1710.0	NA	NA	NA	NA	NA	NA
	1399	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1409	8.40	29.00	7600	7.24	1.0030	1900.0	1700.0	NA	4950.0	1360.0	1710.0	136.0	550.0	230.0	670.0	17.00	4950
	1419	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
5-30-91	1429	NA	29.00	7500	7.20	1.0025	1850.0	1600.0	NA	NA	1380.0	1710.0	NA	NA	NA	NA	NA	NA
	1439	9.60	NA	10400	NA	NA	NA	NA	NA	6480.0	2230.0	1630.0	138.0	620.0	260.0	1120.0	36.00	2620
6-3-91	1439	2.80	29.50	49000	6.80	1.0250	20000.0	2000.0	NA	28100.0	15600.0	2110.0	NA	NA	NA	NA	NA	NA

NA NOT ANALYZED

6-IN PVC WELL CASING TO 500.0-ft BLS

4.0-IN HW STEEL CASING TO 1000.0-ft BLS, NQ CORE TO 1440.0-ft BLS

TABLE 6. RESULTS OF FIELD AND LABORATORY ANALYSES FOR ADDITIONAL EXPLORATORY DRILLING

DATE m-d-y	DEPTH (bls) feet	FIELD ANALYSIS W.L. (feet b.s.)	TEMP. (deg. C)	COND (us/cm)	pH	DENSITY	CHLORIDE (ppm)	SULFATE (ppm)	LABORATORY ANALYSIS pH	TDS	CHLORIDE	SULFATE	ALKALINITY	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	HARDNESS
										reported in ppm unless otherwise noted								
2-11-92	1300	NA	28.5	7500	7.10	1.0025	1520	1600	6.00	4827	1220	1770	NA	NA	NA	NA	NA	NA
2-18-92	1300	5.40	30.0	10500	7.14	1.0035	2640	1600	NA	6411	2150	1910	NA	NA	180	300	8	1940
2-20-92	1340	NA	29.0	6600	7.20	1.0025	1120	1600	NA	4360	980	1760	NA	NA	NA	NA	NA	NA
	1380	NA	28.5	6800	7.40	1.0030	NA	NA	NA	4380	940	1910	NA	NA	NA	NA	NA	NA
2-24-92	1400	NA	29.5	6800	NA	1.0025	1050	1600	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
2-25-92	1400	6.00	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
2-26-92	1400	NA	30.0	17400	7.20	1.0075	4900	1800	NA	10500	4400	1730	NA	NA	NA	NA	NA	NA
2-27-92	1400	5.80	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	1440	5.20	30.0	16000	7.10	1.0065	4500	2400	NA	9470	3770	1770	138	550	320	NA	NA	NA
3-2-92	1440	4.80	29.0	48000	NA	NA	NA	NA	NA	26790	15600	2120	NA	NA	NA	NA	NA	NA
3-3-92	1480	1.10	28.0	49000	7.20	1.0220	NA	NA	NA	27330	15700	2130	NA	NA	NA	NA	NA	NA
	1480	-18.70	29.0	50000	7.60	1.0250	NA	NA	7.80	31500	17800	2240	157	680	980	9270	320	NA

NA *NOT ANALYZED*
6-IN PVC WELL CASING TO 500.0-ft BLS
REVERSE-AIR/BAILER SAMPLES

TABLE 7. WATER QUALITY FROM PACKER TEST SAMPLE INTERVALS

SAMPLE INTERVAL (feet)	SAMPLED PARAMETER TEMP. (deg. C)	SPECIFIC COND (uS/cm)	pH	TDS (ppm)	CHLORIDE (ppm)	SULFATE (ppm)
1220 - 1305	30.0	8200	NA	5230	1510	1830
1260 - 1305	30.0	10500	7.14	6085	1900	1900
1300 - 1405	NA	16100	NA	10300	3950	1860
1355 - 1405	30.0	17400	7.20	10500	4400	1730
1430 - 1480	29.0	50000	7.60	31500	17800	2240

TABLE 8. WATER QUALITY COMPARISON FROM COREHOLE AND PACKER SAMPLES

SAMPLE INTERVAL (feet)	SAMPLED PARAMETER TDS AV. CORE DATA (ppm)	TDS PACKER TEST DATA (ppm)	CHLORIDE AV. CORE DATA (ppm)	CHLORIDE PACKER TEST DATA (ppm)	SULFATE AV. CORE DATA (ppm)	SULFATE PACKER TEST DATA (ppm)
1220 - 1305	4250	5230	1016	1510	1692	1830
1260 - 1305	4480	6085	1135	1900	1695	1900
1300 - 1405	4805	10300	1294	3950	1704	1860
1355 - 1405	4810	10500	1343	4400	1710	1730

TABLE 9. SUMMARY OF APT ANALYSIS, UPPER INTERMEDIATE AQUIFER

OB-WELL ANALYSIS r = 224'	THEIS		JACOB-HANTUSH	
	TRANSMISSIVITY (GPD/FT)	STORAGE COEFFICIENT	TRANSMISSIVITY (GPD/FT)	STORAGE COEFFICIENT
DRAWDOWN	11,460	6.49E-05	15,280	5.57E-05
AVERAGE	13,370	6.03E-05		

TABLE 10. SUMMARY OF APT ANALYSIS, LOWER INTERMEDIATE AQUIFER

OB-WELL ANALYSIS r = 223'	JACOB-COOPER	
	TRANSMISSIVITY (GPD/FT)	STORAGE COEFFICIENT
DRAWDOWN	10,971	1.04E-04
RECOVERY	11,537	3.65E-05
AVERAGE	11,254	7.02E-05

TABLE 11. SUMMARY OF APT ANALYSIS, UPPER FLORIDAN AQUIFER-SUWANNEE LIMESTONE

OB-WELL ANALYSES	THEIS		JACOB-COOPER		WALTON		
	TRANSMISSIVITY (GPD/FT)	STORAGE COEFFICIENT	TRANSMISSIVITY (GPD/FT)	STORAGE COEFFICIENT	TRANSMISSIVITY (GPD/FT)	STORAGE COEFFICIENT	LEAKANCE (GPD/FT^3)
OB-1 r = 50'							
DRAWDOWN	128,090	1.81E-04	155,070	9.3E-05	132,000	1.96E-03	1.32E-02
RECOVERY	N/A	N/A	146,492	8.79E-05	N/A	N/A	
OB-2 r = 200'							
DRAWDOWN	152,878	2.55E-04	151,655	5.69E-06	154,000	1.78E-03	2.40E-02
RECOVERY	N/A	N/A	153,686	9.22E-05	N/A	N/A	
OB-3 r = 240'							
DRAWDOWN	N/A	N/A	164,716	9.88E-05	136,000	1.57E-03	3.77E-02
RECOVERY	N/A	N/A	153,003	6.68E-05	N/A	N/A	
AVERAGE	140,484	2.18E-04	146,801	7.43E-04	140,667	1.77E-03	2.50E-02

TABLE 12. RESULTS OF STRAIGHT LINE ANALYSES OF PACKER TESTING CONDUCTED IN THE AVON PARK FORMATION

TEST No.	INTERVAL (ft)	DISCHARG (gpm)	DRAWDOWN (ft)	T (ft²/day)	K (ft/day)	COMMENTS
1	1260 - 1305	15.0	170	3.11	0.0692	LOW PERM. DOLOSTONE, CONFIRM QW.
2	1220 - 1305	20.0	120	5.88	0.0692	LOW PERM. DOLOSTONE, CONFIRM QW.
3	1355 - 1405	2.1	190	0.39	0.0078	LOW PERM. DOLOSTONE, CONFIRM QW.
4	1300 - 1405	11.0	160	2.42	0.0231	LOW PERM. DOLOSTONE, CONFIRM QW.
5	1430 - 1480	42.0	77	NA	NA	CONFIRM QW AT TRANSITION ZONE

NA NOT ANALYZED

TABLE 13. SUMMARY OF FALLING-HEAD PERMEAMETER TESTING OF SELECTED CORE SAMPLES.

SAMPLE DEPTH (feet)	GEOLOGIC FORMATION	HYDRAULIC CONDUCTIVITY * vertical k (ft/day) **
618	Suwannee Limestone	5.06E-02
674	Suwannee Limestone	8.09E-01
715	Suwannee Limestone	6.22E-02
765	Suwannee Limestone	5.91E-02
815	Suwannee Limestone	1.28E-01
940	Ocala Limestone	1.24E-01
1183	Ocala Limestone	5.46E-04
1241	Avon Park Fm.	6.15E-03
1388	Avon Park Fm.	2.44E-04
1419	Avon Park Fm.	2.01E-03

* permeameter testing and analyses conducted by the Florida Geological Survey

** k av. from three consecutive runs

TABLE 14. COMPLETED MONITOR-WELL WATER QUALITY DATA *

MONITOR WELL	SAMPLE DATE	TEMP (deg. C)	SPECIFIC COND. (uS/cm)	pH	TDS	CHLORIDE	SULFATE	ALKALIITY	BROMIDE	CALCIUM	MAGNESIUM	SODIUM	POTASSIUM	IRON	SILICA	HARDNESS
					reported in ppm unless otherwise noted											
U. INT.	1-7-93	23.9	1750	23.9	1393	100.0000	700	NA	NA	NA	NA	NA	NA	NA	NA	NA
L. INT.		25.9	2660	7.09	2494	74.0000	1500	NA	NA	NA	NA	NA	NA	NA	NA	NA
SUWANNEE		28.0	4460	7.06	3472	550.0000	1800	NA	NA	NA	NA	NA	NA	NA	NA	NA
OCALA					4787	1200.0000	1800	NA	NA	NA	NA	NA	NA	NA	NA	NA
SURFICIAL	7-1-93	24.7	1833	6.73	2819	282.0000	82	489	0.82	215	18	167	2.2	13.224	4.7	611
U. INT.		24.6	1764	7.28	1454	90.0000	717	171	0.26	259	85	57	8.4	0.027	15.3	997
L. INT.		26.7	2560	6.99	2489	71.0000	1440	133	0.24	388	174	45	4.9	0.134	10.1	1685
SUWANNEE		28.0	4460	7.06	3677	607.0000	1667	125	2.13	543	192	302	12	0.049	9.8	2146
OCALA		29.2	6370	6.91	4598	1279.0000	1602	127	3.48	586	241	663	19	0.051	8.9	2456

* Sample data from SWFWMD/AGWQMP

Appendix A

LITHOLOGIC WELL LOG PRINTOUT SOURCE - FGS

WELL NUMBER: W-17087 COUNTY - SARASOTA
TOTAL DEPTH: 01439 FT. LOCATION: T.38S R.18E S.11 AA
SAMPLES - NONE LAT = 27D 11M 37S
LON = 82D 28M 45S
COMPLETION DATE: 05/30/91 ELEVATION: 15 FT
OTHER TYPES OF LOGS AVAILABLE - NONE

OWNER/DRILLER:SWFWMD [ROMP 20](OSPREY; WRAP #4)/L.H. JOHNSON AND J.P. MEADORS

WORKED BY:DJ DEWITT/SWFWMD
HOLLOW STEM AUGER CORE SAMPLES; LAND SURFACE TO 44.5 FT.
WIRELINE ROTARY CORING; 44.5 FT. TO 1439 FT.
COREHOLE #1 FROM L.S. TO 88.5 FT.; COREHOLE #2 FROM 88.5 TO 519 FT.
COREHOLE #3 FROM 519 TP 1439 FT.; REVERSE AIR CUTTINGS, 1439 TO 1480 FT.
"VENICE CLAY" NOTED IN FORMATION SUMMARY FROM 46.5 TO 70 FT.

0.	-	10.5	090UDSC	UNDIFFERENTIATED SAND AND CLAY
10.5	-	38.5	112CLSCR	CALOOSAHATCHEE FM.
38.5	-	479.	122HTRN	HAWTHORN GROUP
38.5	-	70.	122PCRV	PEACE RIVER FM.
48.5	-	70.	122MOCN	MIOCENE
38.5	-	479.	122ARCA	ARCADIA FM.
247.	-	398.	122TAMP	TAMPA MEMBER OF ARCADIA FM.
479.	-	884.	123SWNN	SUWANNEE LIMESTONE
884.	-	1208.	124OCAL	OCALA GROUP
1208.	-	.	124AVPK	AVON PARK FM.

0 - .5 SAND; LIGHT BROWNISH GRAY TO MODERATE GRAY
25% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: FINE; RANGE: FINE TO VERY FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: PLANT REMAINS-05%
FOSSILS: ORGANICS, NO FOSSILS
ROOTS, ORGANICS COMMON AT TOP OF ZONE, LESS ABUNDANT AT BOTTOM.

.5- 3.5 SAND; MODERATE YELLOWISH BROWN TO GRAYISH ORANGE
25% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: FINE; RANGE: FINE TO VERY FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: PLANT REMAINS-01%, IRON STAIN- %
PHOSPHATIC GRAVEL- %
FOSSILS: ORGANICS

3.5- 5 SAND; MODERATE YELLOWISH BROWN TO GRAYISH ORANGE
25% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: FINE; RANGE: FINE TO VERY FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: CLAY-05%, PHOSPHATIC GRAVEL-01%
QUARTZ-01%, PLANT REMAINS- %
FOSSILS: ORGANICS

5 - 5.8 SAND; GRAYISH BROWN TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN SIZE: FINE; RANGE: FINE TO VERY FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
POOR INDURATION
ACCESSORY MINERALS: CLAY-20%, PHOSPHATIC GRAVEL-01%
QUARTZ-01%

5.8- 8.5 SAND; YELLOWISH GRAY TO DARK GRAYISH YELLOW
20% POROSITY: INTERGRANULAR
GRAIN SIZE: FINE; RANGE: FINE TO VERY FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: CLAY-05%, CALCITE-02%
PLANT REMAINS- %, PHOSPHATIC GRAVEL- %
FOSSILS: MOLLUSKS, FOSSIL FRAGMENTS, BARNACLES
SHELL FRAGMENTS, QUARTZ AND PHOSPHATIC PEBBLES.

8.5- 10.5 SAND; GRAYISH YELLOW TO GRAYISH ORANGE
25% POROSITY: INTERGRANULAR
GRAIN SIZE: FINE; RANGE: VERY FINE TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: CLAY-05%, CALCITE-01%
FOSSILS: NO FOSSILS

10.5- 13 CLAY; LIGHT GRAYISH GREEN TO GRAYISH GREEN
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
POOR INDURATION
SEDIMENTARY STRUCTURES: BRECCIATED
ACCESSORY MINERALS: QUARTZ SAND-30%, LIMESTONE-10%
CALCITE-05%, PHOSPHATIC GRAVEL-01%
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS

13 - 18.5 SAND; YELLOWISH GRAY TO VERY LIGHT GRAY
20% POROSITY: INTERGRANULAR
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: CLAY-05%, PHOSPHATIC SAND-10%
CALCITE-02%
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS

18.5- 21 SAND; LIGHT GRAY TO VERY LIGHT GRAY
25% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: FINE; RANGE: FINE TO VERY FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, CLAY-01%
FOSSILS: NO FOSSILS

21 - 25 SAND; LIGHT OLIVE GRAY TO YELLOWISH GRAY
25% POROSITY: INTERGRANULAR
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: PHOSPHATIC SAND-05%, CLAY-05%

PLANT REMAINS- %
FOSSILS: NO FOSSILS

25 - 32 SAND; LIGHT OLIVE GRAY TO OLIVE GRAY
15% POROSITY: INTERGRANULAR
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
POOR INDURATION
ACCESSORY MINERALS: CLAY-15%, PHOSPHATIC SAND-05%

32 - 36 SAND; YELLOWISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
POOR INDURATION
ACCESSORY MINERALS: CLAY-20%, CALCITE-10%
PHOSPHATIC SAND-05%, PHOSPHATIC GRAVEL-02%
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS
ABUNDANT SHELL FRAGMENTS, SANDY LIMESTONE/DOLOMITE
STRINGERS.

36 - 38.5 SAND; YELLOWISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
ACCESSORY MINERALS: CLAY-20%, LIMESTONE-20%
PHOSPHATIC SAND-05%, PHOSPHATIC GRAVEL-05%
FOSSILS: FOSSIL FRAGMENTS
SANDY PHOSPHATIC LIMESTONE RUBBLE ZONE.

38.5- 40 GRAVEL; MODERATE GRAY TO LIGHT GRAY
30% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
UNCONSOLIDATED
SEDIMENTARY STRUCTURES: GRADED BEDDING
ACCESSORY MINERALS: QUARTZ-20%, QUARTZ SAND-10%
LIMESTONE-05%
FOSSILS: FOSSIL FRAGMENTS
COARSE PHOSPHATIC SAND GRADING INTO A PHOSPHATE AND QUARTZ
GRAVEL.

40 - 41.5 SAND; LIGHT OLIVE GRAY TO YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
POOR INDURATION
SEDIMENTARY STRUCTURES: GRADED BEDDING
ACCESSORY MINERALS: CLAY-20%, PHOSPHATIC SAND-05%
PHOSPHATIC GRAVEL-05%
FOSSILS: FOSSIL FRAGMENTS
GRADES DOWNWARD INTO COARSE PHOSPHATE AND QUARTZ SAND.

41.5- 42.5 SAND; LIGHT OLIVE GRAY TO YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
POOR INDURATION
SEDIMENTARY STRUCTURES: GRADED BEDDING
ACCESSORY MINERALS: CLAY-20%, PHOSPHATIC SAND-05%
PHOSPHATIC GRAVEL-02%

FOSSILS: FOSSIL FRAGMENTS
GRADES TO A COARSE SAND AND GRAVEL.

42.5- 43.5 SAND; LIGHT OLIVE GRAY TO YELLOWISH GRAY
25% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN SIZE: MEDIUM; RANGE: MEDIUM TO FINE
ROUNDNESS: ANGULAR TO SUB-ANGULAR; MEDIUM SPHERICITY
UNCONSOLIDATED
ACCESSORY MINERALS: CLAY-10%, PHOSPHATIC SAND-05%
PHOSPHATIC GRAVEL-01%
FOSSILS: FOSSIL FRAGMENTS

43.5- 44 DOLOSTONE; LIGHT GRAY TO MODERATE LIGHT GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BRECCIATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-05%
PHOSPHATIC GRAVEL-05%, CLAY-02%

44 - 48.5 SAND; LIGHT OLIVE GRAY TO YELLOWISH GRAY
POROSITY: INTERGRANULAR
GRAIN SIZE: VERY COARSE; RANGE: VERY COARSE TO GRAVEL
ROUNDNESS: SUB-ANGULAR TO ROUNDED; MEDIUM SPHERICITY
ACCESSORY MINERALS: QUARTZ SAND-10%, CLAY-10%
LIMESTONE-02%
FOSSILS: FOSSIL FRAGMENTS, SHARKS TEETH
COARSE PHOSPHATE SAND/GRAVEL; NO CORE RECOVERY, BAG SAMPLE.

48.5- 51.5 CLAY; DARK GREENISH GRAY TO OLIVE GRAY
POROSITY: NOT OBSERVED, LOW PERMEABILITY
MODERATE INDURATION
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
DOLOMITE-%

51.5- 59 CLAY; GRAYISH GREEN TO GREENISH GRAY
POROSITY: NOT OBSERVED, INTERGRANULAR, LOW PERMEABILITY
GOOD INDURATION
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: QUARTZ SAND-01%, DOLOMITE- %
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: ORGANICS

59 - 62 CLAY; YELLOWISH GRAY TO LIGHT GREENISH YELLOW
POROSITY: NOT OBSERVED, INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: QUARTZ SAND-01%, PHOSPHATIC SAND-01%
DOLOMITE- %
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: ORGANICS

62 - 68.5 CLAY; YELLOWISH GRAY TO LIGHT GRAYISH GREEN
POROSITY: NOT OBSERVED, INTERGRANULAR, LOW PERMEABILITY
GOOD INDURATION
SEDIMENTARY STRUCTURES: MASSIVE

ACCESSORY MINERALS: PHOSPHATIC SAND-02%, QUARTZ SAND-01%
DOLOMITE- %
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: ORGANICS

68.5- 69 CLAY; YELLOWISH GRAY TO LIGHT OLIVE GRAY
POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
ACCESSORY MINERALS: LIMESTONE-50%, DOLOMITE- %
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: ORGANICS
PHOSPHATE COATED LIMESTONE CLASTS IN CLAY MATRIX.

69 - 70 CLAY; YELLOWISH GRAY TO LIGHT OLIVE GRAY
POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
SEDIMENTARY STRUCTURES: MOTTLED, MASSIVE
ACCESSORY MINERALS: LIMESTONE-05%, PHOSPHATIC SAND-05%
QUARTZ SAND-02%, DOLOMITE- %
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: ORGANICS
TOP OF UPPER INTERMEDIATE AQUIFER.

70 - 72.5 CALCILUTITE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: PHOSPHATIC SAND-05%, CLAY-02%
DOLOMITE- %
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL MOLDS, ORGANICS

72.5- 77 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: PHOSPHATIC SAND-05%, DOLOMITE-02%

77 - 79 CALCILUTITE; YELLOWISH GRAY TO LIGHT GRAY
10% POROSITY: MOLDIC, PIN POINT VUGS, VUGULAR
GRAIN TYPE: BIOGENIC, SKELETAL, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, QUARTZ SAND-05%
PHOSPHATIC SAND-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS

79 - 82 CALCILUTITE; YELLOWISH GRAY
15% POROSITY: MOLDIC, VUGULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BIOTURBATED

ACCESSORY MINERALS: DOLOMITE-05%, QUARTZ SAND-05%
PHOSPHATIC SAND-02%
OTHER FEATURES: DOLOMITIC

82 - 89 DOLOSTONE; YELLOWISH GRAY TO LIGHT GRAY
30% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
0-10% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
ACCESSORY MINERALS: CLAY-10%, QUARTZ SAND-01%
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS, OOLITES
ECHINOID
HIGH MOLDIC POROSITY, LARGE PELECYPOD MOLDS, ECHINOID
FRAGMENTS. T.D. OF COREHOLE #1

89 - 93 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT GRAY
20% POROSITY: MOLDIC, PIN POINT VUGS, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-01%, PHOSPHATIC SAND-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS

93 - 94 NO SAMPLES
CAVITY ZONE, LOST CIRCULATION.

94 - 95 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT GRAY
15% POROSITY: MOLDIC, PIN POINT VUGS, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
ACCESSORY MINERALS: QUARTZ SAND-02%, PHOSPHATIC SAND-01%
CLAY- %
OTHER FEATURES: DOLOMITIC
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS

95 - 98 DOLOSTONE; LIGHT GRAY TO YELLOWISH GRAY
10% POROSITY: MOLDIC, PIN POINT VUGS; 10-50% ALTERED
ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
ACCESSORY MINERALS: QUARTZ SAND-02%, PHOSPHATIC SAND-02%

98 - 99.5 CALCILUTITE; VERY LIGHT GRAY TO LIGHT GRAY
05% POROSITY: PIN POINT VUGS, INTERGRANULAR
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: CLAY-05%, PHOSPHATIC SAND-02%
QUARTZ SAND-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: MOLLUSKS

99.5- 101 DOLOSTONE; LIGHT GRAY TO VERY LIGHT GRAY
15% POROSITY: MOLDIC, PIN POINT VUGS; 10-50% ALTERED

ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
ACCESSORY MINERALS: PHOSPHATIC SAND-02%, QUARTZ SAND-01%
FOSSILS: MOLLUSKS, FOSSIL FRAGMENTS

101 - 106.5 DOLOSTONE; VERY LIGHT GRAY TO LIGHT GRAY
05% POROSITY: PIN POINT VUGS, INTERGRANULAR
LOW PERMEABILITY; 10-50% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
ACCESSORY MINERALS: PHOSPHATIC SAND-05%, QUARTZ SAND-01%
PLANT REMAINS- %
OTHER FEATURES: CHALKY, SPECKLED
FOSSILS: FOSSIL MOLDS

106.5- 108.5 DOLOSTONE; VERY LIGHT GRAY TO YELLOWISH GRAY
05% POROSITY: PIN POINT VUGS, INTERGRANULAR
LOW PERMEABILITY; 0-10% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CLAY MATRIX
ACCESSORY MINERALS: CLAY-05%, PHOSPHATIC SAND-05%
QUARTZ SAND-01%
OTHER FEATURES: CHALKY

108.5- 112 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT GRAY
15% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
ACCESSORY MINERALS: DOLOMITE-10%, PHOSPHATIC SAND-05%
QUARTZ SAND-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS

112 - 115.5 DOLOSTONE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: PIN POINT VUGS, INTERGRANULAR; 0-10% ALTERED
ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, QUARTZ SAND-05%
OTHER FEATURES: SUCROSIC
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS
DOLOMITE/PHOSPHORITE PEBBLES, AND FOSSIL REPLACEMENT.

115.5- 119 DOLOSTONE; VERY LIGHT GRAY TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
0-10% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-15%, PHOSPHATIC SAND-10%
CLAY-01%
OTHER FEATURES: CHALKY, SPECKLED
VERY FINE GRAINED, CHALKY DOLOMITE SILT.

119 - 128 DOLOSTONE; VERY LIGHT GRAY TO YELLOWISH GRAY

10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
0-10% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
ACCESSORY MINERALS: QUARTZ SAND-20%, PHOSPHATIC SAND-10%
OTHER FEATURES: CHALKY, SPECKLED

128 - 128.5 DOLOSTONE; LIGHT GRAY TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
0-10% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-05%
SPAR-02%
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, CORAL

128.5- 133.5 DOLOSTONE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: MOLDIC, INTERGRANULAR
POOR INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CLAY MATRIX
CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: CLAY-10%, PHOSPHATIC SAND-05%
QUARTZ SAND-05%
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS, CORAL
ORGANICS
CLAY INTERBEDS CONTAIN ROUNDED PHOSPHORITE AND DOLOMITE
CLASTS.

133.5- 135.5 DOLOSTONE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
0-10% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
ACCESSORY MINERALS: CLAY-05%, PHOSPHATIC SAND-05%
QUARTZ SAND-02%
OTHER FEATURES: CHALKY
DOLOMITE SILT, THIN, ORGANIC-RICH CLAY BEDS.

135.5- 137.5 DOLOSTONE; YELLOWISH GRAY
15% POROSITY: MOLDIC, PIN POINT VUGS, INTERGRANULAR
10-50% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, QUARTZ SAND-05%
CLAY-05%
OTHER FEATURES: CHALKY
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS

137.5- 139 DOLOSTONE; YELLOWISH GRAY TO LIGHT GREENISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
10-50% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, QUARTZ SAND-05%

CLAY- %
OTHER FEATURES: SPECKLED, DOLOMITIC
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS
DUSKY YELLOW GREEN-MODERATE GREEN CLAY-FILLED VUG, MOLDS.

139 - 143.5 CLAY; YELLOWISH GRAY TO LIGHT GRAYISH GREEN
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
ACCESSORY MINERALS: PHOSPHATIC SAND-15%, QUARTZ SAND-10%
DOLOMITE- %
OTHER FEATURES: DOLOMITIC, CHALKY
FOSSILS: NO FOSSILS

143.5- 147 DOLOSTONE; YELLOWISH GRAY TO LIGHT GREENISH GRAY
15% POROSITY: MOLDIC, PIN POINT VUGS, INTERGRANULAR
10-50% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
ACCESSORY MINERALS: PHOSPHATIC SAND-05%, QUARTZ SAND-05%
CLAY-02%
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS
LIGHT GRAY-GREEN CLAY-FILLED VUGS.

147 - 150 DOLOSTONE; YELLOWISH GRAY TO LIGHT GREENISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
10-50% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED, BIOTURBATED
ACCESSORY MINERALS: PHOSPHATIC SAND- %
PHOSPHATIC GRAVEL- %, LIMESTONE-04%, DOLOMITE- %
OTHER FEATURES: STROMATAL

150 - 151 CLAY; YELLOWISH GRAY TO VERY LIGHT ORANGE
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
POOR INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
ACCESSORY MINERALS: DOLOMITE-30%, PHOSPHATIC SAND-02%
QUARTZ SAND-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: NO FOSSILS

151 - 158 DOLOSTONE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
0-10% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED, BIOTURBATED
ACCESSORY MINERALS: CALCILUTITE-30%, PHOSPHATIC SAND-05%

QUARTZ SAND-05%, PHOSPHATIC GRAVEL-02%
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS, MOLLUSKS
SANDY PHOSPHATE AND DOLOMITE SILT-FILLED VUGS; ROUNDED
PHOSPHATE GRAVEL AND DOLOMITE.

158 - 159.5 SAND; YELLOWISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN SIZE: FINE; RANGE: FINE TO MEDIUM; POOR INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
ACCESSORY MINERALS: DOLOMITE-20%, PHOSPHATIC SAND-15%
PHOSPHATIC GRAVEL-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: NO FOSSILS

159.5- 162.5 DOLOSTONE; YELLOWISH GRAY TO LIGHT GREENISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED
ACCESSORY MINERALS: PHOSPHATIC SAND-15%, CALCILUTITE-05%
CLAY-01%, QUARTZ SAND-01%
OTHER FEATURES: GRANULAR
FOSSILS: NO FOSSILS

162.5- 164 DOLOSTONE; YELLOWISH GRAY TO LIGHT GREENISH GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
10-50% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: PHOSPHATIC SAND-15%, QUARTZ SAND-10%
CLAY-05%, PHOSPHATIC GRAVEL-02%
FOSSILS: FOSSIL MOLDS
INTERBEDDED GRAY PHOSPHATIC SANDY CLAY.

164 - 168.5 DOLOSTONE; YELLOWISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
ACCESSORY MINERALS: PHOSPHATIC SAND-15%, QUARTZ SAND-10%
CLAY-05%, PHOSPHATIC GRAVEL-02%
FOSSILS: NO FOSSILS

168.5- 171 DOLOSTONE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): PHOSPHATE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: PHOSPHATIC SAND-02%, QUARTZ SAND-02%
CLAY-01%
OTHER FEATURES: GRANULAR

171 - 177 CLAY; YELLOWISH GRAY TO LIGHT OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, CALCILUTITE MATRIX
DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: DOLOMITE-30%, QUARTZ SAND-02%
PHOSPHATIC SAND-01%
OTHER FEATURES: DOLOMITIC, CHALKY
FOSSILS: ORGANICS
SOME DARK GRAYISH GREEN ORGANIC CLAY AT BOTTOM OF SECTION
VUG INFILL.

177 - 183 DOLOSTONE; YELLOWISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, VUGULAR, LOW PERMEABILITY
10-50% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-20%, CLAY-05%
PHOSPHATIC SAND-01%
OTHER FEATURES: GRANULAR
FOSSILS: NO FOSSILS

183 - 185.5 CLAY; LIGHT OLIVE GRAY TO OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SILICIC CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-20%, CLAY-05%
PHOSPHATIC SAND-01%, QUARTZ SAND-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: ORGANICS
INTERBEDDED DARK GRAY CHERT AT 184 AND 185 FT.

185.5- 203.5 DOLOSTONE; YELLOWISH GRAY TO GREENISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 10-50% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
ACCESSORY MINERALS: PHOSPHATIC SAND-05%, CLAY-05%
QUARTZ SAND-05%
OTHER FEATURES: CHALKY
FOSSILS: NO FOSSILS
INTERBEDDED PHOSPHATIC DOLOMITE AND SANDY DOLOMITIC CLAYS.

203.5- 206 CLAY; OLIVE GRAY TO LIGHT OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MOTTLED, LAMINATED
ACCESSORY MINERALS: DOLOMITE-05%, CHERT-05%
OTHER FEATURES: DOLOMITIC, CHALKY, SPLINTERY

FOSSILS: NO FOSSILS

206 - 215 CLAY; LIGHT OLIVE GRAY TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MOTTLED
ACCESSORY MINERALS: DOLOMITE-30%, CHERT-02%
PHOSPHATIC SAND-01%
OTHER FEATURES: DOLOMITIC, CHALKY, SPLINTERY
FOSSILS: NO FOSSILS

215 - 218.5 DOLOSTONE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
0-10% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CLAY MATRIX
ACCESSORY MINERALS: CLAY-20%, PHOSPHATIC SAND-01%
OTHER FEATURES: CHALKY
FOSSILS: NO FOSSILS

218.5- 224 CLAY; LIGHT OLIVE GRAY TO OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, PHOSPHATIC SAND-05%
OTHER FEATURES: DOLOMITIC, PLASTIC, SPLINTERY
FOSSILS: NO FOSSILS

224 - 227.5 DOLOSTONE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CLAY MATRIX
SEDIMENTARY STRUCTURES: BEDDED, LAMINATED
ACCESSORY MINERALS: CLAY-10%, PHOSPHATIC SAND-05%
QUARTZ SAND-05%
OTHER FEATURES: CHALKY, GRANULAR
FOSSILS: NO FOSSILS

227.5- 229 DOLOSTONE; YELLOWISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 0-10% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CLAY MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BRECCIATED, LAMINATED
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, QUARTZ SAND-05%
CLAY-05%
FOSSILS: NO FOSSILS
ORGANIC-RICH CLAY AND PHOSPHATE DOLOMITE INCLUSIONS
DOLOMITE CLASTS.

229 - 234.5 CLAY; YELLOWISH GRAY TO LIGHT OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED

ACCESSORY MINERALS: DOLOMITE-20%, PHOSPHATIC SAND-05%
QUARTZ SAND-01%
OTHER FEATURES: CHALKY, SPLINTERY
FOSSILS: NO FOSSILS
INTERBEDDED CLAY AND CLAYEY DOLOMITE; CLAY AND SANDY PHOSPHATE LAMINATIONS.

234.5- 239 CLAY; LIGHT OLIVE GRAY TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED, LAMINATED
ACCESSORY MINERALS: DOLOMITE-20%, PHOSPHATIC SAND-05%
QUARTZ SAND-05%
OTHER FEATURES: DOLOMITIC, GRANULAR
FOSSILS: NO FOSSILS
DOLOMITIC CLAY BLEBS AND STRINGERS NEAR TOP OF SECTION.

239 - 244.5 CLAY; LIGHT OLIVE GRAY TO OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, QUARTZ SAND-10%
DOLOMITE-05%
OTHER FEATURES: DOLOMITIC, PLASTIC, SPLINTERY
FOSSILS: NO FOSSILS

244.5- 246.1 CLAY; OLIVE GRAY TO LIGHT OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BRECCIATED, MOTTLED, BIOTURBATED INTERBEDDED
ACCESSORY MINERALS: PHOSPHATIC SAND-10%, QUARTZ SAND-10%
DOLOMITE-05%, PHOSPHATIC GRAVEL-02%
FOSSILS: ORGANICS
LARGE DOLOSTONE AND PHOSPHATE CLASTS, THIN SANDY PHOSPHATE BEDS.

246.1- 247 DOLOSTONE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CLAY MATRIX
ACCESSORY MINERALS: CLAY-10%, PHOSPHATIC SAND-05%
QUARTZ SAND-02%, LIMESTONE- %
OTHER FEATURES: GRANULAR, CALCAREOUS
FOSSILS: FOSSIL MOLDS
TOP OF LOWER INTERMEDIATE AQUIFER.

247 - 254 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-40%, PHOSPHATIC SAND-02%

SPAR-02%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL MOLDS

254 - 259 CALCILUTITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, MOLDIC, VUGULAR
GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-40%, PHOSPHATIC SAND-01%
SPAR-01%
OTHER FEATURES: GRANULAR, CHALKY
FOSSILS: FOSSIL MOLDS, MOLLUSKS

259 - 261 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT GRAY
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: CALCILUTITE
POOR INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: BANDED, BEDDED
ACCESSORY MINERALS: QUARTZ SAND-30%, PHOSPHATIC SAND-05%
OTHER FEATURES: GRANULAR, CALCAREOUS
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS

261 - 270 CALCILUTITE; YELLOWISH GRAY TO LIGHT GRAY
25% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-30%, PHOSPHATIC SAND-05%
OTHER FEATURES: GRANULAR, CALCAREOUS, REEFAL
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

270 - 282 CALCILUTITE; YELLOWISH GRAY TO LIGHT GRAY
30% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-30%, PHOSPHATIC SAND-02%
OTHER FEATURES: GRANULAR, CALCAREOUS, REEFAL
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
HIGHLY FOSSILIFEROUS MOLLUSKS, HIGH MOLDIC POROSITY.

282 - 289 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, VUGULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-30%, PHOSPHATIC SAND-01%
OTHER FEATURES: GRANULAR, CALCAREOUS, PARTINGS, CHALKY
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

289 - 294.5 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
25% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY

GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED, LAMINATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-02%
SPAR-02%
OTHER FEATURES: GRANULAR, CALCAREOUS, REEFAL
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

294.5- 299.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, VUGULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, LAMINATED
ACCESSORY MINERALS: CALCILUTITE-30%, CALCITE-05%
DOLOMITE- %
OTHER FEATURES: GRANULAR, CALCAREOUS
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BIOTURBATED STRUCTURES, CONVOLUTED WORM BORING (297' AND 298.5')? DOLOMITIC.

299.5- 304 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
40% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, LAMINATED
ACCESSORY MINERALS: CALCILUTITE-10%, PHOSPHATIC SAND-01%
SPAR-01%
OTHER FEATURES: GRANULAR, CALCAREOUS, REEFAL
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS

304 - 306 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: MOLDIC, INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-01%
OTHER FEATURES: VARIEGATED
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS

306 - 309 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
30% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-01%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GREASY
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS

309 - 319.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL

MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, CROSS-BEDDED
ACCESSORY MINERALS: QUARTZ SAND-15%, PHOSPHATIC SAND-01%
OTHER FEATURES: GRANULAR, CALCAREOUS
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA
TURRITELLA MOLDS.

319.5- 325 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED, LAMINATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-05%
SPAR-02%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

325 - 329 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
GOOD INDURATION
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-02%
SPAR-01%, DOLOMITE-01%
OTHER FEATURES: REEFAL
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

329 - 332 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-15%, PHOSPHATIC SAND-01%
SPAR- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

332 - 337 CALCILUTITE; VERY LIGHT GRAY TO WHITE
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
OTHER FEATURES: CHALKY, MEDIUM RECRYSTALLIZATION
DOLOMITIC
FOSSILS: NO FOSSILS

337 - 339 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED, MOTTLED

ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-02%
OTHER FEATURES: DOLOMITIC, CHALKY
FOSSILS: NO FOSSILS

339 - 342 CALCILUTITE; YELLOWISH GRAY TO LIGHT OLIVE GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
POOR INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: NO FOSSILS

342 - 348.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
25% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-20%, PHOSPHATIC SAND-05%
OTHER FEATURES: REEFAL
FOSSILS: MOLLUSKS, FOSSIL FRAGMENTS, FOSSIL MOLDS
BENTHIC FORAMINIFERA

348.5- 352 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT GRAY
30% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
POOR INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-02%
SPAR-02%
OTHER FEATURES: REEFAL
FOSSILS: MOLLUSKS, FOSSIL FRAGMENTS, FOSSIL MOLDS

352 - 359 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: SPAR-10%, QUARTZ SAND-01%
PHOSPHATIC SAND-01%
OTHER FEATURES: REEFAL
FOSSILS: MOLLUSKS, FOSSIL FRAGMENTS, FOSSIL MOLDS

359 - 362 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: MOLDIC, INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
CLAY-01%, SPAR-01%
OTHER FEATURES: CHALKY
FOSSILS: FOSSIL MOLDS

362 - 369 CALCARENITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: CALCILUTITE-45%, QUARTZ SAND-05%
PHOSPHATIC SAND-01%, CLAY-01%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL MOLDS

369 - 372.2 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-10%, CLAY-02%
PHOSPHATIC SAND-01%
FOSSILS: FOSSIL MOLDS
INTERBEDDED CALCAREOUS CLAY AND CALCILUTITE.

372.2- 380 CALCILUTITE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MOTTLED
ACCESSORY MINERALS: SPAR-05%
OTHER FEATURES: HIGH RECRYSTALLIZATION
FOSSILS: FOSSIL MOLDS

380 - 383 CLAY; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED
ACCESSORY MINERALS: CALCILUTITE-40%
OTHER FEATURES: PLASTIC, CALCAREOUS, DOLOMITIC
FOSSILS: NO FOSSILS

383 - 392.7 CLAY; GRAYISH BROWN TO YELLOWISH GRAY
POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: CALCILUTITE-40%
OTHER FEATURES: PLASTIC, CALCAREOUS, DOLOMITIC
FOSSILS: NO FOSSILS
DARK YELLOWISH GREEN CLAY SEAM 386.3-386.5 FT. DOLOMITIC CLAY.

392.7- 394.4 CALCILUTITE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS

LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
CALCILUTITE-45%
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS

394.4- 398.2 CLAY; PINKISH GRAY TO YELLOWISH GRAY
POROSITY: INTERGRANULAR, LOW PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
CALCILUTITE-45%
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS
INTERBEDDED CALCILUTITIC CLAY AND CALCILUTITE.

398.2- 399 CALCARENITE; YELLOWISH GRAY TO VERY DARK RED
0% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: PHOSPHATIC SAND- %, CALCILUTITE-45%
FOSSILS: FOSSIL MOLDS

399 - 400 CALCILUTITE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-02%
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS

400 - 403 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC
GOOD INDURATION
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-05%
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS, CORAL

403 - 404 DOLOSTONE; MODERATE LIGHT GRAY TO MODERATE GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
0-10% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-05%
FOSSILS: MOLLUSKS, CORAL, FOSSIL MOLDS

404 - 407 CALCILUTITE; YELLOWISH GRAY TO LIGHT GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: CALCILUTITE, BIOGENIC

MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL MOLDS

407 - 411 CALCILUTITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, VUGULAR, PIN POINT VUGS
GRAIN TYPE: CALCILUTITE, BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: CLAY-05%, QUARTZ SAND-02%
PHOSPHATIC SAND-01%
FOSSILS: FOSSIL MOLDS

411 - 414.2 CALCARENITE; YELLOWISH GRAY TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-01%
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS

414.2- 415.8 CALCILUTITE; YELLOWISH GRAY TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: CLAY-05%, QUARTZ SAND-02%
PHOSPHATIC SAND-01%
FOSSILS: ORGANICS
ORGANIC-RICH CLAY SEAM.

415.8- 419.2 CALCARENITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND- %, PHOSPHATIC SAND- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

419.2- 422.7 CALCILUTITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, VUGULAR
GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: CLAY-05%, QUARTZ SAND- %
PHOSPHATIC SAND-%

422.7- 424.1 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL

MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND- %, PHOSPHATIC SAND- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

424.1- 431.5 CALCARENITE; YELLOWISH GRAY TO LIGHT GRAY
20% POROSITY: INTERGRANULAR, VUGULAR, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, QUARTZ SAND-05%
PHOSPHATIC SAND-05%, PHOSPHATIC GRAVEL-01%
OTHER FEATURES: GRANULAR, DOLOMITIC, VARVED, GREASY
MEDIUM RECRYSTALLIZATION

431.5- 438.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-05%
PHOSPHATIC GRAVEL-01%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS
MOLDS AND CASTS AT BOTTOM OF SECTION.

438.5- 439 CALCILUTITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, VUGULAR
GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-02%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: NO FOSSILS

439 - 444 CALCILUTITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-05%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL MOLDS

444 - 449 CALCARENITE; YELLOWISH GRAY TO LIGHT GREENISH GRAY
20% POROSITY: INTERGRANULAR, VUGULAR, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-10%, PHOSPHATIC SAND-05%
CALCILUTITE- %

OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

449 - 453 CALCARENITE; YELLOWISH GRAY TO LIGHT OLIVE GRAY
15% POROSITY: INTERGRANULAR, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-02%
CALCILUTITE- %
OTHER FEATURES: VARVED, GREASY, MEDIUM RECRYSTALLIZATION

453 - 459.1 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, VUGULAR, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-05%
CALCILUTITE- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
DARK GRAY CALCILUTITE INCLUSIONS, PHOSPHATE-FILLED MOLLUSK MOLDS.

459.1- 463 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, MOLDIC, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-05%
CALCILUTITE- %, SPAR- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
CALCILUTITE-FILLED HORIZONTAL FRACTURES.

463 - 466.2 CALCILUTITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: QUARTZ SAND-05%, PHOSPHATIC SAND-02%
FOSSILS: NO FOSSILS

466.2- 474 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, MOLDIC, VUGULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
ACCESSORY MINERALS: CALCILUTITE-10%, QUARTZ SAND-05%
PHOSPHATIC SAND-05%
OTHER FEATURES: WEATHERED
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, WORM TRACES
PHOSPHATIZED FOSSIL CASTS, MORE SANDY AT BOTTOM OF SECTION.

474 - 479 CALCARENITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
CLAY MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, BRECCIATED
BIOTURBATED, MOTTLED
ACCESSORY MINERALS: CALCILUTITE-05%, QUARTZ SAND-02%
PHOSPHATIC SAND-01%
OTHER FEATURES: WEATHERED
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BRECCIATED, WEATHERED SECTION (UNCONFORMITY?); GRAY
DOLOMITE AND BROWN, ORGANIC-RICH CLAY SEAMS; DOLOMITIZED
MOLLUSKS. TOP OF SUWANNEE FORMATION AT 479'.

479 - 483 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED
ACCESSORY MINERALS: SPAR-02%
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS
BENTHIC FORAMINIFERA

483 - 484 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
25% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, INTRACLASTS
POOR INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BRECCIATED
ACCESSORY MINERALS: SPAR-02%
FOSSILS: MOLLUSKS, FOSSIL MOLDS, FOSSIL FRAGMENTS
BENTHIC FORAMINIFERA

484 - 489 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION
ACCESSORY MINERALS: SPAR-05%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS, MOLLUSKS
BENTHIC FORAMINIFERA

489 - 491 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS, ORGANICS

491 - 503.5 CALCARENITE; YELLOWISH GRAY TO MODERATE LIGHT GRAY
25% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, PELLET
MODERATE INDURATION

CEMENT TYPE(S): CALCILUTITE MATRIX
ACCESSORY MINERALS: SPAR-05%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS

503.5- 507 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED
ACCESSORY MINERALS: CALCILUTITE-05%, SPAR-05%
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS

507 - 509 CALCARENITE; GRAYISH YELLOW TO YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, MOLDIC, FRACTURE
GRAIN TYPE: BIOGENIC, PELLET
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, CLAY MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BEDDED
ACCESSORY MINERALS: CLAY-05%, SPAR-05%
OTHER FEATURES: GRANULAR, PARTINGS
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS

509 - 513 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, MOLDIC, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, LAMINATED, BIOTURBATED
ACCESSORY MINERALS: SPAR-05%
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS, MOLLUSKS

513 - 514.5 CLAY; GRAYISH GREEN
10% POROSITY: INTERGRANULAR, INTRAGRANULAR
LOW PERMEABILITY; MODERATE INDURATION
CEMENT TYPE(S): CLAY MATRIX, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BRECCIATED, INTERBEDDED
ACCESSORY MINERALS: LIMESTONE-40%
CLAY FILLED, FRACTURED CALCARENITE.

514.5- 520 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, MOLDIC, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, INTRACLASTS
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BRECCIATED, MOTTLED
ACCESSORY MINERALS: CALCILUTITE- %
FOSSILS: FOSSIL MOLDS, MOLLUSKS
T.D. OF COREHOLE #2.

520 - 524 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, MOLDIC, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION

CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BRECCIATED, INTERBEDDED
OTHER FEATURES: CHALKY
FOSSILS: FOSSIL MOLDS, MOLLUSKS

524 - 530 AS ABOVE
INTERBEDDED CALCILUTITE AND FRACTURED CALCARENITE.

530 - 533 CALCARENITE; YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, MOLDIC, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
FOSSILS: FOSSIL MOLDS, MOLLUSKS

533 - 536 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
30% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: HIGH RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA, MOLLUSKS
FOSSIL MOLDS
ABUNDANT FORAM FRAGS, SORITES SP.

536 - 540 CALCARENITE; VERY LIGHT ORANGE TO PINKISH GRAY
25% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA, MOLLUSKS
FOSSIL MOLDS

540 - 543 CALCARENITE; PINKISH GRAY
10% POROSITY: INTERGRANULAR, MOLDIC, VUGULAR
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BIOTURBATED
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS
BENTHIC FORAMINIFERA

543 - 544 CALCARENITE; VERY LIGHT ORANGE TO PINKISH GRAY
30% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA

544 - 547.5 CALCARENITE; PINKISH GRAY
20% POROSITY: INTERGRANULAR, MOLDIC, VUGULAR
GRAIN TYPE: BIOGENIC
GOOD INDURATION
SEDIMENTARY STRUCTURES: BANDED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA
BURROWS, INFILLED VUGS.

547.5- 565 CALCARENITE; PINKISH GRAY TO YELLOWISH GRAY
20% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: HIGH RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA, CORAL
LARGE MOLLUSK MOLDS, CALCITE LINED VUGS, CORAL FRAGMENTS
CRAB SHELL, SORITES SP.

565 - 575 CALCARENITE; PINKISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, SKELETAL, PELLET
MODERATE INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT, CALCILUTITE MATRIX
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA
FOSSIL MOLDS

575 - 585 CALCARENITE; PINKISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, CHALKY, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA
FINER GRAINED THAN ABOVE INTERVAL; POORLY CEMENTED IN PLACES.

585 - 593 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA
FOSSIL MOLDS, MOLLUSKS
DECREASED GRAIN SIZE OVER 575-593' INTERVAL; FEW BURROW VUGS.

593 - 604 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA
FOSSIL MOLDS, ECHINOID
MINOR VERTICAL FRACTURES, SMALL VUGS AND FOSSIL MOLDS
ECHINOID SPINES.

604 - 609 CALCARENITE; PINKISH GRAY TO YELLOWISH GRAY
30% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
ECHINOID, BENTHIC FORAMINIFERA
ABUNDANT MOLLUSK MOLDS/CASTS, WHOLE ECHINOIDS (CASSIDULUS
SP.) POOR CORE RECOVERY, POSSIBLE CAVITY ZONE.

609 - 617 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA, ECHINOID

617 - 626.5 CALCARENITE; MODERATE ORANGE PINK TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA

626.5- 628 CALCARENITE; PINKISH GRAY TO YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, MOLDIC
GRAIN TYPE: BIOGENIC, SKELETAL
MODERATE INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %, CALCILUTITE- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
ECHINOID

628 - 638 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, PIN POINT VUGS

GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, QUARTZ SAND- %
CALCILUTITE- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS

638 - 649 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, CALCILUTITE- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS
BENTHIC FORAMINIFERA
CALCITE CRYSTALS.

649 - 659 CALCARENITE; YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, CLAY- %, CALCILUTITE- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA, BRYOZOA
CLAY-FILLED MOLDS, VUGS AND FRACTURES; ABUNDANT FOSSILS. AT BOTTOM.

659 - 669 CALCARENITE; YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, CALCILUTITE- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, GRANULAR
DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
MORE MOLDIC AND VUGGY AT BOTTOM OF SECTION.

669 - 680 CALCARENITE; YELLOWISH GRAY TO YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE- %, SPAR- %
OTHER FEATURES: GRANULAR, MEDIUM RECRYSTALLIZATION
CALCAREOUS
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS
BENTHIC FORAMINIFERA, MOLLUSKS, CONES

GLOBULA GYPSINA, COSTINOLINA FLORIDANA.

680 - 697.6 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE- %, SPAR- %
OTHER FEATURES: GRANULAR, CALCAREOUS
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, ECHINOID
FINER GRAINED AND LESS FOSSILIFEROUS THAN ABOVE SECTION.

697.6- 699 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
30% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
OTHER FEATURES: GRANULAR, CALCAREOUS
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
ECHINOID

699 - 705.5 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
ECHINOID

705.5- 710 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
30% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, SKELETAL, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, BIOTURBATED
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
ECHINOID, BRYOZOA
ABUNDANT ECHINOID FRAGMENTS, MOLLUSK MOLDS, CALCITE-LINED
MOLDS.

710 - 715 CALCARENITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS, BRYOZOA
SEDIMENT-FILLED BURROW VUGS, BRYOZOAN FRAGMENTS, CRAB
CLAWS.

715 - 726 CALCARENITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS

726 - 739.3 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, CALCILUTITE- %
OTHER FEATURES: GRANULAR, MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MILIOLIDS
SPICULES
CALCITE CRYSTALS AT BOTTOM OF INTERVAL.

739.3- 749 CALCARENITE; YELLOWISH GRAY
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, LAMINATED
ACCESSORY MINERALS: SPAR- %, DOLOMITE- %
CALCILUTITE- %
OTHER FEATURES: GRANULAR, MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, WORM TRACES

749 - 759 CALCARENITE; YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, PHOSPHATE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, LAMINATED
BIOTURBATED
ACCESSORY MINERALS: SPAR- %, CALCILUTITE- %, CLAY- %
OTHER FEATURES: GRANULAR, MEDIUM RECRYSTALLIZATION
DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS, WORM TRACES
DOLOMITE LENSE AT TOP OF SECTION; HAIRLINE VERTICAL
FRACTURES IN DOLOMITE AT BOTTOM OF SECTION; SMALL CALCITE
CRYSTALS.

759 - 764 DOLOMITIZED LIMESTONE, ORGANIC CLAY
INFILLED VUGS AND WORM BURROWS; YELLOWISH GRAY CALCAREOUS
CLAY LENSES; FINER GRAINED AT TOP OF SECTION; FEWER
FOSSILS; LIGHTER COLOR TOWARD BOTTOM OF SECTION.

764 - 774 CALCARENITE;
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION

CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, MOTTLED
ACCESSORY MINERALS: CALCILUTITE- %, SPAR- %
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS

774 - 780.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CRYSTALS
MODERATE INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: SPAR-20%, DOLOMITE-02%, IRON STAIN- %
OTHER FEATURES: GRANULAR
FOSSILS: FOSSIL FRAGMENTS
SPARRY CALCITE AND GRAY CRYSTALLINE DOLOMITE INCLUSIONS.

780.5- 787 CALCARENITE; YELLOWISH GRAY TO LIGHT GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CRYSTALS, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): SPARRY CALCITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, LAMINATED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-20%, SPAR-05%, IRON STAIN- %
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, OSTRACODS
GRAY DOLOMITE THROUGHOUT INTERVAL, MORE ABUNDANT NEAR BOTTOM; THIN DOLOMITE BEDS, AND LAMINAE; IRON STAINED CALCITE, ORGANICS.

787 - 796 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, CRYSTALS
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
OTHER FEATURES: VARVED, FROSTED
FIRST OCCURRENCE OF LEPIDOCYCLINA SP. AT THE TOP OF INTERVAL.

796 - 799.5 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, CRYSTALS
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA
THIN BED OF ORGANIC-RICH LIME MUD, 798-798.5 FT.

799.5- 801.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
30% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, SKELETAL, CALCILUTITE
GOOD INDURATION

CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: DOLOMITE-10%, SPAR- %
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS, BRYOZOA
BENTHIC FORAMINIFERA
ABUNDANT BRYOZOAN FRAGMENTS; LEPIDOCYCLINA SP. COMMON.

801.5- 811 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED
ACCESSORY MINERALS: SPAR- %, DOLOMITE- %
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS, BRYOZOA
BENTHIC FORAMINIFERA

811 - 815.5 AS ABOVE

815.5- 815.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
ACCESSORY MINERALS: SPAR- %
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA

815.5- 824.5 CALCARENITE; YELLOWISH GRAY TO YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, QUARTZ SAND- %
OTHER FEATURES: DOLOMITIC, MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS
BENTHIC FORAMINIFERA, BRYOZOA
BRYOZOA COMMON; FORAM MOLDS; LEPIDOCYCLINA SP.

824.5- 827 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: SPAR- %, DOLOMITE- %
CALCILUTITE- %
OTHER FEATURES: DOLOMITIC, MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, ECHINOID, BRYOZOA
BENTHIC FORAMINIFERA
RECRYSTALLIZED FOSSILS; CALCITE-LINED MOLDS; LEPIDOCYCLINA
SP.

827 - 834.8 CALCARENITE; YELLOWISH GRAY TO MODERATE DARK GRAY

15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, MOTTLED
BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-20%, CALCILUTITE- %
OTHER FEATURES: DOLOMITIC, REEFAL
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, SPICULES
ORGANICS, BRYOZOA
INTERBEDDED DOLOMITIC CALCARENITE AND FINE GRAINED
CALCARENITE.

834.8- 839.6 CALCARENITE; PINKISH GRAY TO LIGHT OLIVE GRAY
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, PHOSPHATE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, MOTTLED
ACCESSORY MINERALS: DOLOMITE-30%, CALCILUTITE-30%
CLAY- %, DOLOMITE-0 %
FOSSILS: FOSSIL FRAGMENTS, ORGANICS, WORM TRACES, ECHINOID
WORM BURROWS WITH DARK ORGANIC INFILLING AT TOP OF SECTION
GRADES TO DOLOMITIC LIMESTONE; SPARSE FOSSILS, WITH CALCITE
RECRYSTALLIZATION.

839.6- 849 DOLOSTONE; LIGHT BROWN TO GRAYISH BROWN
05% POROSITY: INTERCRYSTALLINE, FRACTURE, LOW PERMEABILITY
50-90% ALTERED; SUBHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, MOTTLED
ACCESSORY MINERALS: CALCILUTITE-20%
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: ORGANICS
HORIZONTAL AND VERTICAL FRACTURES; VISIBLE DOLOMITE RHOMBS.

849 - 850.5 DOLOSTONE; LIGHT BROWN
10% POROSITY: INTERGRANULAR, INTERCRYSTALLINE, MOLDIC
50-90% ALTERED; ANHEDRAL
GRAIN SIZE: VERY FINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: CALCILUTITE- %
OTHER FEATURES: LOW RECRYSTALLIZATION
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, MOLLUSKS

850.5- 853 SILT-SIZE DOLOMITE; LIGHT BROWN
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
GRADED BEDDING
ACCESSORY MINERALS: CALCILUTITE- %
OTHER FEATURES: PARTINGS, MEDIUM RECRYSTALLIZATION

SUCROSIC
FOSSILS: NO FOSSILS, FOSSIL MOLDS

853 - 859 DOLOSTONE; LIGHT BROWN TO GRAYISH ORANGE PINK
05% POROSITY: INTERGRANULAR, INTERCRYSTALLINE, FRACTURE
50-90% ALTERED; ANHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO CRYPTOCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: GRADED BEDDING, MASSIVE
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ECHINOID
RHOMBIC DOLOMITE CRYSTALS; ECHINOID MOLDS; VERTICAL
FRACTURES.

859 - 867.9 DOLOSTONE; YELLOWISH GRAY TO MODERATE ORANGE PINK
05% POROSITY: INTERGRANULAR, INTERCRYSTALLINE, FRACTURE
50-90% ALTERED; ANHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE- %, QUARTZ SAND- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: ORGANICS
PIN POINT VUGS; LOW PERMEABILITY.

867.9- 881 DOLOSTONE; YELLOWISH GRAY TO MODERATE ORANGE PINK
05% POROSITY: INTERGRANULAR, INTERCRYSTALLINE, FRACTURE
50-90% ALTERED; ANHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, LAMINATED
ACCESSORY MINERALS: CALCILUTITE- %, CLAY- %
QUARTZ SAND- %
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: ORGANICS
MODERATE BROWN ORGANIC CLAY LENSES AND ORGANIC LAMINATIONS
MINOR VERTICAL FRACTURES AND PIN POINT VUGS, LOW
PERMEABILITY.

881 - 884 NO SAMPLES
TOP OF OCALA; NO CORE RECOVERY; SOFT, ORGANIC-RICH
SEDIMENT; POSSIBLE CAVITY.

884 - 898.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
25% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, GRADED BEDDING
ACCESSORY MINERALS: DOLOMITE- %
OTHER FEATURES: LOW RECRYSTALLIZATION, DOLOMITIC
FOSSILS: FOSSIL FRAGMENTS, FOSSIL MOLDS, BRYOZOA
WORM TRACES, BENTHIC FORAMINIFERA

CALCITE RECRYSTALLIZED FOSSILS; MINOR VUGS AND FRACTURES
LEPIDOCYCLINA SP.; SUWANNE-OCALA CONTACT AT 884 FT.

898.5- 902 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
15% POROSITY: MOLDIC, PIN POINT VUGS, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED
ACCESSORY MINERALS: CALCITE-05%
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS, BENTHIC FORAMINIFERA
ORGANICS
PECTEN SHELL FRAGMENTS COMMON; LEPIDOCYCLINA; TRACE OF
ORGANICS.

902 - 907.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: PIN POINT VUGS, INTERGRANULAR
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: CALCITE-05%, PLANT REMAINS- %
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS, BENTHIC FORAMINIFERA
ORGANICS

907.5- 914 AS ABOVE
VARIABLE POROSITY; MOLLUSK MOLDS; PLANT REMAINS; PECTEN
LEPIDOCYCLINA.

914 - 924 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: CALCITE- %, PLANT REMAINS- %
FOSSILS: FOSSIL FRAGMENTS, MOLLUSKS, BENTHIC FORAMINIFERA
PECTEN SHELLS; LEPIDOCYCLINA; FILLED SUB-VERTICAL
FRACTURES.

924 - 938.6 CALCILUTITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCITE- %, SPAR- %
OTHER FEATURES: LOW RECRYSTALLIZATION, CHALKY
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS
BENTHIC FORAMINIFERA, MOLLUSKS, BRYOZOA
CALCITE RECRYSTALLIZED LEPIDOCYCLINA; FOSSIL MOLDS
ECHINOID SPINES.

938.6- 946.1 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE

10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE-45%
OTHER FEATURES: LOW RECRYSTALLIZATION
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS
BENTHIC FORAMINIFERA, MOLLUSKS
LEPIDOCYCLINA SP., NUMMULITES V.; SOME FOSSIL MOLDS
ECHINOID SPINES. GRADES TO A FINE-GRAINED, VERY PALE ORANGE
CALCILUTITE.

946.1- 959 CALCILUTITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: LIMESTONE- %
OTHER FEATURES: LOW RECRYSTALLIZATION, CHALKY
FOSSILS: FOSSIL FRAGMENTS, BENTHIC FORAMINIFERA, ECHINOID
NUMMULITES (ALTERED); LEPIDOCYCLINA SP.

959 - 970 CALCILUTITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: LIMESTONE- %
OTHER FEATURES: LOW RECRYSTALLIZATION, CHALKY, PARTINGS
FOSSILS: BENTHIC FORAMINIFERA, FOSSIL MOLDS, ECHINOID
MOLLUSKS
LEPIDOCYCLINA SP.; ECHINOID MOLDS; CALCITE-LINED INTERNAL
MOLDS.

970 - 973.1 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE-40%
OTHER FEATURES: LOW RECRYSTALLIZATION, PARTINGS
FOSSILS: BENTHIC FORAMINIFERA, FOSSIL MOLDS, MOLLUSKS
FOSSIL FRAGMENTS
MORE FOSSILIFEROUS; LEPIDOCYCLINA MOLDS.

973.1- 976.4 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE

MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE-40%
OTHER FEATURES: LOW RECRYSTALLIZATION, CHALKY, PARTINGS
FOSSILS: BENTHIC FORAMINIFERA, MOLLUSKS, FOSSIL MOLDS
LEPIDOCYCLINA SP.; NUMMULITES SP.

976.4- 979 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, SKELETAL
POOR INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE-30%
OTHER FEATURES: LOW RECRYSTALLIZATION
FOSSILS: BENTHIC FORAMINIFERA, MOLLUSKS, FOSSIL MOLDS
FOSSIL FRAGMENTS
HIGHLY FOSSILIFEROUS; LEPIDOCYCLINA (ALTERED), GASTROPODS.

979 - 981.6 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE-45%
OTHER FEATURES: LOW RECRYSTALLIZATION, CHALKY
FOSSILS: BENTHIC FORAMINIFERA, FOSSIL MOLDS, ECHINOID

981.6- 983.1 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE-40%
OTHER FEATURES: LOW RECRYSTALLIZATION, CHALKY
FOSSILS: MILIOLIDS, FOSSIL MOLDS, ECHINOID
ALTERED FOSSILS, LEPIDOCYCLINA SP. NUMMULITES SP.

983.1- 991 AS ABOVE

991 - 1001.7 CALCARENITE; YELLOWISH GRAY TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE, MOTTLED
ACCESSORY MINERALS: CALCILUTITE-40%, DOLOMITE- %
OTHER FEATURES: FROSTED, CHALKY
ABUNDANT NUMMULITES, RECRYSTALLIZED FOSSILS, HARDER, DENSER AT BOTTOM.

1001.7- 1003.7 CALCILUTITE; YELLOWISH GRAY TO LIGHT BROWN

05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): GYPSUM CEMENT, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BEDDED, MASSIVE
ACCESSORY MINERALS: CALCILUTITE- %, DOLOMITE- %
OTHER FEATURES: PARTINGS, DOLOMITIC
MEDIUM RECRYSTALLIZATION
FOSSILS: BENTHIC FORAMINIFERA
NUMEROUS FORAMS; DENSE, DOLOMITE SILT PARTINGS AT BOTTOM OF SECTION.

1003.7- 1009 DOLOSTONE; MODERATE YELLOWISH BROWN TO MODERATE BROWN
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 50-90% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: GRADED BEDDING, MASSIVE
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: BENTHIC FORAMINIFERA, ECHINOID, FOSSIL MOLDS
GRADES FROM LIGHT BROWN TO MODERATE BROWN; ECHINOIDS AND NUMMULITES MOLDS.

1009 - 1014 DOLOSTONE; MODERATE YELLOWISH BROWN TO MODERATE BROWN
15% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
FORAM MOLDS COMMON; NUMMULITES SP.; SUBHEDRAL DOLOMITE-LINED VUGS.

1014 - 1017.5 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
20% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA

1017.5- 1019 DOLOSTONE; MODERATE YELLOWISH BROWN TO GRAYISH ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
50-90% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, ORGANIC MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: PLANT REMAINS-10%, CLAY-05%
OTHER FEATURES: SUCROSIC, VARVED
FOSSILS: ORGANICS, FOSSIL MOLDS, PLANT REMAINS
WAXY ORGANIC CLAY SEAM AT 1018.5 FT.

1019 - 1023.7 DOLOSTONE; MODERATE YELLOWISH BROWN TO MODERATE BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
50-90% ALTERED; ANHEDRAL

GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA

1023.7- 1024.6 DOLOSTONE; LIGHT BROWN TO MODERATE YELLOWISH BROWN
23% POROSITY: INTERGRANULAR, PIN POINT VUGS
50-90% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA

1024.6- 1036.6 DOLOSTONE; MODERATE YELLOWISH BROWN TO LIGHT BROWN
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
50-90% ALTERED; ANHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ORGANICS, BENTHIC FORAMINIFERA
MOLLUSKS

1036.6- 1045.9 DOLOSTONE; MODERATE BROWN TO MODERATE OLIVE BROWN
25% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; ANHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ECHINOID, BENTHIC FORAMINIFERA
HIGH POROSITY MOLDIC POROSITY; NUMMULITES MOLDS, ECHINOIDS COMMON.

1045.9- 1053.5 DOLOSTONE; MODERATE BROWN TO MODERATE OLIVE BROWN
10% POROSITY: INTERGRANULAR, MOLDIC; 50-90% ALTERED
ANHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: VERY FINE TO MICROCRYSTALLINE; GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ECHINOID

1053.5- 1057 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
30% POROSITY: MOLDIC, VUGULAR, POSSIBLY HIGH PERMEABILITY
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ECHINOID

1057 - 1059 DOLOSTONE; GRAYISH ORANGE TO MODERATE YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
50-90% ALTERED; ANHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, ORGANIC MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: PLANT REMAINS-10%, CLAY-02%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: ORGANICS, FOSSIL MOLDS, BENTHIC FORAMINIFERA
PLANT REMAINS
ORGANIC CLAY BED AT 1057.5 FT.; THIN ORGANIC PARTINGS
FORAM MOLDS AT BOTTOM OF INTERVAL.

1059 - 1063 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
20% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: PLANT REMAINS-05%
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ORGANICS
ORGANIC CLAY LAMINATIONS AT BOTTOM OF INTERVAL.

1063 - 1076 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
30% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
ABUNDANT DOLOMITE CRYSTAL-LINED FORAM MOLDS; HIGH MOLDIC
POROSITY.

1076 - 1079.8 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
20% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, MOTTLED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA

1079.8- 1081.6 DOLOSTONE; GRAYISH BROWN TO MODERATE YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, ORGANIC MATRIX
SEDIMENTARY STRUCTURES: LAMINATED, MOTTLED, STREAKED
ACCESSORY MINERALS: PLANT REMAINS-05%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: ORGANICS, PLANT REMAINS

1081.6- 1089.5 DOLOSTONE; MODERATE YELLOWISH BROWN TO MODERATE BROWN
20% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL

GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
VERTICAL FRACTURES; NUMEROUS LEPIDOCYCLINA AND NUMMULITES MOLDS.

1089.5- 1093.3 DOLOSTONE; MODERATE YELLOWISH BROWN TO MODERATE BROWN
10% POROSITY: INTERGRANULAR, FRACTURE, LOW PERMEABILITY
10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: ORGANICS, FOSSIL MOLDS
SOME ORGANICS ON FRACTURED SURFACES.

1093.3- 1100.9 DOLOSTONE; DARK YELLOWISH BROWN TO MODERATE BROWN
25% POROSITY: MOLDIC, INTERGRANULAR
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
VERTICAL FRACTURES; FORAM MOLDS COMMON.

1100.9- 1102.2 DOLOSTONE; MODERATE YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA

1102.2- 1107.5 DOLOSTONE; DARK YELLOWISH BROWN
20% POROSITY: MOLDIC, PIN POINT VUGS
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
HIGH MOLDIC AND VUGULAR POROSITY; FORAM AND ECHINOID MOLDS COMMON.

1107.5- 1111.7 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED, MOTTLED STREAKED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ORGANICS

1111.7- 1120 DOLOSTONE; DARK YELLOWISH BROWN TO MODERATE YELLOWISH BROWN
15% POROSITY: INTERGRANULAR, MOLDIC, FRACTURE
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ECHINOID
NUMEROUS FORAM MOLDS; NUMMULITES; LEPIDOCYCLINA.

1120 - 1124.2 DOLOSTONE; MODERATE YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY; 10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
FOSSIL FRAGMENTS

1124.2- 1127 DOLOSTONE; MODERATE YELLOWISH BROWN TO MODERATE BROWN
15% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA

1127 - 1127.5 DOLOSTONE; MODERATE YELLOWISH BROWN TO LIGHT BROWN
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED, MOTTLED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, SUCROSIC
FOSSILS: NO FOSSILS

1127.5- 1129 DOLOSTONE; MODERATE YELLOWISH BROWN
15% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ECHINOID
ECHINOID MOLDS (NEOLAGANUM DURHAMI?); FRACTURES AT BOTTOM
OF SECTION.

1129 - 1133 DOLOSTONE; GRAYISH ORANGE TO MODERATE YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, MOTTLED
ACCESSORY MINERALS: PLANT REMAINS-02%

OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ORGANICS
PLANT REMAINS

1133 - 1137 DOLOSTONE; GRAYISH ORANGE TO MODERATE YELLOWISH BROWN
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: STYLOLITIC, MOTTLED
ACCESSORY MINERALS: PLANT REMAINS-01%
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ORGANICS
PLANT REMAINS
FEW VERTICAL TO SUB-VERTICAL FRACTURES, NUMMULITES MOLDS.

1137 - 1137.8 DOLOSTONE; DARK YELLOWISH BROWN TO MODERATE YELLOWISH BROWN
10% POROSITY: INTERGRANULAR, LOW PERMEABILITY
10-50% ALTERED; SUBHEDRAL
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, ORGANIC MATRIX
SEDIMENTARY STRUCTURES: LAMINATED, MOTTLED, INTERBEDDED
ACCESSORY MINERALS: PLANT REMAINS-05%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, VARVED
FOSSILS: ORGANICS, PLANT REMAINS

1137.8- 1141.5 DOLOSTONE; GRAYISH BROWN TO DARK YELLOWISH BROWN
15% POROSITY: INTERGRANULAR, MOLDIC, FRACTURE
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED, LAMINATED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA, ECHINOID

1141.5- 1145.7 AS ABOVE
VERTICAL FRACTURES, FORAM AND ECHINOID MOLDS.

1145.7- 1147.6 DOLOSTONE; GRAYISH BROWN
05% POROSITY: INTERGRANULAR, FRACTURE, LOW PERMEABILITY
50-90% ALTERED; SUBHEDRAL
GRAIN SIZE: MICROCRYSTALLINE
RANGE: CRYPTOCRYSTALLINE TO MICROCRYSTALLINE
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, BENTHIC FORAMINIFERA
SPARSE FORAMINIFERA MOLDS; FILLED FRACTURES, HARD
RECRYSTALLIZED.

1147.6- 1147.9 DOLOSTONE; GRAYISH YELLOW TO GRAYISH BROWN
15% POROSITY: INTERGRANULAR, FRACTURE
POSSIBLY HIGH PERMEABILITY; 10-50% ALTERED; SUBHEDRAL
GRAIN SIZE: VERY FINE
RANGE: MICROCRYSTALLINE TO VERY FINE; MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT

SEDIMENTARY STRUCTURES: INTERBEDDED, BANDED, LAMINATED
ACCESSORY MINERALS: CLAY- %, LIMESTONE- %
FOSSILS: ORGANICS, FOSSIL MOLDS, MOLLUSKS
INTERBEDDED DARK YELLOW-GREEN, ORGANIC-RICH CLAY SEAMS AND LIMESTONE; MINOR FRACTURES AND FORAM MOLDS IN THIS DOLOSTONE.

1147.9- 1150.9 DOLOSTONE; MODERATE YELLOWISH BROWN TO DARK YELLOWISH BROWN
20% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
ACCESSORY MINERALS: LIMESTONE-45%
OTHER FEATURES: CALCAREOUS, DOLOMITIC, GRANULAR, SUCROSIC
MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL MOLDS, ECHINOID, MOLLUSKS, ORGANICS
INTERBEDDED CALCARENITE AND MOLDIC DOLOSTONE, ABUNDANT ECHINOIDS.

1150.9- 1155.3 DOLOSTONE; LIGHT GRAYISH BROWN TO DARK GRAYISH YELLOW
25% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
ACCESSORY MINERALS: LIMESTONE- %
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ECHINOID, FOSSIL FRAGMENTS
HIGHLY PERMEABLE MOLDIC DOLOSTONE, ABUNDANT ECHINOID MOLDS.

1155.3- 1156.8 DOLOSTONE; MODERATE BROWN TO MODERATE BROWN
10% POROSITY: INTERGRANULAR, MOLDIC, LOW PERMEABILITY
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ECHINOID, BENTHIC FORAMINIFERA
ORGANICS

1156.8- 1158.6 DOLOSTONE; LIGHT BROWN TO MODERATE BROWN
25% POROSITY: INTERGRANULAR, MOLDIC
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE, LAMINATED
MOTTLED
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ECHINOID, BENTHIC FORAMINIFERA
ORGANICS
DARK YELLOW-GREEN CLAY LENSE AT 1157 FT.; HIGH MOLDIC POROSITY.

1158.6- 1159.4 CALCARENITE; GRAYISH BROWN TO GRAYISH ORANGE
20% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
PIN POINT VUGS

GRAIN TYPE: CALCILUTITE
MODERATE INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL MOLDS
INTERBEDDED DOLOSTONE AND CALCARENITE.

1159.4- 1163.3 DOLOSTONE; MODERATE YELLOWISH BROWN TO GRAYISH YELLOW
10% POROSITY: INTERGRANULAR, MOLDIC, PIN POINT VUGS
10-50% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, GRADED BEDDING
BIOTURBATED, LAMINATED
ACCESSORY MINERALS: LIMESTONE-45%
OTHER FEATURES: CALCAREOUS, MEDIUM RECRYSTALLIZATION
FOSSILS: FOSSIL MOLDS, ECHINOID, FOSSIL FRAGMENTS
ECHINOIDS (NEOLAGANUM DURHAMI) IN A DOLOSTONE SILT MATRIX.

1163.3- 1166.1 DOLOSTONE; DARK YELLOWISH BROWN TO MODERATE BROWN
20% POROSITY: INTERGRANULAR, POSSIBLY HIGH PERMEABILITY
MOLDIC; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
OTHER FEATURES: HIGH RECRYSTALLIZATION, SUCROSIC
FOSSILS: FOSSIL MOLDS, ECHINOID
ECHINOIDS, (PERIARCHUS LYELLI?) MOLD; NUMEROUS NEOLAGANUM
DURHAMI MOLDS.

1166.1- 1167.6 DOLOSTONE; MODERATE YELLOWISH BROWN TO GRAYISH YELLOW
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
10-50% ALTERED; ANHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: CALCILUTITE-45%
OTHER FEATURES: CALCAREOUS, DOLOMITIC
FOSSILS: FOSSIL MOLDS, ECHINOID

1167.6- 1174 CALCARENITE; VERY LIGHT ORANGE TO PINKISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, SPAR-10%
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, DOLOMITIC
FOSSILS: FOSSIL MOLDS, ECHINOID

1174 - 1178 CALCARENITE; VERY LIGHT ORANGE TO PINKISH GRAY
10% POROSITY: MOLDIC, INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION

CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: MOTTLED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, SPAR-05%
FOSSILS: FOSSIL MOLDS, ECHINOID, BENTHIC FORAMINIFERA
CRUSTACEA
EUHEDRAL CALCITE CRYSTALS IN ECHINOID MOLDS; NEOLAGANUM
DURHAMI COMMON; CRAB CLAW AT 1176 FT.

1178 - 1183.5 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
ACCESSORY MINERALS: CALCILUTITE-10%, DOLOMITE-05%
SPAR-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL MOLDS, ECHINOID, BENTHIC FORAMINIFERA

1183.5- 1185.5 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: CALCILUTITE-30%, DOLOMITE-05%
SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID

1185.5- 1186.5 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: MOLDIC, INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BIOTURBATED
ACCESSORY MINERALS: SPAR-05%, DOLOMITE-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: FOSSIL MOLDS, ECHINOID

1186.5- 1193 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: CALCILUTITE-10%, DOLOMITE-05%
SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID, BENTHIC FORAMINIFERA

1193 - 1203 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX

SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: CALCILUTITE-20%, DOLOMITE-10%
CALCITE- %
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID, ORGANICS
ECHINOID MOLDS AND CASTS; CALCITE LINED MOLDS; GRAY MOTTLING AND ORGANIC LAMINAE AT 1196 FT.

1203 - 1205.1 CALCARENITE; YELLOWISH GRAY TO GRAYISH BROWN
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
ACCESSORY MINERALS: CALCILUTITE-20%, DOLOMITE-10%
SPAR- %
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID, ORGANICS, FOSSIL MOLDS
NUMEROUS LAMINATIONS, FRACTURES, FAULTING; OFFSET BEDDING.

1205.1- 1207.5 DOLOSTONE; MODERATE BROWN TO LIGHT GRAYISH BROWN
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED
OTHER FEATURES: MEDIUM RECRYSTALLIZATION, DOLOMITIC
FOSSILS: ECHINOID, ORGANICS, FOSSIL MOLDS
ECHINOID MOLDS, VUGS; RHOMBIC DOLOMITE CRYSTALS.

1207.5- 1210.1 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, FRACTURE, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
ACCESSORY MINERALS: CALCILUTITE-20%, DOLOMITE- %
FOSSILS: BRACHIOPOD
FRACTURES; OFFSET BEDS; ECHINOID MOLDS; ALGAL-ORGANIC LAMINATIONS.

1210.1- 1211.6 DOLOSTONE; DARK YELLOWISH BROWN TO LIGHT BROWN
15% POROSITY: INTERGRANULAR, FRACTURE, VUGULAR
10-50% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED
OTHER FEATURES: DOLOMITIC, SUCROSIC
FOSSILS: ECHINOID, FOSSIL MOLDS

1211.6- 1212.4 CALCILUTITE; YELLOWISH GRAY TO MODERATE YELLOWISH BROWN
05% POROSITY: INTERGRANULAR, LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
ACCESSORY MINERALS: DOLOMITE- %

OTHER FEATURES: DOLOMITIC
FOSSILS: ORGANICS

1212.4- 1218.3 CALCARENITE; YELLOWISH GRAY TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE, LAMINATED
ACCESSORY MINERALS: DOLOMITE- %
OTHER FEATURES: DOLOMITIC, GRANULAR
FOSSILS: ECHINOID, FOSSIL MOLDS, ORGANICS
CALCITE-FILLED ECHINOID MOLDS; ALGAL-ORGANIC LAMINATIONS
DOLOMITE INCLUSIONS; ECHINOIDS (NEOLAGANUM DALLI?)

1218.3- 1225.1 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
ORGANIC MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
BIOTURBATED
ACCESSORY MINERALS: CALCILUTITE-20%, PLANT REMAINS-02%
DOLOMITE-02%, CLAY-01%
OTHER FEATURES: DOLOMITIC, GRANULAR, VARVED
FOSSILS: ORGANICS, CONES, BENTHIC FORAMINIFERA
CONVOLUTED ORGANIC LAMINAE; INFILLED BURROWS; COSKINOLINA
SP. (AVON PARK FORMATION).

1225.1- 1229.2 CALCARENITE; YELLOWISH GRAY TO YELLOWISH GRAY
POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
BIOTURBATED
ACCESSORY MINERALS: PLANT REMAINS-02%, DOLOMITE-01%
OTHER FEATURES: DOLOMITIC, VARVED
FOSSILS: ORGANICS
DOLOMITE FRAGMENTS; MICROFAULTS ACROSS LAMINAE.

1229.2- 1231.5 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
FOSSILS: FOSSIL MOLDS, ECHINOID, BENTHIC FORAMINIFERA
CONVOLUTED ORGANIC LAMINAE.

1231.5- 1242.5 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE

ACCESSORY MINERALS: SPAR-05%, DOLOMITE-02%
OTHER FEATURES: GRANULAR, DOLOMITIC
MEDIUM RECRYSTALLIZATION
FOSSILS: BENTHIC FORAMINIFERA, CONES, FOSSIL FRAGMENTS

1242.5- 1244 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, ORGANIC MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: CLAY-05%, PLANT REMAINS-02%
DOLOMITE-02%
OTHER FEATURES: DOLOMITIC, VARVED
FOSSILS: FOSSIL MOLDS, FOSSIL FRAGMENTS
BENTHIC FORAMINIFERA, MOLLUSKS

1244 - 1249 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED
ACCESSORY MINERALS: SPAR-02%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, FOSSIL FRAGMENTS
ABUNDANT FORAMS; COSKINOLINA (DICTYOCONUS?) PARAROTALIA SP.
(ROTALIA).

1249 - 1254 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: SPAR-02%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, FOSSIL FRAGMENTS
ECHINOID

1254 - 1255 CALCARENITE; VERY LIGHT ORANGE
25% POROSITY: INTERGRANULAR, PIN POINT VUGS, VUGULAR
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, SPARRY CALCITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: SPAR-05%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, FOSSIL FRAGMENTS
ECHINOID
FORAMINIFERAL PACKSTONE; ABUNDANT COSKINOLINA SP.
DICTYOCONUS SP.

1255 - 1259 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION

CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: SPAR-01%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID, MOLLUSKS
FOSSIL FRAGMENTS

1259 - 1264 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, MOTTLED, LAMINATED
ACCESSORY MINERALS: SPAR-02%, DOLOMITE-01%
OTHER FEATURES: CHALKY
FOSSILS: BENTHIC FORAMINIFERA, ECHINOID, FOSSIL FRAGMENTS
ORGANICS

1264 - 1266.5 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: SPAR-01%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID

1266.5- 1269 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: SPAR-01%, DOLOMITE-01%
PLANT REMAINS- %
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID, ORGANICS

1269 - 1279 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: SPAR-01%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID

1279 - 1289 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE

ACCESSORY MINERALS: SPAR-01%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID

1289 - 1297.5 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
ACCESSORY MINERALS: SPAR-02%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID
CALCILUTITE INTERBEDS, RECRYSTALLIZED ECHINOIDS.

1297.5- 1299 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED
ACCESSORY MINERALS: SPAR-02%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID
VERTICAL FAULTING, OFFSET BEDS, SLICKENSIDES.

1299 - 1306.5 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
ACCESSORY MINERALS: SPAR-01%, DOLOMITE-01%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID
SUB-VERTICAL FRACTURES, FEW INTERBEDS OF CALCILUTITE.

1306.5- 1318.5 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, BANDED
ACCESSORY MINERALS: DOLOMITE-05%, SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: BENTHIC FORAMINIFERA, ECHINOID
INTERBEDDED FINE GRAINED CALCARENITE AND DOLOMITIC
CALCILUTITE; SUB-VERTICAL FAULT TRACES; OFFSET BEDDING.

1318.5- 1320.5 CALCARENITE; VERY LIGHT ORANGE
20% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, MOTTLED

ACCESSORY MINERALS: DOLOMITE-05%, SPAR-02%
OTHER FEATURES: GRANULAR
FOSSILS: BENTHIC FORAMINIFERA, CONES, ECHINOID

1320.5- 1323.3 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, BANDED
ACCESSORY MINERALS: DOLOMITE-10%, SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: BENTHIC FORAMINIFERA, ECHINOID

1323.3- 1324.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
ORGANIC MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-05%
SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA
INTERBEDDED DOLOMITIC CALCILUTITE AND CALCARENITE WITH
ORGANIC LAMINAE; VERTICAL FRACTURES, OFFSET BEDS
CONVOLUTED LAMINATIONS.

1324.5- 1328 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT, CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, BANDED, BRECCIATED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-05%
SPAR-01%
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA
ECHINOID
15" LONG FAULT TRACE AT BOTTOM OF SECTION, OFFSET BEDS.

1328 - 1331.5 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-15%, PLANT REMAINS-02%
OTHER FEATURES: DOLOMITIC, SPECKLED
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA
FOSSIL MOLDS

1331.5- 1332.5 CALCARENITE; YELLOWISH GRAY TO OLIVE GRAY

05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
ORGANIC MATRIX
SEDIMENTARY STRUCTURES: MOTTLED, BRECCIATED
ACCESSORY MINERALS: PLANT REMAINS-20%, DOLOMITE-10%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS
CALCARENITE CLASTS IN AN ORGANIC-RICH DOLOMITIC CALCILUTITE MATRIX.

1332.5- 1335 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
ORGANIC MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-10%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA
FOSSIL MOLDS

1335 - 1337.5 CALCARENITE; VERY LIGHT ORANGE
15% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
ACCESSORY MINERALS: DOLOMITE-05%, HEMATITE-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA
FOSSIL MOLDS, ECHINOID

1337.5- 1339 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED BIOTURBATED, BRECCIATED
ACCESSORY MINERALS: DOLOMITE-05%, PLANT REMAINS-05%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA
FOSSIL MOLDS
SUB-VERTICAL FAULTS; FRACTURED OFFSET BEDDING.

1339 - 1344 AS ABOVE
FAULT LINES; SLICKENSIDES; ECHINOID MOLDS.

1344 - 1351 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY

GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, BRECCIATED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-02%
MULTIPLE FRACTURES AND FAULT LINES; SLICKENSIDES; OFFSET BEDDING.

1351 - 1359 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, MOTTLED
ACCESSORY MINERALS: DOLOMITE-05%, SPAR-01%
PLANT REMAINS- %
OTHER FEATURES: DOLOMITIC, SUCROSIC
FOSSILS: ECHINOID, BENTHIC FORAMINIFERA, PLANT REMAINS
SUB-VERTICAL FAULTS; SLICKENSIDES.

1359 - 1363 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, BEDDED, MOTTLED
ACCESSORY MINERALS: DOLOMITE-05%, SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID, BENTHIC FORAMINIFERA

1363 - 1368 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MOTTLED, BRECCIATED
ACCESSORY MINERALS: DOLOMITE-05%
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID, BENTHIC FORAMINIFERA, FOSSIL MOLDS

1368 - 1376 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, MOTTLED
ACCESSORY MINERALS: DOLOMITE-02%
OTHER FEATURES: DOLOMITIC
FOSSILS: ECHINOID, BENTHIC FORAMINIFERA, FOSSIL MOLDS
SUB-VERTICAL FAULT LINES.

1376 - 1381 CALCARENITE; VERY LIGHT ORANGE TO YELLOWISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE

GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, MOTTLED
BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-05%
SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS, ECHINOID
BENTHIC FORAMINIFERA
CALCARENITE FRAGMENTS IN A DOLOMITIC, ORGANIC-RICH
CALCILUTITE; CALCARENITE INTERBEDS; ORGANIC LAMINATIONS
FAULTED, FRACTURED; OFFSET BEDDING.

1381 - 1383.5 CALCARENITE; VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE
ACCESSORY MINERALS: DOLOMITE-05%, PLANT REMAINS-02%
OTHER FEATURES: GRANULAR, SPECKLED
FOSSILS: PLANT REMAINS, ORGANICS, ECHINOID
BENTHIC FORAMINIFERA

1383.5- 1389 CALCARENITE; VERY LIGHT ORANGE TO MODERATE LIGHT GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: INTERBEDDED, LAMINATED, BRECCIATED
MOTTLED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-05%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS, BENTHIC FORAMINIFERA

1389 - 1401.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, MOLDIC
GRAIN TYPE: BIOGENIC, INTRACLASTS, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BRECCIATED, MOTTLED, BIOTURBATED
ACCESSORY MINERALS: DOLOMITE-20%, PLANT REMAINS-05%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS
HEAVILY BRECCIATED, CALCARENITE AND DOLOMITE CLASTS
MULTIPLE FAULTS AND FRACTURES; CONVOLUTED DOLOMITE AND
ORGANIC LAMINATIONS.

1401.5- 1404 CALCARENITE; VERY LIGHT ORANGE
05% POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, INTERBEDDED
ACCESSORY MINERALS: DOLOMITE-05%, PLANT REMAINS-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS

1404 - 1406 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT GRAY
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE, INTRACLASTS
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BRECCIATED, MOTTLED, INTERBEDDED
ACCESSORY MINERALS: DOLOMITE-20%, PLANT REMAINS-10%
OTHER FEATURES: DOLOMITIC
FOSSILS: PLANT REMAINS, ORGANICS
HEAVILY BRECCIATED LARGE CALCARENITE CLASTS; FRACTURED OFFSET BEDS.

1406 - 1415.5 CALCARENITE; YELLOWISH GRAY TO VERY LIGHT ORANGE
05% POROSITY: INTERGRANULAR, PIN POINT VUGS
LOW PERMEABILITY
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: INTERBEDDED, MASSIVE
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-10%
SPAR-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: BENTHIC FORAMINIFERA, ECHINOID, ORGANICS
SUB-VERTICAL FRACTURES, WHITE CHALKY CALCAREOUS FORAM TESTS.

1415.5- 1418.5 CALCARENITE; YELLOWISH GRAY
20% POROSITY: INTERGRANULAR, MOLDIC, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: BRECCIATED, MASSIVE
ACCESSORY MINERALS: DOLOMITE-10%
OTHER FEATURES: DOLOMITIC, SPLINTERY, SPECKLED
FOSSILS: BENTHIC FORAMINIFERA, FOSSIL MOLDS

1418.5- 1421 CALCARENITE; YELLOWISH GRAY TO PINKISH GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX
SEDIMENTARY STRUCTURES: MASSIVE, BRECCIATED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-01%
OTHER FEATURES: DOLOMITIC, SPECKLED
FOSSILS: BENTHIC FORAMINIFERA

1421 - 1431 CALCARENITE; YELLOWISH GRAY TO LIGHT GRAY
10% POROSITY: INTERGRANULAR, PIN POINT VUGS, FRACTURE
GRAIN TYPE: BIOGENIC, CALCILUTITE, INTRACLASTS
GOOD INDURATION
CEMENT TYPE(S): CALCILUTITE MATRIX, DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: BRECCIATED, MASSIVE, INTERBEDDED
ACCESSORY MINERALS: DOLOMITE-10%, PLANT REMAINS-01%
OTHER FEATURES: DOLOMITIC
FOSSILS: BENTHIC FORAMINIFERA

ORGANIC LAMINAE; HEAVILY BRECCIATED, ANGULAR LIMESTONE CLASTS, FRACTURES.

1431 - 1439 DOLOSTONE; MODERATE GRAY TO BROWNISH GRAY
30% POROSITY: VUGULAR, MOLDIC, POSSIBLY HIGH PERMEABILITY
50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE, BRECCIATED
ACCESSORY MINERALS: LIMESTONE-02%
OTHER FEATURES: SUCROSIC, HIGH RECRYSTALLIZATION
DISSOLVED CALCARENITE CLASTS PRODUCED LARGE MOLDS LINED WITH DOLOMITE CRYSTALS; HIGH PERMIABILITY. CORE TD COREHOLE #3; CUTTINGS DESCRIBED 1439'-1480'.

1439 - 1450 DOLOSTONE; GRAYISH BROWN TO DARK YELLOWISH BROWN
POROSITY: INTERCRYSTALLINE, FRACTURE
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
OTHER FEATURES: SPLINTERY, CRYSTALLINE, SUCROSIC
FOSSILS: NO FOSSILS, ORGANICS

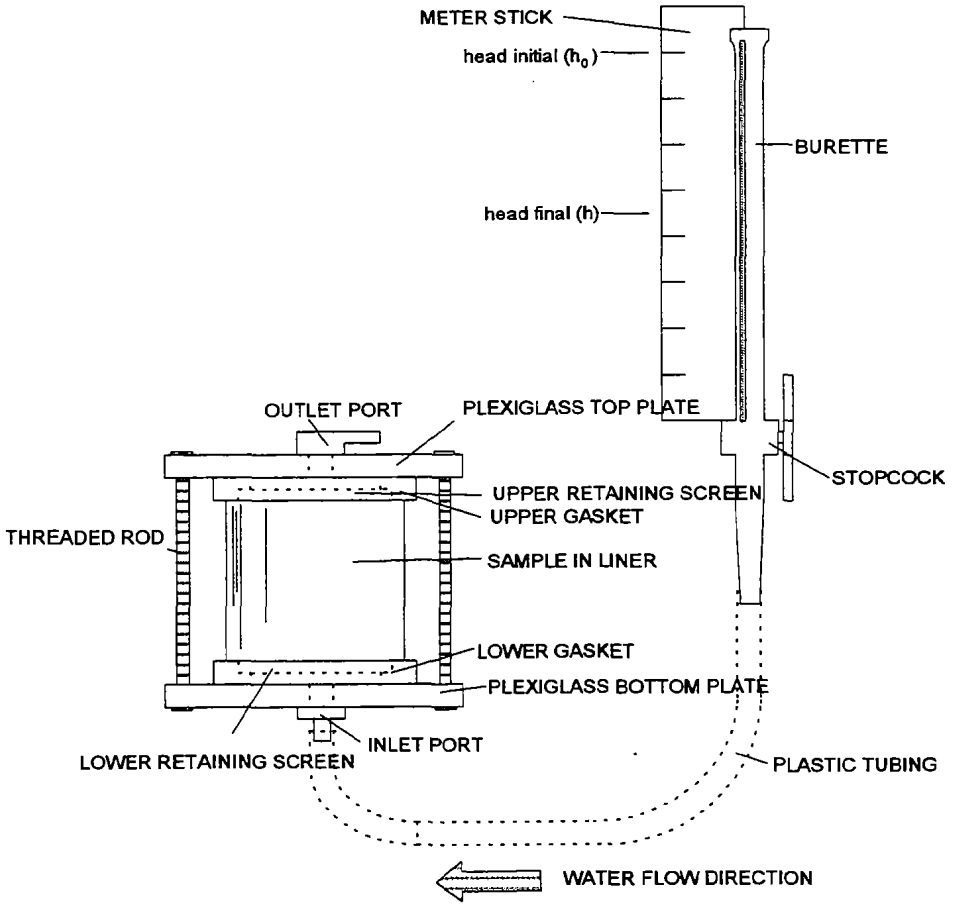
1450 - 1460 DOLOSTONE; GRAYISH BROWN TO LIGHT GRAYISH BROWN
POROSITY: INTERCRYSTALLINE, FRACTURE
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
OTHER FEATURES: SPLINTERY, SUCROSIC
FOSSILS: NO FOSSILS

1460 - 1470 DOLOSTONE; GRAYISH BROWN
POROSITY: INTERCRYSTALLINE, FRACTURE
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
OTHER FEATURES: SPLINTERY, SUCROSIC
FOSSILS: NO FOSSILS

1470 - 1480 DOLOSTONE; GRAYISH BROWN TO DARK YELLOWISH BROWN
POROSITY: INTERCRYSTALLINE, FRACTURE
POSSIBLY HIGH PERMEABILITY; 50-90% ALTERED; SUBHEDRAL
GOOD INDURATION
CEMENT TYPE(S): DOLOMITE CEMENT
SEDIMENTARY STRUCTURES: MASSIVE
OTHER FEATURES: SPLINTERY, SUCROSIC
FOSSILS: NO FOSSILS
T.D. ADDITIONAL EXPLORATORY DRILLING

1480 TOTAL DEPTH

Appendix B



Falling head permeameter analyses were conducted by the Florida Geologic Survey. Ten samples were retained and analyses were completed via FGS protocol. Samples were visually inspected for overall integrity. Molds and fracture features that occurred at the ends of the sample were removed. These features were determined to impact the vertical hydraulic conductivity results obtained from the testing procedure.

Once the ends of the sample were trimmed, a paraffin wax coating was applied to each end. The c ore samples are then place d into a 3-inch diameter piece of plastic tubing. Clear modeling epoxy is then poured into the plastic tubing. The epoxy was allowed to harden for approximately 24-hours, and the was coating removed. The samples were then placed in the permeameter for analysis. Three runs per sample were then conducted. The hydraulic conductivity was calculated based on the following equation.

$$K = aL/At \ln (h_0/h_1)$$ [Todd, 1959]

where;

- k= conductivity (ft/sec)
- a= diameter of standpipe
- L= length of specimen
- A= area of specimen
- t= t_1-t_0= elapsed time (seconds)
- h_0= initial head (feet)
- h_1= final head (feet)

The final permeability listed is the average of three runs. The value is considered a minimum conductivity, due to the possible invasion of the epoxy resin into the sample.

Appendix C

ROMP 20 OSPREY PROCEDURES FOR OFF-BOTTOM PACKER TESTING

EXPLORATORY TEST WELL: 6 in. dia. pvc casing, L.S. - 500 ft. BLS
6 in. dia borehole, 500 ft. - T.D. of test zone

(test well annulus flowing ~ 50 gpm, monitored with orifice-manometer tube)

PACKER ASSEMBLY: TAM International, single element, water inflate packer

Rest diameter: 4.75 in.
Max. Inflation: 8.0 in.
Inflation pressure: 600 psi

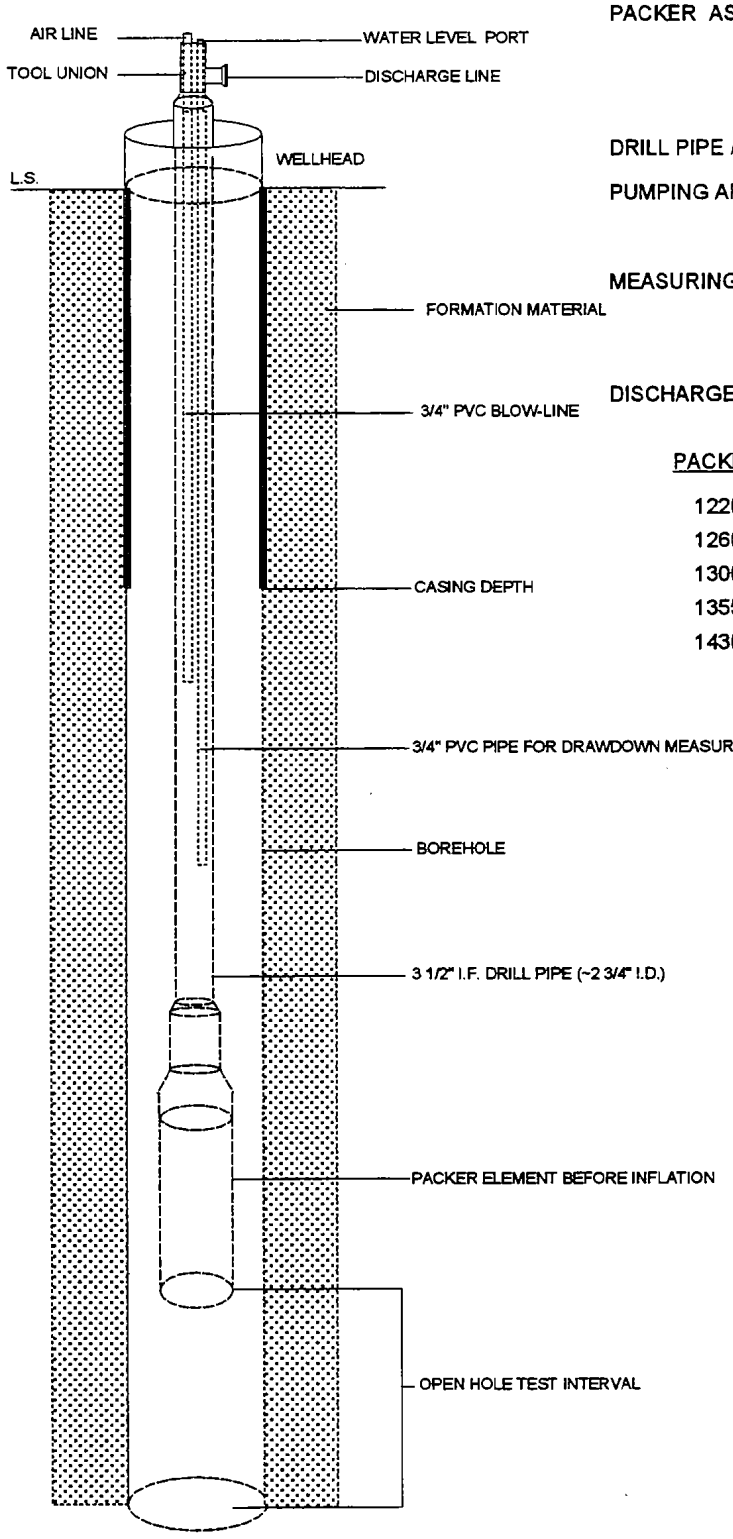
DRILL PIPE ASSEMBLY: 3 ½ I.F. tubing, 2.75 in. nominal I.D.

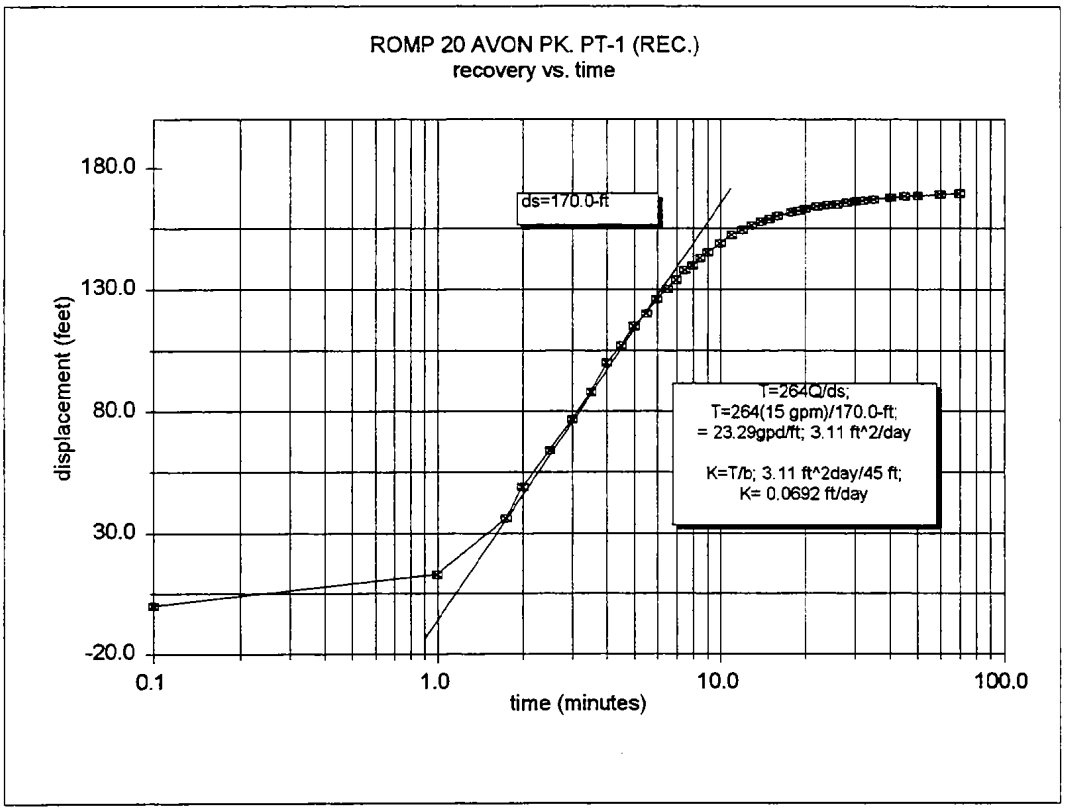
PUMPING APPARATUS: Airlift pumping using rig air compressor at constant engine speed of 1300 rpm, delivered 260 ft. below top of drill tubing tool union through 0.75 in. pvc blowline.

MEASURING APPARATUS: Drawdown and recovery test-zone water levels are measured with an electric measuring tape through 0.75 in. pvc tubing extending 320 ft. below top of drill tubing tool union, ~ 9.2 ft. above land surface M..P.

DISCHARGE MEASUREMENT: 5 gal. and 55 gal. timed-discharge volumes

PACKER INTERVAL	DISCHARGE	DRAWDOWN
1220 ft. - 1305 ft.	20 gpm	152 ft.
1260 ft. - 1305 ft.	15 gpm	171 ft.
1300 ft. - 1405 ft.	11 gpm	185 ft.
1355 ft. - 1405 ft.	2.1 gpm	234 ft.
1430 ft. - 1480 ft.	42 gpm	72 ft.





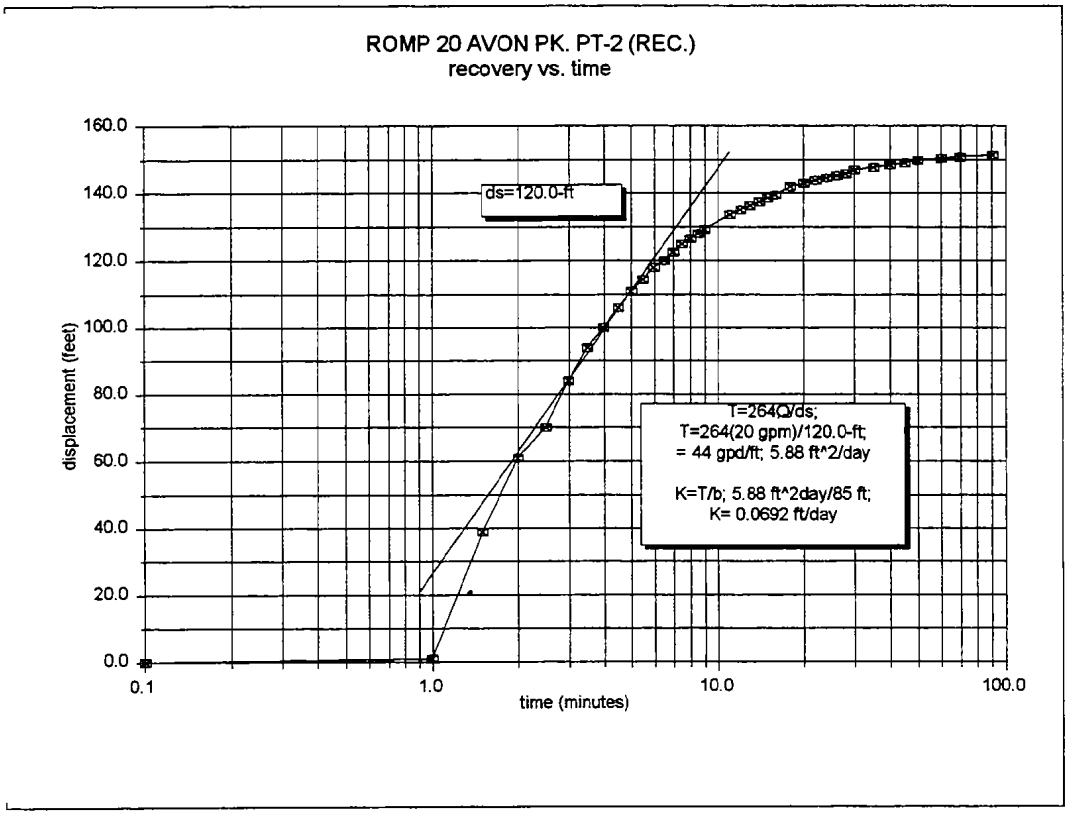
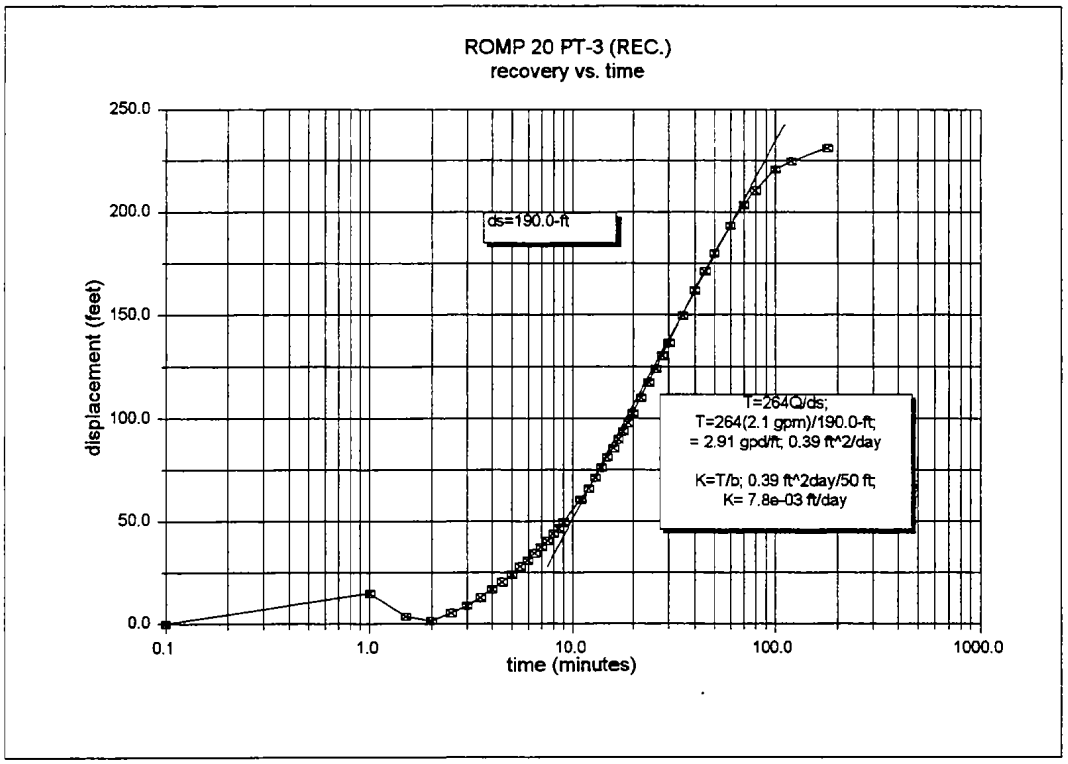


FIGURE 15.	ROMP 20 OSPREY
	RESULTS OF STRAIGHT LINE ANALYSIS
	PACKER TESTS NO. 1 AND 2



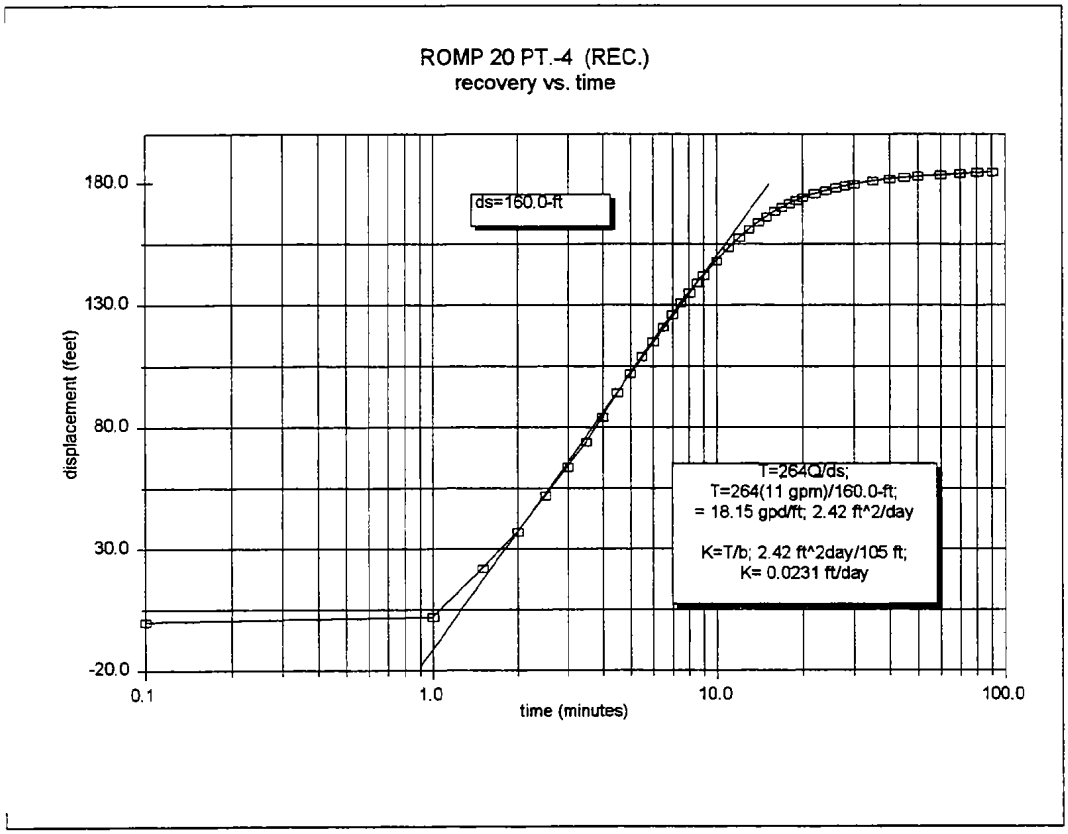
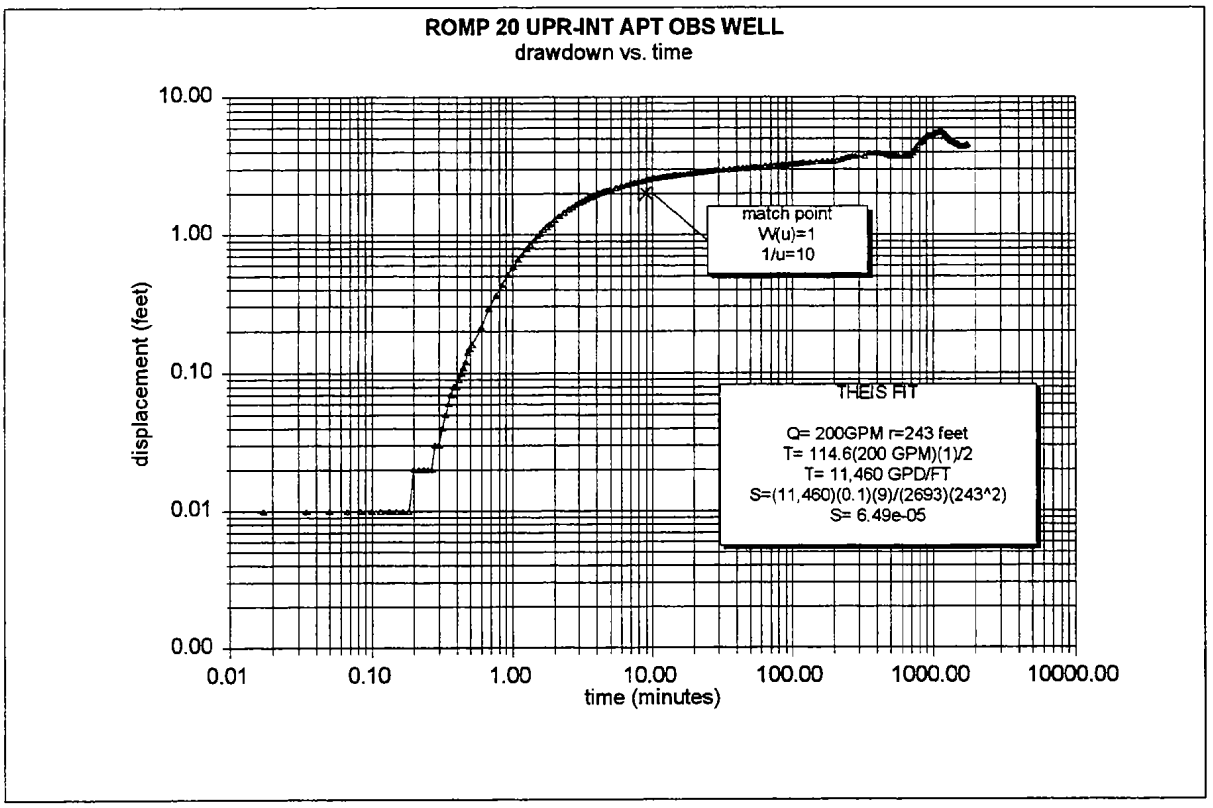


FIGURE 16.	ROMP 20 OSPREY
	RESULTS OF STRAIGHT LINE ANALYSIS
	PACKER TESTS NO. 3 AND 4

Appendix D



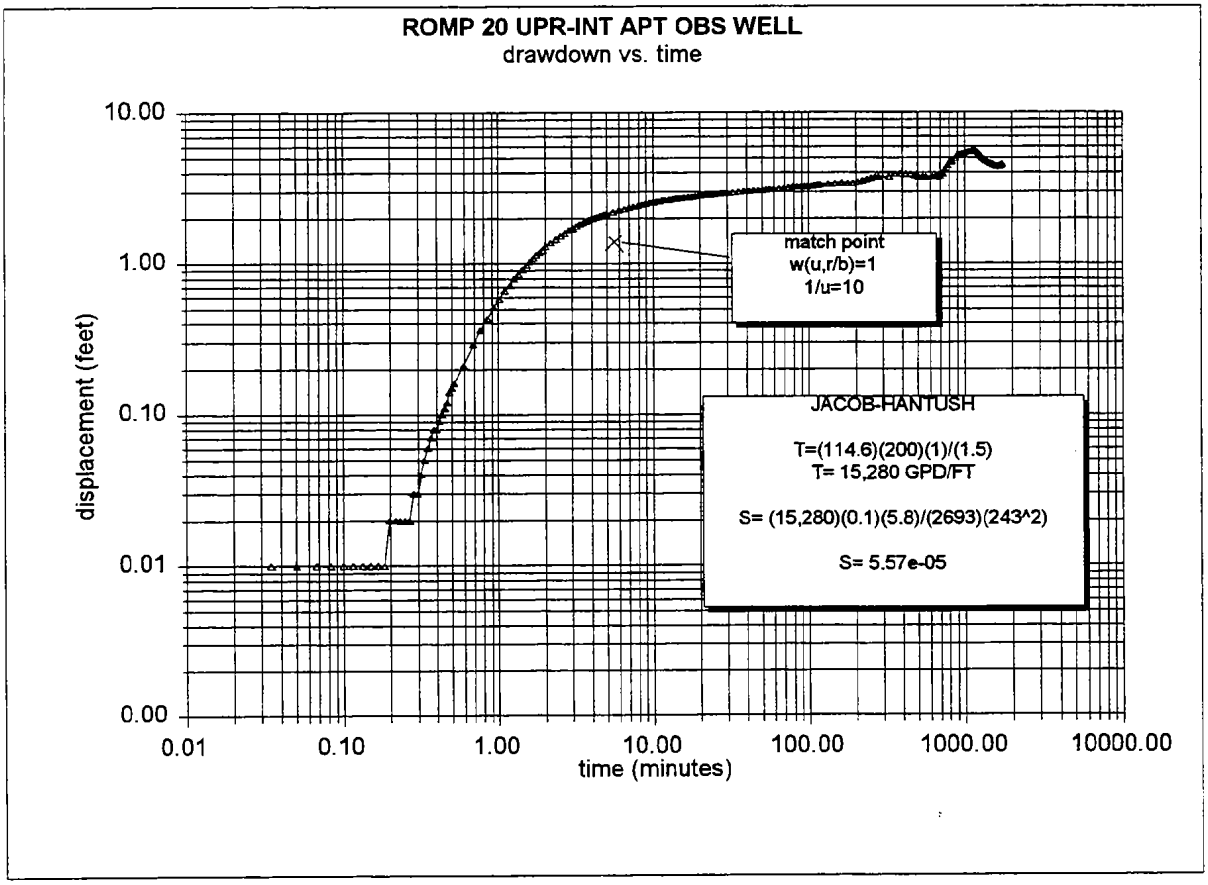


FIGURE 17.
THEIS, JACOB HANTUSH LOG-LOG PLOTS

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
15-Dec-92	01:29:59 PM	0.00000	0	61.6	0	28.95	26.44	7.87	20.18
15-Dec-92	01:30:00 PM	0.01728	5.3	56.3	0.01	28.94	26.44	7.87	20.18
15-Dec-92	01:30:01 PM	0.03456	2.2	59.4	0.01	28.95	26.44	7.87	20.18
15-Dec-92	01:30:02 PM	0.05040	4.2	57.4	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:03 PM	0.06768	5.9	55.7	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:04 PM	0.08352	7.6	54	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:05 PM	0.10080	9.2	52.4	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:06 PM	0.11664	10.6	51	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:07 PM	0.13392	11.9	49.7	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:08 PM	0.15120	13.3	48.3	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:09 PM	0.16704	14.5	47.1	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:10 PM	0.18432	15.8	45.8	0.01	28.94	26.43	7.87	20.18
15-Dec-92	01:30:11 PM	0.20016	17	44.6	0.02	28.93	26.43	7.87	20.18
15-Dec-92	01:30:12 PM	0.21744	18.1	43.5	0.02	28.93	26.43	7.87	20.18
15-Dec-92	01:30:13 PM	0.23328	19	42.6	0.02	28.93	26.43	7.87	20.18
15-Dec-92	01:30:14 PM	0.25056	20.1	41.5	0.02	28.93	26.43	7.87	20.18
15-Dec-92	01:30:15 PM	0.26784	21	40.6	0.02	28.93	26.43	7.87	20.18
15-Dec-92	01:30:16 PM	0.28368	21.9	39.7	0.03	28.92	26.43	7.87	20.18
15-Dec-92	01:30:17 PM	0.30096	22.6	39	0.03	28.92	26.43	7.87	20.18
15-Dec-92	01:30:18 PM	0.31680	23.1	38.5	0.04	28.91	26.43	7.87	20.18
15-Dec-92	01:30:19 PM	0.33408	23.6	38	0.05	28.9	26.43	7.87	20.18
15-Dec-92	01:30:20 PM	0.35136	24.1	37.5	0.06	28.89	26.43	7.87	20.18
15-Dec-92	01:30:21 PM	0.36720	24.5	37.1	0.07	28.88	26.43	7.87	20.18
15-Dec-92	01:30:22 PM	0.38448	25	36.6	0.08	28.87	26.43	7.87	20.18
15-Dec-92	01:30:23 PM	0.40032	25.4	36.2	0.08	28.87	26.43	7.87	20.18
15-Dec-92	01:30:24 PM	0.41760	25.8	35.8	0.09	28.86	26.43	7.87	20.18
15-Dec-92	01:30:25 PM	0.43344	26.3	35.3	0.1	28.85	26.43	7.87	20.18
15-Dec-92	01:30:26 PM	0.45072	26.8	34.8	0.11	28.84	26.43	7.87	20.18
15-Dec-92	01:30:27 PM	0.46800	27.1	34.5	0.12	28.83	26.43	7.87	20.18
15-Dec-92	01:30:28 PM	0.48384	27.6	34	0.14	28.81	26.43	7.87	20.18
15-Dec-92	01:30:29 PM	0.50112	27.9	33.7	0.15	28.8	26.43	7.88	20.18
15-Dec-92	01:30:30 PM	0.51696	28.3	33.3	0.16	28.79	26.43	7.88	20.18
15-Dec-92	01:30:35 PM	0.60048	30	31.6	0.21	28.74	26.44	7.88	20.18
15-Dec-92	01:30:40 PM	0.68400	31.7	29.9	0.29	28.66	26.44	7.88	20.18
15-Dec-92	01:30:45 PM	0.76752	33.1	28.5	0.36	28.59	26.44	7.88	20.18
15-Dec-92	01:30:50 PM	0.85104	34.3	27.3	0.43	28.52	26.44	7.89	20.18
15-Dec-92	01:30:55 PM	0.93456	35.4	26.2	0.51	28.44	26.44	7.89	20.18
15-Dec-92	01:31:00 PM	1.01664	36.2	25.4	0.58	28.37	26.44	7.89	20.18
15-Dec-92	01:31:05 PM	1.10016	37.1	24.5	0.66	28.29	26.44	7.89	20.18
15-Dec-92	01:31:10 PM	1.18368	37.8	23.8	0.72	28.23	26.44	7.89	20.18
15-Dec-92	01:31:15 PM	1.26720	38.4	23.2	0.79	28.16	26.44	7.89	20.18
15-Dec-92	01:31:20 PM	1.35072	38.9	22.7	0.85	28.1	26.44	7.89	20.18

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
15-Dec-92	01:31:25 PM	1.43424	39.5	22.1	0.91	28.04	26.45	7.89	20.19
15-Dec-92	01:31:30 PM	1.51776	40	21.6	0.98	27.97	26.45	7.89	20.19
15-Dec-92	01:31:35 PM	1.60128	40.4	21.2	1.03	27.92	26.45	7.89	20.19
15-Dec-92	01:31:40 PM	1.68336	40.9	20.7	1.09	27.86	26.45	7.89	20.18
15-Dec-92	01:31:45 PM	1.76688	41.2	20.4	1.14	27.81	26.45	7.89	20.18
15-Dec-92	01:31:50 PM	1.85040	41.5	20.1	1.19	27.76	26.45	7.89	20.18
15-Dec-92	01:31:55 PM	1.93392	41.8	19.8	1.23	27.72	26.45	7.89	20.18
15-Dec-92	01:32:00 PM	2.01744	42.1	19.5	1.29	27.66	26.45	7.89	20.18
15-Dec-92	01:32:10 PM	2.18448	42.7	18.9	1.37	27.58	26.45	7.89	20.18
15-Dec-92	01:32:20 PM	2.35008	43.2	18.4	1.45	27.5	26.45	7.89	20.18
15-Dec-92	01:32:30 PM	2.51712	43.6	18	1.53	27.42	26.45	7.89	20.18
15-Dec-92	01:32:40 PM	2.68416	43.8	17.8	1.59	27.36	26.45	7.89	20.18
15-Dec-92	01:32:50 PM	2.85120	44	17.6	1.66	27.29	26.45	7.9	20.19
15-Dec-92	01:33:00 PM	3.01680	44.2	17.4	1.71	27.24	26.45	7.89	20.18
15-Dec-92	01:33:10 PM	3.18384	44.4	17.2	1.76	27.19	26.45	7.89	20.18
15-Dec-92	01:33:20 PM	3.35088	44.5	17.1	1.81	27.14	26.45	7.89	20.18
15-Dec-92	01:33:30 PM	3.51792	44.6	17	1.86	27.09	26.45	7.89	20.18
15-Dec-92	01:33:40 PM	3.68352	44.7	16.9	1.89	27.06	26.45	7.89	20.18
15-Dec-92	01:33:50 PM	3.85056	44.8	16.8	1.94	27.01	26.45	7.89	20.18
15-Dec-92	01:34:00 PM	4.01760	44.9	16.7	1.97	26.98	26.45	7.89	20.18
15-Dec-92	01:34:10 PM	4.18464	44.9	16.7	2	26.95	26.45	7.89	20.19
15-Dec-92	01:34:20 PM	4.35024	45	16.6	2.03	26.92	26.45	7.89	20.18
15-Dec-92	01:34:30 PM	4.51728	45.1	16.5	2.06	26.89	26.45	7.89	20.18
15-Dec-92	01:34:40 PM	4.68432	45.2	16.4	2.08	26.87	26.45	7.89	20.18
15-Dec-92	01:34:50 PM	4.84992	45.2	16.4	2.11	26.84	26.45	7.89	20.18
15-Dec-92	01:35:00 PM	5.01696	45.3	16.3	2.13	26.82	26.45	7.89	20.18
15-Dec-92	01:35:30 PM	5.51664	45.5	16.1	2.2	26.75	26.45	7.89	20.18
15-Dec-92	01:36:00 PM	6.01776	45.9	15.7	2.25	26.7	26.45	7.89	20.18
15-Dec-92	01:36:30 PM	6.51744	46.1	15.5	2.3	26.65	26.45	7.89	20.18
15-Dec-92	01:37:00 PM	7.01712	46.2	15.4	2.35	26.6	26.45	7.89	20.18
15-Dec-92	01:37:30 PM	7.51680	46.3	15.3	2.39	26.56	26.45	7.89	20.18
15-Dec-92	01:38:00 PM	8.01792	46.5	15.1	2.43	26.52	26.45	7.89	20.18
15-Dec-92	01:38:30 PM	8.51760	46.8	14.8	2.46	26.49	26.45	7.89	20.19
15-Dec-92	01:39:00 PM	9.01728	46.9	14.7	2.5	26.45	26.45	7.88	20.19
15-Dec-92	01:39:30 PM	9.51696	46.9	14.7	2.52	26.43	26.45	7.88	20.19
15-Dec-92	01:40:00 PM	10.01664	47	14.6	2.55	26.4	26.45	7.88	20.18
15-Dec-92	01:40:30 PM	10.51776	47	14.6	2.58	26.37	26.45	7.88	20.18
15-Dec-92	01:41:00 PM	11.01744	47	14.6	2.6	26.35	26.44	7.88	20.18
15-Dec-92	01:41:30 PM	11.51712	47.1	14.5	2.62	26.33	26.44	7.88	20.19
15-Dec-92	01:42:00 PM	12.01680	47.1	14.5	2.64	26.31	26.44	7.88	20.19
15-Dec-92	01:42:30 PM	12.51792	47.1	14.5	2.65	26.3	26.45	7.88	20.18
15-Dec-92	01:43:00 PM	13.01760	47.1	14.5	2.67	26.28	26.44	7.88	20.18

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
15-Dec-92	01:43:30 PM	13.51728	47.1	14.5	2.68	26.27	26.44	7.88	20.19
15-Dec-92	01:44:00 PM	14.01696	47.1	14.5	2.7	26.25	26.45	7.88	20.18
15-Dec-92	01:44:30 PM	14.51664	47	14.6	2.71	26.24	26.44	7.88	20.19
15-Dec-92	01:45:00 PM	15.01776	47	14.6	2.71	26.24	26.44	7.87	20.18
15-Dec-92	01:46:00 PM	16.01712	47.1	14.5	2.74	26.21	26.44	7.87	20.19
15-Dec-92	01:47:00 PM	17.01792	47.1	14.5	2.76	26.19	26.44	7.87	20.18
15-Dec-92	01:48:00 PM	18.01728	47.1	14.5	2.77	26.18	26.44	7.87	20.18
15-Dec-92	01:49:00 PM	19.01664	47.4	14.2	2.79	26.16	26.44	7.87	20.18
15-Dec-92	01:50:00 PM	20.01744	47.5	14.1	2.82	26.13	26.44	7.87	20.19
15-Dec-92	01:51:00 PM	21.01680	47.6	14	2.84	26.11	26.44	7.87	20.18
15-Dec-92	01:52:00 PM	22.01760	47.6	14	2.85	26.1	26.44	7.87	20.18
15-Dec-92	01:53:00 PM	23.01696	47.7	13.9	2.86	26.09	26.44	7.87	20.19
15-Dec-92	01:54:00 PM	24.01776	47.8	13.8	2.88	26.07	26.44	7.87	20.18
15-Dec-92	01:55:00 PM	25.01712	47.8	13.8	2.89	26.06	26.44	7.87	20.19
15-Dec-92	01:56:00 PM	26.01792	47.9	13.7	2.9	26.05	26.44	7.87	20.18
15-Dec-92	01:57:00 PM	27.01728	47.9	13.7	2.91	26.04	26.44	7.87	20.18
15-Dec-92	01:58:00 PM	28.01664	47.9	13.7	2.93	26.02	26.43	7.87	20.19
15-Dec-92	01:59:00 PM	29.01744	47.8	13.8	2.93	26.02	26.44	7.87	20.19
15-Dec-92	02:00:00 PM	30.01680	47.9	13.7	2.94	26.01	26.44	7.87	20.18
15-Dec-92	02:03:00 PM	33.01776	47.8	13.8	2.97	25.98	26.43	7.86	20.19
15-Dec-92	02:06:00 PM	36.01728	47.9	13.7	3	25.95	26.43	7.86	20.19
15-Dec-92	02:09:00 PM	39.01680	47.9	13.7	3.02	25.93	26.43	7.86	20.19
15-Dec-92	02:12:00 PM	42.01776	47.9	13.7	3.03	25.92	26.43	7.86	20.19
15-Dec-92	02:15:00 PM	45.01728	47.9	13.7	3.05	25.9	26.43	7.86	20.19
15-Dec-92	02:18:00 PM	48.01680	47.9	13.7	3.06	25.89	26.43	7.86	20.19
15-Dec-92	02:21:00 PM	51.01776	47.9	13.7	3.07	25.88	26.43	7.86	20.19
15-Dec-92	02:24:00 PM	54.01728	48	13.6	3.09	25.86	26.43	7.86	20.19
15-Dec-92	02:27:00 PM	57.01680	48	13.6	3.1	25.85	26.43	7.86	20.19
15-Dec-92	02:30:00 PM	60.01776	48	13.6	3.11	25.84	26.43	7.86	20.19
15-Dec-92	02:35:00 PM	65.01744	48.2	13.4	3.15	25.8	26.43	7.86	20.2
15-Dec-92	02:40:00 PM	70.01712	48.2	13.4	3.17	25.78	26.43	7.86	20.2
15-Dec-92	02:45:00 PM	75.01680	48.3	13.3	3.19	25.76	26.43	7.87	20.2
15-Dec-92	02:50:00 PM	80.01792	48.3	13.3	3.22	25.73	26.43	7.87	20.21
15-Dec-92	02:55:00 PM	85.01760	48.3	13.3	3.22	25.73	26.43	7.87	20.21
15-Dec-92	03:00:00 PM	90.01728	48.2	13.4	3.23	25.72	26.43	7.86	20.2
15-Dec-92	03:05:00 PM	95.01696	48.2	13.4	3.24	25.71	26.43	7.86	20.21
15-Dec-92	03:10:00 PM	100.01664	48.1	13.5	3.24	25.71	26.43	7.86	20.2
15-Dec-92	03:15:00 PM	105.01776	48.4	13.2	3.27	25.68	26.43	7.86	20.21
15-Dec-92	03:20:00 PM	110.01744	48.5	13.1	3.29	25.66	26.43	7.86	20.21
15-Dec-92	03:25:00 PM	115.01712	48.5	13.1	3.31	25.64	26.43	7.86	20.2
15-Dec-92	03:30:00 PM	120.01680	48.6	13	3.33	25.62	26.42	7.86	20.21
15-Dec-92	03:45:00 PM	135.01728	48.6	13	3.35	25.6	26.42	7.85	20.21

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
15-Dec-92	04:00:00 PM	150.01776	48.7	12.9	3.4	25.55	26.41	7.85	20.21
15-Dec-92	04:15:00 PM	165.01680	48.9	12.7	3.42	25.53	26.4	7.85	20.2
15-Dec-92	04:30:00 PM	180.01728	48.9	12.7	3.41	25.54	26.4	7.84	20.2
15-Dec-92	04:45:00 PM	195.01776	48.9	12.7	3.41	25.54	26.39	7.84	20.2
15-Dec-92	05:00:00 PM	210.01680	48.8	12.8	3.46	25.49	26.38	7.84	20.2
15-Dec-92	05:15:00 PM	225.01728	48.9	12.7	3.54	25.41	26.37	7.84	20.2
15-Dec-92	05:30:00 PM	240.01776	49	12.6	3.61	25.34	26.37	7.84	20.2
15-Dec-92	05:45:00 PM	255.01680	49	12.6	3.67	25.28	26.37	7.84	20.2
15-Dec-92	06:00:00 PM	270.01728	49.1	12.5	3.73	25.22	26.36	7.83	20.2
15-Dec-92	06:15:00 PM	285.01776	49.1	12.5	3.73	25.22	26.36	7.84	20.2
15-Dec-92	07:00:00 PM	330.01776	49.1	12.5	3.73	25.22	26.31	7.85	20.09
15-Dec-92	07:30:00 PM	360.01728	49.5	12.1	3.93	25.02	26.3	7.85	20.11
15-Dec-92	08:00:00 PM	390.01680	49.6	12	3.93	25.02	26.3	7.85	20.13
15-Dec-92	08:30:00 PM	420.01776	49	12.6	3.92	25.03	26.31	7.85	20.15
15-Dec-92	09:00:00 PM	450.01728	49	12.6	3.91	25.04	26.31	7.85	20.15
15-Dec-92	09:30:00 PM	480.01680	49.1	12.5	3.82	25.13	26.31	7.85	20.15
15-Dec-92	10:00:00 PM	510.01776	49	12.6	3.76	25.19	26.33	7.85	20.16
15-Dec-92	10:30:00 PM	540.01728	49	12.6	3.74	25.21	26.29	7.86	20.15
15-Dec-92	11:00:00 PM	570.01680	48.9	12.7	3.73	25.22	26.31	7.87	20.15
16-Dec-92	12:00:00 AM	630.01680	48.9	12.7	3.73	25.22	26.28	7.88	20.16
16-Dec-92	12:30:00 AM	660.01680	49	12.6	3.76	25.19	26.28	7.88	20.17
16-Dec-92	01:00:00 AM	690.01680	49.1	12.5	3.78	25.17	26.3	7.89	20.16
16-Dec-92	01:30:00 AM	720.01680	49.3	12.3	3.93	25.02	26.26	7.89	20.16
16-Dec-92	02:00:00 AM	750.01680	49.4	12.2	4.19	24.76	26.25	7.89	20.15
16-Dec-92	02:30:00 AM	780.01680	49.7	11.9	4.47	24.48	26.25	7.9	20.16
16-Dec-92	03:00:00 AM	810.01680	49.9	11.7	4.71	24.24	26.26	7.91	20.17
16-Dec-92	03:30:00 AM	840.01680	50	11.6	4.75	24.2	26.23	7.9	20.16
16-Dec-92	04:00:00 AM	870.01680	50.2	11.4	4.97	23.98	26.23	7.9	20.17
16-Dec-92	04:30:00 AM	900.01680	50.4	11.2	5.16	23.79	26.22	7.91	20.17
16-Dec-92	05:00:00 AM	930.01680	50.5	11.1	5.25	23.7	26.2	7.9	20.17
16-Dec-92	05:30:00 AM	960.01680	50.6	11	5.32	23.63	26.19	7.9	20.17
16-Dec-92	06:00:00 AM	990.01680	50.6	11	5.34	23.61	26.19	7.91	20.18
16-Dec-92	06:30:00 AM	1020.01680	50.7	10.9	5.43	23.52	26.18	7.9	20.17
16-Dec-92	07:00:00 AM	1050.01680	50.8	10.8	5.52	23.43	26.18	7.91	20.18
16-Dec-92	07:30:00 AM	1080.01680	50.8	10.8	5.53	23.42	26.17	7.91	20.17
16-Dec-92	08:00:00 AM	1110.01680	50.8	10.8	5.57	23.38	26.16	7.91	20.17
16-Dec-92	08:30:00 AM	1140.01680	50.8	10.8	5.62	23.33	26.15	7.9	20.16
16-Dec-92	09:00:00 AM	1170.01680	50.8	10.8	5.6	23.35	26.15	7.91	20.16
16-Dec-92	09:30:00 AM	1200.01680	50.9	10.7	5.53	23.42	26.13	7.9	20.15
16-Dec-92	10:00:00 AM	1230.01680	50.8	10.8	5.38	23.57	26.13	7.9	20.15
16-Dec-92	10:30:00 AM	1260.01680	50.6	11	5.18	23.77	26.12	7.9	20.15
16-Dec-92	11:00:00 AM	1290.01680	50.5	11.1	5.05	23.9	26.13	7.9	20.15

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
16-Dec-92	11:30:00 AM	1320.01680	50.4	11.2	4.95	24	26.17	7.91	20.16
16-Dec-92	12:00:00 PM	1350.01680	50.2	11.4	4.85	24.1	26.17	7.89	20.17
16-Dec-92	12:30:00 PM	1380.01680	50.2	11.4	4.79	24.16	26.17	7.88	20.17
16-Dec-92	01:00:00 PM	1410.01680	50.1	11.5	4.72	24.23	26.17	7.88	20.17
16-Dec-92	01:30:00 PM	1440.01680	50.1	11.5	4.67	24.28	26.18	7.89	20.19
16-Dec-92	02:00:00 PM	1470.01680	49.9	11.7	4.6	24.35	26.18	7.89	20.2
16-Dec-92	02:30:00 PM	1500.01680	49.9	11.7	4.59	24.36	26.13	7.89	20.14
16-Dec-92	03:00:00 PM	1530.01680	49.8	11.8	4.53	24.42	26.13	7.89	20.17
16-Dec-92	03:30:00 PM	1560.01680	49.8	11.8	4.47	24.48	26.12	7.89	20.16
16-Dec-92	04:00:00 PM	1590.01680	49.7	11.9	4.41	24.54	26.11	7.89	20.17
16-Dec-92	04:30:00 PM	1620.01680	49.7	11.9	4.39	24.56	26.14	7.89	20.17
16-Dec-92	05:00:00 PM	1650.01680	49.8	11.8	4.41	24.54	26.14	7.87	20.18
16-Dec-92	05:30:00 PM	1680.01680	50	11.6	4.44	24.51	26.14	7.87	20.18
16-Dec-92	06:00:00 PM	1710.01680	50	11.6	4.46	24.49	26.08	7.88	20.14
16-Dec-92	06:30:00 PM	1740.01680	49.7	11.9	4.56	24.39	26.09	7.89	20.16
	RECOVERY								
16-Dec-92	07:00:00 PM	0.00000	0	11.8	0	24.36	26.13	7.88	20.18
16-Dec-92	07:14:59 PM	0.00000	0	11.8	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:00 PM	0.01584	1.5	13.3	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:01 PM	0.03312	1.3	13.1	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:02 PM	0.04896	3	14.8	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:03 PM	0.06624	4.5	16.3	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:04 PM	0.08352	6	17.8	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:05 PM	0.09936	7.5	19.3	0.08	24.28	26.13	7.88	20.19
16-Dec-92	07:15:06 PM	0.11664	9	20.8	0.08	24.28	26.13	7.88	20.19
16-Dec-92	07:15:07 PM	0.13248	10.4	22.2	0.08	24.28	26.13	7.88	20.19
16-Dec-92	07:15:08 PM	0.14976	11.7	23.5	0.08	24.28	26.13	7.88	20.19
16-Dec-92	07:15:09 PM	0.16704	13.1	24.9	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:10 PM	0.18288	14.4	26.2	0.08	24.28	26.13	7.88	20.18
16-Dec-92	07:15:11 PM	0.20016	15.6	27.4	0.08	24.28	26.13	7.88	20.19
16-Dec-92	07:15:12 PM	0.21600	16.9	28.7	0.07	24.29	26.14	7.88	20.19
16-Dec-92	07:15:13 PM	0.23328	18	29.8	0.07	24.29	26.14	7.88	20.19
16-Dec-92	07:15:14 PM	0.24912	19.1	30.9	0.07	24.29	26.14	7.88	20.19
16-Dec-92	07:15:15 PM	0.26640	20.2	32	0.07	24.29	26.13	7.88	20.18
16-Dec-92	07:15:16 PM	0.28368	21.2	33	0.07	24.29	26.14	7.88	20.19
16-Dec-92	07:15:17 PM	0.29952	22.3	34.1	0.07	24.29	26.13	7.88	20.19
16-Dec-92	07:15:18 PM	0.31680	23.3	35.1	0.07	24.29	26.14	7.88	20.18
16-Dec-92	07:15:19 PM	0.33264	24.2	36	0.07	24.29	26.13	7.88	20.18
16-Dec-92	07:15:20 PM	0.34992	25.1	36.9	0.06	24.3	26.14	7.88	20.18
16-Dec-92	07:15:21 PM	0.36576	26	37.8	0.06	24.3	26.14	7.88	20.19
16-Dec-92	07:15:22 PM	0.38304	26.7	38.5	0.05	24.31	26.14	7.88	20.19
16-Dec-92	07:15:23 PM	0.40032	27.5	39.3	0.05	24.31	26.14	7.88	20.19

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
16-Dec-92	07:15:24 PM	0.41616	28.2	40	0.05	24.31	26.14	7.87	20.19
16-Dec-92	07:15:25 PM	0.43344	28.9	40.7	0.04	24.32	26.14	7.87	20.19
16-Dec-92	07:15:26 PM	0.44928	29.6	41.4	0.04	24.32	26.14	7.87	20.19
16-Dec-92	07:15:27 PM	0.46656	30.2	42	0.04	24.32	26.13	7.87	20.18
16-Dec-92	07:15:28 PM	0.48240	30.9	42.7	0.03	24.33	26.14	7.87	20.19
16-Dec-92	07:15:29 PM	0.49968	31.5	43.3	0.02	24.34	26.13	7.87	20.19
16-Dec-92	07:15:30 PM	0.51696	32	43.8	0.01	24.35	26.14	7.87	20.19
16-Dec-92	07:15:35 PM	0.59904	34.7	46.5	0.03	24.39	26.14	7.87	20.19
16-Dec-92	07:15:40 PM	0.68256	36.8	48.6	0.09	24.45	26.14	7.87	20.19
16-Dec-92	07:15:45 PM	0.76608	38.5	50.3	0.15	24.51	26.14	7.87	20.19
16-Dec-92	07:15:50 PM	0.84960	39.9	51.7	0.22	24.58	26.13	7.86	20.18
16-Dec-92	07:15:55 PM	0.93312	41	52.8	0.31	24.67	26.13	7.86	20.18
16-Dec-92	07:16:00 PM	1.01664	41.9	53.7	0.4	24.76	26.13	7.86	20.18
16-Dec-92	07:16:05 PM	1.10016	42.6	54.4	0.48	24.84	26.13	7.86	20.18
16-Dec-92	07:16:10 PM	1.18368	43.2	55	0.58	24.94	26.13	7.85	20.18
16-Dec-92	07:16:15 PM	1.26576	43.7	55.5	0.67	25.03	26.13	7.85	20.18
16-Dec-92	07:16:20 PM	1.34928	44	55.8	0.76	25.12	26.12	7.85	20.18
16-Dec-92	07:16:25 PM	1.43280	44.3	56.1	0.85	25.21	26.12	7.85	20.18
16-Dec-92	07:16:30 PM	1.51632	44.6	56.4	0.93	25.29	26.12	7.85	20.18
16-Dec-92	07:16:35 PM	1.59984	44.8	56.6	1.02	25.38	26.12	7.85	20.18
16-Dec-92	07:16:40 PM	1.68336	45	56.8	1.1	25.46	26.12	7.85	20.18
16-Dec-92	07:16:45 PM	1.76688	45.2	57	1.18	25.54	26.12	7.85	20.18
16-Dec-92	07:16:50 PM	1.84896	45.3	57.1	1.24	25.6	26.12	7.85	20.18
16-Dec-92	07:16:55 PM	1.93248	45.4	57.2	1.31	25.67	26.12	7.85	20.18
16-Dec-92	07:17:00 PM	2.01600	45.5	57.3	1.37	25.73	26.12	7.85	20.18
16-Dec-92	07:17:10 PM	2.18304	45.8	57.6	1.49	25.85	26.12	7.85	20.18
16-Dec-92	07:17:20 PM	2.35008	45.9	57.7	1.58	25.94	26.12	7.85	20.18
16-Dec-92	07:17:30 PM	2.51568	46	57.8	1.67	26.03	26.12	7.85	20.18
16-Dec-92	07:17:40 PM	2.68272	46.2	58	1.75	26.11	26.12	7.85	20.18
16-Dec-92	07:17:50 PM	2.84976	46.3	58.1	1.81	26.17	26.11	7.85	20.18
16-Dec-92	07:18:00 PM	3.01680	46.4	58.2	1.87	26.23	26.11	7.85	20.18
16-Dec-92	07:18:10 PM	3.18240	46.4	58.2	1.92	26.28	26.12	7.85	20.18
16-Dec-92	07:18:20 PM	3.34944	46.6	58.4	1.96	26.32	26.12	7.85	20.18
16-Dec-92	07:18:30 PM	3.51648	46.6	58.4	2.01	26.37	26.12	7.85	20.18
16-Dec-92	07:18:40 PM	3.68352	46.7	58.5	2.05	26.41	26.12	7.85	20.19
16-Dec-92	07:18:50 PM	3.84912	46.7	58.5	2.07	26.43	26.12	7.85	20.18
16-Dec-92	07:19:00 PM	4.01616	46.8	58.6	2.11	26.47	26.12	7.85	20.18
16-Dec-92	07:19:10 PM	4.18320	46.8	58.6	2.14	26.5	26.12	7.85	20.18
16-Dec-92	07:19:20 PM	4.35024	46.8	58.6	2.16	26.52	26.12	7.85	20.18
16-Dec-92	07:19:30 PM	4.51584	46.9	58.7	2.19	26.55	26.12	7.85	20.18
16-Dec-92	07:19:40 PM	4.68288	47	58.8	2.21	26.57	26.12	7.85	20.18
16-Dec-92	07:19:50 PM	4.84992	47	58.8	2.24	26.6	26.12	7.86	20.19

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
16-Dec-92	07:20:00 PM	5.01696	47	58.8	2.26	26.62	26.12	7.86	20.19
16-Dec-92	07:20:30 PM	5.51664	47.1	58.9	2.31	26.67	26.12	7.86	20.18
16-Dec-92	07:21:00 PM	6.01632	47.2	59	2.36	26.72	26.12	7.86	20.18
16-Dec-92	07:21:30 PM	6.51600	47.3	59.1	2.4	26.76	26.12	7.86	20.18
16-Dec-92	07:22:00 PM	7.01568	47.3	59.1	2.44	26.8	26.12	7.86	20.19
16-Dec-92	07:22:30 PM	7.51680	47.3	59.1	2.47	26.83	26.12	7.86	20.19
16-Dec-92	07:23:00 PM	8.01648	47.4	59.2	2.51	26.87	26.13	7.86	20.19
16-Dec-92	07:23:30 PM	8.51616	47.4	59.2	2.53	26.89	26.13	7.86	20.19
16-Dec-92	07:24:00 PM	9.01584	47.4	59.2	2.56	26.92	26.12	7.86	20.19
16-Dec-92	07:24:30 PM	9.51696	47.5	59.3	2.58	26.94	26.13	7.87	20.19
16-Dec-92	07:25:00 PM	10.01664	47.5	59.3	2.59	26.95	26.12	7.87	20.19
16-Dec-92	07:25:30 PM	10.51632	47.5	59.3	2.61	26.97	26.13	7.87	20.19
16-Dec-92	07:26:00 PM	11.01600	47.5	59.3	2.63	26.99	26.13	7.87	20.19
16-Dec-92	07:26:30 PM	11.51568	47.5	59.3	2.64	27	26.13	7.87	20.19
16-Dec-92	07:27:00 PM	12.01680	47.6	59.4	2.65	27.01	26.13	7.87	20.19
16-Dec-92	07:27:30 PM	12.51648	47.6	59.4	2.66	27.02	26.13	7.87	20.19
16-Dec-92	07:28:00 PM	13.01616	47.6	59.4	2.67	27.03	26.13	7.87	20.19
16-Dec-92	07:28:30 PM	13.51584	47.6	59.4	2.69	27.05	26.13	7.87	20.19
16-Dec-92	07:29:00 PM	14.01696	47.7	59.5	2.7	27.06	26.13	7.87	20.19
16-Dec-92	07:29:30 PM	14.51664	47.7	59.5	2.71	27.07	26.13	7.87	20.2
16-Dec-92	07:30:00 PM	15.01632	47.7	59.5	2.72	27.08	26.13	7.87	20.19
16-Dec-92	07:31:00 PM	16.01568	47.7	59.5	2.74	27.1	26.13	7.87	20.19
16-Dec-92	07:32:00 PM	17.01648	47.7	59.5	2.76	27.12	26.13	7.87	20.19
16-Dec-92	07:33:00 PM	18.01584	47.7	59.5	2.78	27.14	26.13	7.87	20.19
16-Dec-92	07:34:00 PM	19.01664	47.7	59.5	2.79	27.15	26.13	7.87	20.19
16-Dec-92	07:35:00 PM	20.01600	47.8	59.6	2.81	27.17	26.13	7.87	20.19
16-Dec-92	07:36:00 PM	21.01680	47.8	59.6	2.83	27.19	26.13	7.87	20.19
16-Dec-92	07:37:00 PM	22.01616	47.8	59.6	2.84	27.2	26.14	7.87	20.19
16-Dec-92	07:38:00 PM	23.01696	47.8	59.6	2.85	27.21	26.14	7.88	20.2
16-Dec-92	07:39:00 PM	24.01632	47.8	59.6	2.87	27.23	26.14	7.88	20.2
16-Dec-92	07:40:00 PM	25.01568	47.8	59.6	2.88	27.24	26.14	7.88	20.19
16-Dec-92	07:41:00 PM	26.01648	47.8	59.6	2.9	27.26	26.14	7.88	20.19
16-Dec-92	07:42:00 PM	27.01584	47.9	59.7	2.91	27.27	26.14	7.88	20.2
16-Dec-92	07:43:00 PM	28.01664	47.9	59.7	2.92	27.28	26.14	7.88	20.2
16-Dec-92	07:44:00 PM	29.01600	47.9	59.7	2.93	27.29	26.14	7.88	20.2
16-Dec-92	07:45:00 PM	30.01680	47.9	59.7	2.93	27.29	26.14	7.88	20.19
16-Dec-92	07:48:00 PM	33.01632	47.9	59.7	2.96	27.32	26.14	7.88	20.19
16-Dec-92	07:51:00 PM	36.01584	47.9	59.7	2.98	27.34	26.14	7.88	20.2
16-Dec-92	07:54:00 PM	39.01680	47.9	59.7	2.99	27.35	26.14	7.88	20.2
16-Dec-92	07:57:00 PM	42.01632	47.9	59.7	3.02	27.38	26.15	7.88	20.2
16-Dec-92	08:00:00 PM	45.01584	48	59.8	3.04	27.4	26.15	7.88	20.2
16-Dec-92	08:03:00 PM	48.01680	48.1	59.9	3.08	27.44	26.15	7.88	20.2

12-15/17-92: ROMP 20 OSPREY, UPPER INTERMEDIATE APT

PRODUCTION WELL: CASING; 75 FT. OF 8 IN. DIA. PVC, 7.625 ID.
OPEN HOLE; 75 FT. TO 125 FT., 7.5 IN. DIA.
PUMP; 6 IN. SUB. WITH 80 FT. OF 3 IN. COLUMN,
DISCHARGE RATE, 200 GPM.

OBSERVATION WELL: CASING; 75 FT. OF 2 IN. DIA. PVC, 2 IN. ID.
OPEN HOLE; 2 IN. DIA. PVC SCREEN, 75 FT. TO 125 FT.
DISTANCE; 243 FT. WEST OF PRODUCTION WELL

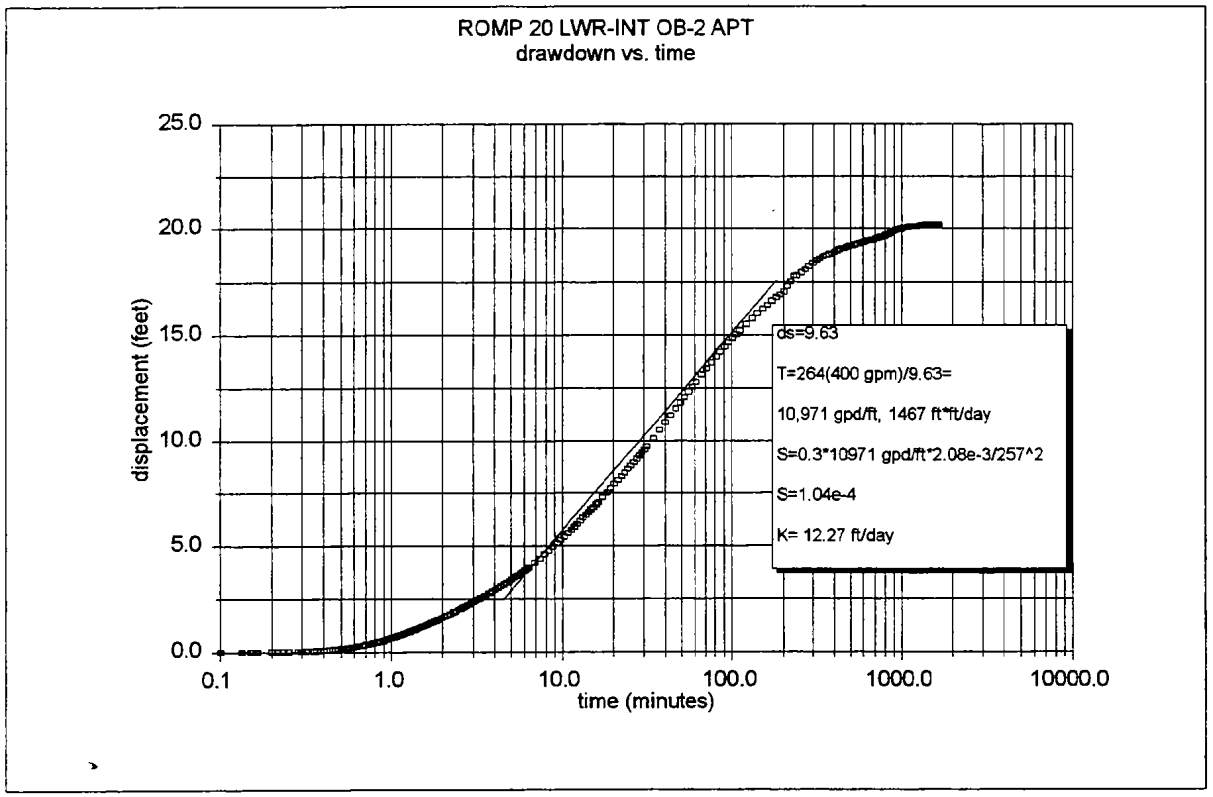
OBSERVATION WELLS: TAMPA\LOWER INTERMEDIATE AQUIFER,
OPEN HOLE; 250 FT. TO 370 FT.
DISTANCE; 18 FT.

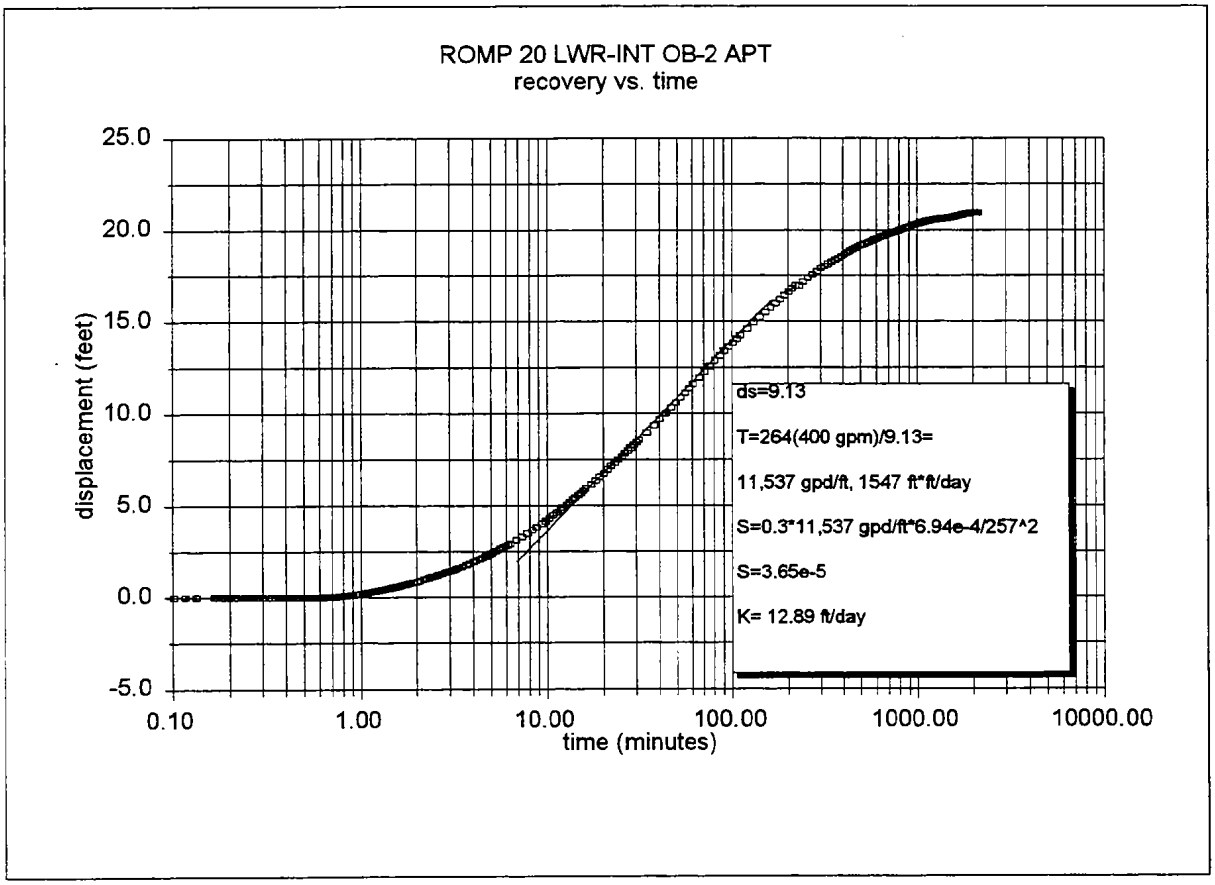
SURFICIAL AQUIFER,
SCREEN INTERVAL; 12 FT. TO 32 FT.
DISTANCE; 23 FT.

SUWANNEE\FLORIDAN AQUIFER

			PRODUCTION WELL		OBSERVATION WELL		LOWER INT	SURFICIAL	FLORIDAN
DATE	TIME		DRAWDOWN	CHANNEL 1	DRAWDOWN	CHANNEL 2	CHANNEL 3	CHANNEL 4	CHANNEL 5
16-Dec-92	08:06:00 PM	51.01632	48.1	59.9	3.1	27.46	26.15	7.88	20.2
16-Dec-92	08:09:00 PM	54.01584	48.1	59.9	3.1	27.46	26.15	7.88	20.2
16-Dec-92	08:12:00 PM	57.01680	48.1	59.9	3.15	27.51	26.15	7.88	20.2
16-Dec-92	08:15:00 PM	60.01632	48.1	59.9	3.17	27.53	26.15	7.88	20.2
16-Dec-92	08:20:00 PM	65.01600	48.2	60	3.2	27.56	26.15	7.88	20.2
16-Dec-92	08:25:00 PM	70.01568	48.2	60	3.25	27.61	26.16	7.88	20.21
16-Dec-92	08:30:00 PM	75.01680	48.2	60	3.29	27.65	26.16	7.88	20.2
16-Dec-92	08:35:00 PM	80.01648	48.3	60.1	3.32	27.68	26.16	7.88	20.21
16-Dec-92	08:40:00 PM	85.01616	48.3	60.1	3.34	27.7	26.16	7.88	20.21
16-Dec-92	08:45:00 PM	90.01584	48.3	60.1	3.36	27.72	26.16	7.88	20.21
16-Dec-92	08:50:00 PM	95.01696	48.3	60.1	3.38	27.74	26.17	7.88	20.21
16-Dec-92	08:55:00 PM	100.01664	48.3	60.1	3.39	27.75	26.17	7.88	20.21
16-Dec-92	09:00:00 PM	105.01632	48.3	60.1	3.41	27.77	26.17	7.88	20.21
16-Dec-92	09:05:00 PM	110.01600	48.3	60.1	3.42	27.78	26.17	7.88	20.21
16-Dec-92	09:10:00 PM	115.01568	48.3	60.1	3.42	27.78	26.17	7.88	20.21
16-Dec-92	09:15:00 PM	120.01680	48.3	60.1	3.42	27.78	26.17	7.87	20.21
16-Dec-92	09:30:00 PM	135.01584	48.3	60.1	3.43	27.79	26.18	7.87	20.22
16-Dec-92	09:45:00 PM	150.01632	48.4	60.2	3.48	27.84	26.18	7.88	20.22
16-Dec-92	10:00:00 PM	165.01680	48.5	60.3	3.52	27.88	26.18	7.88	20.22
16-Dec-92	10:15:00 PM	180.01584	48.5	60.3	3.56	27.92	26.18	7.88	20.22
16-Dec-92	10:30:00 PM	195.01632	48.5	60.3	3.6	27.96	26.19	7.88	20.22
16-Dec-92	10:45:00 PM	210.01680	48.5	60.3	3.63	27.99	26.19	7.88	20.22
16-Dec-92	11:00:00 PM	225.01584	48.5	60.3	3.6	27.96	26.18	7.87	20.22
16-Dec-92	11:15:00 PM	240.01632	48.5	60.3	3.61	27.97	26.19	7.88	20.22
16-Dec-92	11:30:00 PM	255.01680	48.5	60.3	3.61	27.97	26.2	7.88	20.22
16-Dec-92	11:45:00 PM	270.01584	48.5	60.3	3.58	27.94	26.2	7.88	20.22
17-Dec-92	12:00:00 PM	285.01618	48.5	60.3	3.58	27.94	26.2	7.88	20.23
17-Dec-92	07:30:00 AM		49.3	61.1	4.3	28.66	26.2	7.92	20.2
17-Dec-92	09:00:00 AM		49	60.8	4.5	28.86			

Appendix E





u= 1.87r^2*S/Tt 1.87(1296 ft^2)(1.04e-04)/10,971(002083) u=0.01
t= 0.002083 days

FIGURE 18.
JACOB STRAIGHT LINE FIT-LOWER INTERMEDIATE

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8	
	background														
27-Jul-92	05:15:00 PM	0.00	30.82		15.88		15.5		5.79		26.39		0		
27-Jul-92	05:30:00 PM	15.00	30.85		18.21		15.49		5.79		26.39		0		
27-Jul-92	05:45:00 PM	30.00	29.20		18.2		15.48		5.79		26.4		0		
27-Jul-92	06:00:00 PM	45.00	29.12		18.17		15.44		5.79		26.41		0		
27-Jul-92	06:15:00 PM	60.00	29.14		18.18		15.49		5.79		26.43		0		
27-Jul-92	06:30:00 PM	75.00	29.15		18.2		15.52		5.8		26.43		0		
27-Jul-92	06:45:00 PM	90.00	29.16		18.2		15.53		5.79		26.43		0		
27-Jul-92	07:00:00 PM	105.00	29.17		18.19		15.52		5.79		26.43		0		
27-Jul-92	07:15:00 PM	120.00	29.16		18.17		15.5		5.79		26.43		0		
27-Jul-92	07:30:00 PM	135.00	29.17		18.12		15.46		5.79		26.43		0		
27-Jul-92	07:45:00 PM	150.00	29.16		18.1		15.44		5.78		26.43		0		
27-Jul-92	08:00:00 PM	165.00	29.16		18.11		15.44		5.79		26.43		0		
27-Jul-92	08:15:00 PM	180.00	29.16		18.11		15.45		5.79		26.43		0		
27-Jul-92	08:30:00 PM	195.00	29.16		18.12		15.47		5.79		26.42		0		
27-Jul-92	08:45:00 PM	210.00	29.15		18.13		15.47		5.79		26.42		0		
27-Jul-92	09:00:00 PM	225.00	29.15		18.18		15.52		5.79		26.42		0		
27-Jul-92	09:15:00 PM	240.00	29.15		18.25		15.59		5.79		26.41		0		
27-Jul-92	09:30:00 PM	255.00	29.14		18.3		15.63		5.79		26.41		0		
27-Jul-92	09:45:00 PM	270.00	29.14		18.38		15.73		5.79		26.41		0		
27-Jul-92	10:00:00 PM	285.00	29.13		18.42		15.77		5.79		26.4		0		
27-Jul-92	10:15:00 PM	300.00	29.13		18.47		15.81		5.79		26.4		0		
27-Jul-92	10:30:00 PM	315.00	29.13		18.51		15.86		5.8		26.4		0		
27-Jul-92	10:45:00 PM	330.00	29.13		18.54		15.88		5.8		26.4		0		
27-Jul-92	11:00:00 PM	345.00	29.13		18.58		15.92		5.8		26.4		0		
27-Jul-92	11:15:00 PM	360.00	29.13		18.63		15.97		5.8		26.4		0		
27-Jul-92	11:30:00 PM	375.00	29.14		18.67		16.01		5.8		26.41		0		
27-Jul-92	11:45:00 PM	390.00	29.14		18.7		16.05		5.8		26.4		0		
28-Jul-92	12:00:00 AM	410.00	29.14		18.74		16.08		5.8		26.41		0		
28-Jul-92	12:15:00 AM	425.00	29.14		18.78		16.12		5.8		26.41		0		
28-Jul-92	12:30:00 AM	440.00	29.15		18.78		16.12		5.81		26.42		0		
28-Jul-92	12:45:00 AM	455.00	29.16		18.77		16.12		5.81		26.42		0		
28-Jul-92	01:00:00 AM	470.00	29.16		18.76		16.12		5.81		26.42		0		
28-Jul-92	01:15:00 AM	485.00	29.17		18.76		16.12		5.82		26.43		0		
28-Jul-92	01:30:00 AM	500.00	29.18		18.77		16.12		5.82		26.43		0		
28-Jul-92	01:45:00 AM	515.00	29.19		18.75		16.11		5.82		26.44		0		
28-Jul-92	02:00:00 AM	530.00	29.19		18.68		16.05		5.82		26.44		0		
28-Jul-92	02:15:00 AM	545.00	29.20		18.5		15.93		5.82		26.45		0		
28-Jul-92	02:30:00 AM	560.00	29.21		18.42		15.84		5.83		26.46		0		
28-Jul-92	02:45:00 AM	575.00	29.22		18.34		15.77		5.83		26.46		0		
28-Jul-92	03:00:00 AM	590.00	29.22		18.25		15.67		5.83		26.46		0		
28-Jul-92	03:15:00 AM	605.00	29.23		18.15		15.57		5.83		26.46		0		
28-Jul-92	03:30:00 AM	620.00	29.24		17.99		15.41		5.83		26.46		0		
28-Jul-92	03:45:00 AM	635.00	29.25		17.8		15.25		5.83		26.47		0		
28-Jul-92	04:00:00 AM	650.00	29.25		17.65		15.11		5.83		26.47		0		
28-Jul-92	04:15:00 AM	665.00	29.25		17.51		14.97		5.83		26.46		0		
28-Jul-92	04:30:00 AM	680.00	29.25		17.33		14.8		5.83		26.46		0		
28-Jul-92	04:45:00 AM	695.00	29.25		17.12		14.6		5.83		26.46		0		
28-Jul-92	05:00:00 AM	710.00	29.26		16.9		14.41		5.83		26.45		0		
28-Jul-92	05:15:00 AM	725.00	29.26		16.74		14.26		5.83		26.44		0		
28-Jul-92	05:30:00 AM	740.00	29.25		16.55		14.08		5.82		26.43		0		
28-Jul-92	05:45:00 AM	755.00	29.25		16.37		13.92		5.82		26.43		0		
28-Jul-92	06:00:00 AM	770.00	29.26		16.18		13.74		5.82		26.41		0		
28-Jul-92	06:15:00 AM	785.00	29.25		16.07		13.62		5.82		26.4		0		
28-Jul-92	06:30:00 AM	800.00	29.25		15.92		13.49		5.82		26.39		0		
28-Jul-92	06:45:00 AM	815.00	29.25		15.76		13.34		5.81		26.37		0		
28-Jul-92	07:00:00 AM	830.00	29.25		15.63		13.22		5.81		26.36		0		
28-Jul-92	07:15:00 AM	845.00	29.24		15.5		13.07		5.81		26.34		0		
28-Jul-92	07:30:00 AM	860.00	29.24		15.44		13		5.8		26.33		0		
28-Jul-92	07:45:00 AM	875.00	29.23		15.43		12.99		5.8		26.31		0		
28-Jul-92	08:00:00 AM	890.00	29.23		15.48		13.03		5.79		26.3		0		
28-Jul-92	08:15:00 AM	905.00	29.23		15.58		13.1		5.78		26.27		0		
28-Jul-92	08:30:00 AM	920.00	29.23		15.71		13.2		5.78		26.26		0		
28-Jul-92	08:45:00 AM	935.00	29.23		15.86		13.33		5.79		26.25		2.3		TESTING

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8	
28-Jul-92	09:00:00 AM	950.00	29.21		16.01		13.44		5.78		26.25		2.3		PUMP
28-Jul-92	09:15:00 AM	965.00	29.22		16.12		13.53		5.79		26.25		2.3		
28-Jul-92	09:30:00 AM	980.00	29.19		16.18		13.6		5.79		26.26		2.3		
28-Jul-92	09:45:00 AM	995.00	29.20		16.26		13.68		5.79		26.26		11.8		
28-Jul-92	10:00:00 AM	1010.00	29.20		16.35		13.76		5.78		26.25		11.9		
28-Jul-92	10:15:00 AM	1025.00	29.20		16.45		13.84		5.78		26.24		12		
28-Jul-92	10:30:00 AM	1040.00	29.20		16.57		13.96		5.78		26.24		15.5		
28-Jul-92	10:45:00 AM	1055.00	29.20		16.69		14.07		5.77		26.24		15.6		
28-Jul-92	11:00:00 AM	1070.00	29.21		16.81		14.16		5.76		26.24		15.7		
28-Jul-92	11:15:00 AM	1085.00	29.20		16.89		14.23		5.76		26.23		15.8		
28-Jul-92	11:30:00 AM	1100.00	29.20		16.96		14.31		5.76		26.24		15.9		
28-Jul-92	11:45:00 AM	1115.00	29.21		17.02		14.37		5.75		26.24		15.9		
28-Jul-92	12:00:00 PM	1130.00	29.21		17.08		14.41		5.74		26.24		15.9		
28-Jul-92	12:15:00 PM	1145.00	29.22		17.13		14.47		5.74		26.25		16		
28-Jul-92	12:30:00 PM	1160.00	29.22		17.19		14.53		5.72		26.25		16.1		
28-Jul-92	12:45:00 PM	1175.00	29.24		17.24		14.58		5.72		26.24		16.1		
28-Jul-92	01:00:00 PM	1190.00	29.23		17.28		14.62		5.72		26.25		16.2		
28-Jul-92	01:15:00 PM	1205.00	29.23		17.34		14.68		5.72		26.26		16.2		
28-Jul-92	01:30:00 PM	1220.00	29.23		17.4		14.72		5.71		26.26		0.3		
28-Jul-92	01:45:00 PM	1235.00	29.23		17.46		14.78		5.72		26.26		91.1		
28-Jul-92	02:00:00 PM	1250.00	29.25		17.51		14.83		5.75		26.3		0		
28-Jul-92	02:15:00 PM	1265.00	29.29		17.55		14.86		5.68		19.79		0		
28-Jul-92	02:30:00 PM	1280.00	29.26		17.53		14.87		5.73		17.59		5.9		
28-Jul-92	02:45:00 PM	1295.00	29.31		17.6		14.92		5.71		17.23		8.4		
28-Jul-92	03:00:00 PM	1310.00	29.32		17.6		14.92		5.7		14.31		5		
28-Jul-92	03:15:00 PM	1325.00	29.32		17.62		14.94		5.69		12.78		4.7		
28-Jul-92	03:30:00 PM	1340.00	29.32		17.62		14.95		5.64		11.69		90.6		PUMP OFF
28-Jul-92	03:45:00 PM	1355.00	29.30		17.59		14.93		5.66		16.96		95.1		
28-Jul-92	04:00:00 PM	1370.00	29.30		17.64		14.96		5.68		19.52		97.2		
28-Jul-92	04:15:00 PM	1385.00	29.24		17.59		14.88		5.68		20.98		98.5		
28-Jul-92	04:30:00 PM	1400.00	29.26		17.6		14.89		5.67		21.98		99.4		
28-Jul-92	04:45:00 PM	1415.00	29.27		17.63		14.92		5.67		22.71		100.1		
28-Jul-92	05:00:00 PM	1430.00	29.28		17.58		14.88		5.68		23.26		100.6		
28-Jul-92	05:15:00 PM	1445.00	29.26		17.53		14.81		5.69		23.67		100.9		
28-Jul-92	05:30:00 PM	1460.00	29.24		17.38		14.72		5.69		24		101.2		
28-Jul-92	05:45:00 PM	1475.00	29.26		17.39		14.73		5.69		24.27		101.5		
28-Jul-92	06:00:00 PM	1490.00	29.27		17.42		14.76		5.69		24.51		101.8		
28-Jul-92	06:15:00 PM	1505.00	29.27		17.46		14.77		5.7		24.72		102		
28-Jul-92	06:30:00 PM	1520.00	29.28		17.45		14.77		5.7		24.9		102.2		
28-Jul-92	06:45:00 PM	1535.00	29.27		17.45		14.77		5.69		25.06		102.3		
28-Jul-92	07:00:00 PM	1550.00	29.27		17.46		14.79		5.7		25.2		102.4		
28-Jul-92	07:15:00 PM	1565.00	29.26		17.47		14.79		5.7		25.31		102.6		
28-Jul-92	07:30:00 PM	1580.00	29.26		17.48		14.81		5.7		25.41		102.6		
28-Jul-92	07:45:00 PM	1595.00	29.25		17.49		14.82		5.7		25.51		102.7		
28-Jul-92	08:00:00 PM	1610.00	29.25		17.34		14.69		5.7		25.59		102.8		
28-Jul-92	08:15:00 PM	1625.00	29.25		17.28		14.63		5.71		25.64		102.8		
28-Jul-92	08:30:00 PM	1640.00	29.25		17.25		14.62		5.71		25.68		102.9		
28-Jul-92	08:45:00 PM	1655.00	29.24		17.2		14.64		5.71		25.73		102.9		
28-Jul-92	09:00:00 PM	1670.00	29.23		17.14		14.49		5.71		25.76		102.9		
28-Jul-92	09:15:00 PM	1685.00	29.23		17.21		14.55		5.71		25.8		103		
28-Jul-92	09:30:00 PM	1700.00	29.22		17.27		14.59		5.71		25.85		103.1		
28-Jul-92	09:45:00 PM	1715.00	29.21		17.28		14.6		5.71		25.89		103.1		
28-Jul-92	10:00:00 PM	1730.00	29.21		17.3		14.62		5.71		25.93		103.1		
28-Jul-92	10:15:00 PM	1745.00	29.20		17.28		14.61		5.72		25.97		103.2		
28-Jul-92	10:30:00 PM	1760.00	29.19		17.29		14.61		5.72		26		103.2		
28-Jul-92	10:45:00 PM	1775.00	29.19		17.28		14.6		5.72		26.03		103.2		
28-Jul-92	11:00:00 PM	1790.00	29.19		17.27		14.6		5.72		26.05		103.3		
28-Jul-92	11:15:00 PM	1805.00	29.18		17.31		14.63		5.72		26.07		103.3		
28-Jul-92	11:30:00 PM	1820.00	29.18		17.33		14.64		5.72		26.1		103.3		
28-Jul-92	11:45:00 PM	1835.00	29.18		17.33		14.64		5.72		26.11		103.3		
29-Jul-92	12:00:00 AM	1850.00	29.18		17.3		14.62		5.72		26.13		103.3		
29-Jul-92	12:15:00 AM	1865.00	29.18		17.27		14.6		5.73		26.15		103.3		
29-Jul-92	12:30:00 AM	1880.00	29.18		17.21		14.56		5.73		26.17		103.4		
29-Jul-92	12:45:00 AM	1895.00	29.19		17.16		14.5		5.73		26.18		103.4		

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.6	DRAWDOWN CH.6	
29-Jul-92	01:00:00 AM	1910.00	29.19		17.08		14.44		5.74		26.2		103.4		
29-Jul-92	01:15:00 AM	1925.00	29.19		17.06		14.41		5.74		26.22		103.4		
29-Jul-92	01:30:00 AM	1940.00	29.20		17		14.37		5.74		26.23		103.4		
29-Jul-92	01:45:00 AM	1955.00	29.21		16.95		14.33		5.75		26.24		103.5		
29-Jul-92	02:00:00 AM	1970.00	29.22		16.83		14.24		5.75		26.25		103.5		
29-Jul-92	02:15:00 AM	1985.00	29.22		16.82		14.09		5.76		26.26		103.5		
29-Jul-92	02:30:00 AM	2000.00	29.23		16.83		14.06		5.75		26.27		103.5		
29-Jul-92	02:45:00 AM	2015.00	29.24		16.5		13.97		5.75		26.29		103.5		
29-Jul-92	03:00:00 AM	2030.00	29.25		16.43		13.89		5.76		26.3		103.5		
29-Jul-92	03:15:00 AM	2045.00	29.25		16.33		13.81		5.76		26.31		103.5		
29-Jul-92	03:30:00 AM	2060.00	29.26		16.25		13.75		5.76		26.32		103.5		
29-Jul-92	03:45:00 AM	2075.00	29.27		16.14		13.68		5.76		26.33		103.5		
29-Jul-92	04:00:00 AM	2090.00	29.27		16.04		13.59		5.76		26.33		103.5		
29-Jul-92	04:15:00 AM	2105.00	29.28		15.99		13.54		5.76		26.34		103.5		
29-Jul-92	04:30:00 AM	2120.00	29.29		15.9		13.46		5.76		26.35		103.5		
29-Jul-92	04:45:00 AM	2135.00	29.30		15.83		13.4		5.77		26.35		103.5		
29-Jul-92	05:00:00 AM	2150.00	29.30		15.73		13.31		5.77		26.36		103.5		
29-Jul-92	05:15:00 AM	2165.00	29.30		15.67		13.26		5.77		26.35		103.5		
29-Jul-92	05:30:00 AM	2180.00	29.31		15.59		13.19		5.77		26.36		103.5		
29-Jul-92	05:45:00 AM	2195.00	29.31		15.51		13.11		5.77		26.36		103.5		
29-Jul-92	06:00:00 AM	2210.00	29.31		15.44		13.04		5.78		26.36		103.5		
29-Jul-92	06:15:00 AM	2225.00	29.31		15.45		13.04		5.76		26.35		103.5		
29-Jul-92	06:30:00 AM	2240.00	29.30		15.5		13.07		5.76		26.35		103.5		
29-Jul-92	06:45:00 AM	2255.00	29.30		15.49		13.06		5.76		26.35		103.5		
29-Jul-92	07:00:00 AM	2270.00	29.30		15.51		13.07		5.74		26.34		103.6		
29-Jul-92	07:15:00 AM	2285.00	29.30		15.54		13.07		5.75		26.32		103.5		
29-Jul-92	07:30:00 AM	2300.00	29.28		15.53		13.05		5.74		26.33		103.6		
29-Jul-92	07:45:00 AM	2315.00	29.29		15.55		13.07		5.73		26.31		103.6		
	begin drawdown														BEGIN DRAWDOWN
29-Jul-92	07:59:01 AM	0.00	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.31	0.00	96.8	0.00	PHASE
29-Jul-92	07:59:02 AM	0.02	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.31	0.00	93	3.80	
29-Jul-92	07:59:03 AM	0.03	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.31	0.00	88.5	8.30	
29-Jul-92	07:59:05 AM	0.07	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.31	0.00	84.8	12.00	
29-Jul-92	07:59:06 AM	0.08	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.3	0.01	81.3	15.50	
29-Jul-92	07:59:07 AM	0.10	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.3	0.01	77.5	19.30	
29-Jul-92	07:59:09 AM	0.13	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.3	0.01	74.4	22.40	
29-Jul-92	07:59:10 AM	0.15	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.3	0.01	71	25.80	
29-Jul-92	07:59:11 AM	0.17	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.3	0.01	68	28.80	
29-Jul-92	07:59:13 AM	0.20	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.29	0.02	64.9	31.90	
29-Jul-92	07:59:14 AM	0.22	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.29	0.02	61.9	34.90	
29-Jul-92	07:59:15 AM	0.23	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.28	0.03	59.1	37.70	
29-Jul-92	07:59:16 AM	0.25	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.28	0.03	56.3	40.50	
29-Jul-92	07:59:18 AM	0.28	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.27	0.04	53.6	43.20	
29-Jul-92	07:59:19 AM	0.30	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.26	0.05	50.7	46.10	
29-Jul-92	07:59:20 AM	0.32	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.25	0.06	48.2	48.60	
29-Jul-92	07:59:22 AM	0.35	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.24	0.07	45.6	51.20	
29-Jul-92	07:59:23 AM	0.37	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.24	0.07	43.3	53.50	
29-Jul-92	07:59:24 AM	0.38	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.22	0.09	41.3	55.50	
29-Jul-92	07:59:25 AM	0.40	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.21	0.10	39.2	57.60	
29-Jul-92	07:59:27 AM	0.43	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.19	0.12	37.3	59.50	
29-Jul-92	07:59:28 AM	0.45	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.18	0.13	35.6	61.20	
29-Jul-92	07:59:29 AM	0.47	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.16	0.15	33.9	62.90	
29-Jul-92	07:59:31 AM	0.50	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.14	0.17	32.4	64.40	
29-Jul-92	07:59:32 AM	0.52	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.12	0.19	30.9	65.90	
29-Jul-92	07:59:33 AM	0.53	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.11	0.20	29.6	67.20	
29-Jul-92	07:59:34 AM	0.55	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.09	0.22	28.5	68.30	
29-Jul-92	07:59:36 AM	0.58	29.29	0.00	15.63	0.00	13.13	0.00	5.73	0.00	26.07	0.24	27.3	69.50	
29-Jul-92	07:59:37 AM	0.60	29.29	0.00	15.64	0.01	13.13	0.00	5.73	0.00	26.05	0.26	26.3	70.50	
29-Jul-92	07:59:38 AM	0.62	29.29	0.00	15.64	0.01	13.14	0.01	5.73	0.00	26.04	0.27	25.4	71.40	
29-Jul-92	07:59:39 AM	0.63	29.29	0.00	15.64	0.01	13.13	0.00	5.74	0.01	26.01	0.30	24.3	72.50	
29-Jul-92	07:59:41 AM	0.67	29.29	0.00	15.64	0.01	13.14	0.01	5.74	0.01	25.99	0.32	23.6	73.20	
29-Jul-92	07:59:42 AM	0.68	29.29	0.00	15.64	0.01	13.14	0.01	5.74	0.01	25.98	0.33	22.9	73.90	
29-Jul-92	07:59:43 AM	0.70	29.29	0.00	15.64	0.01	13.14	0.01	5.74	0.01	25.95	0.36	22.1	74.70	
29-Jul-92	07:59:45 AM	0.73	29.29	0.00	15.64	0.01	13.14	0.01	5.74	0.01	25.93	0.38	21.5	75.30	

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8
29-Jul-92	07:59:46 AM	0.75	29.29	0.00	15.64	0.01	13.14	0.01	5.74	0.01	25.91	0.40	21	75.80
29-Jul-92	07:59:47 AM	0.77	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.89	0.42	20.4	76.40
29-Jul-92	07:59:48 AM	0.78	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.86	0.45	19.9	76.90
29-Jul-92	07:59:50 AM	0.82	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.85	0.46	19.5	77.30
29-Jul-92	07:59:51 AM	0.83	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.82	0.49	19.1	77.70
29-Jul-92	07:59:52 AM	0.85	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.8	0.51	18.7	78.10
29-Jul-92	07:59:53 AM	0.87	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.78	0.53	18.5	78.30
29-Jul-92	07:59:55 AM	0.90	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.76	0.55	18	78.80
29-Jul-92	07:59:56 AM	0.92	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.73	0.58	17.7	79.10
29-Jul-92	07:59:57 AM	0.93	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.71	0.60	17.5	79.30
29-Jul-92	07:59:58 AM	0.95	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.69	0.62	17.2	79.60
29-Jul-92	08:00:00 AM	0.98	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.66	0.65	17	79.80
29-Jul-92	08:00:01 AM	1.00	29.29	0.00	15.65	0.02	13.14	0.01	5.74	0.01	25.64	0.67	16.7	80.10
29-Jul-92	08:00:02 AM	1.02	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.62	0.69	16.5	80.30
29-Jul-92	08:00:04 AM	1.05	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.6	0.71	16.3	80.50
29-Jul-92	08:00:05 AM	1.07	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.57	0.74	16	80.80
29-Jul-92	08:00:06 AM	1.08	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.55	0.76	15.9	80.90
29-Jul-92	08:00:07 AM	1.10	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.53	0.78	15.5	81.30
29-Jul-92	08:00:09 AM	1.13	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.51	0.80	15.5	81.30
29-Jul-92	08:00:10 AM	1.16	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.48	0.83	15.3	81.50
29-Jul-92	08:00:11 AM	1.17	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.47	0.84	15.3	81.50
29-Jul-92	08:00:12 AM	1.18	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.44	0.87	15.3	81.50
29-Jul-92	08:00:14 AM	1.22	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.41	0.90	15.3	81.50
29-Jul-92	08:00:15 AM	1.23	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.4	0.91	15.1	81.70
29-Jul-92	08:00:16 AM	1.25	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.37	0.94	15.1	81.70
29-Jul-92	08:00:17 AM	1.27	29.30	0.01	15.67	0.04	13.15	0.02	5.75	0.02	25.35	0.96	15.1	81.70
29-Jul-92	08:00:19 AM	1.30	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.33	0.98	15.1	81.70
29-Jul-92	08:00:20 AM	1.32	29.30	0.01	15.67	0.04	13.15	0.02	5.75	0.02	25.31	1.00	15	81.80
29-Jul-92	08:00:21 AM	1.33	29.30	0.01	15.66	0.03	13.14	0.01	5.75	0.02	25.28	1.03	14.9	81.90
29-Jul-92	08:00:23 AM	1.37	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.27	1.04	14.8	82.00
29-Jul-92	08:00:24 AM	1.38	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.24	1.07	14.8	82.00
29-Jul-92	08:00:25 AM	1.40	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.22	1.09	14.8	82.00
29-Jul-92	08:00:26 AM	1.42	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.2	1.11	14.8	82.00
29-Jul-92	08:00:28 AM	1.45	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.18	1.13	14.6	82.20
29-Jul-92	08:00:29 AM	1.47	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.16	1.15	14.6	82.20
29-Jul-92	08:00:30 AM	1.48	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.14	1.17	14.6	82.20
29-Jul-92	08:00:31 AM	1.50	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.12	1.19	14.4	82.40
29-Jul-92	08:00:33 AM	1.53	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.1	1.21	14.4	82.40
29-Jul-92	08:00:34 AM	1.55	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.08	1.23	14.3	82.50
29-Jul-92	08:00:35 AM	1.57	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.06	1.25	14.4	82.40
29-Jul-92	08:00:36 AM	1.58	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.04	1.27	14.1	82.70
29-Jul-92	08:00:38 AM	1.62	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25.02	1.29	14.2	82.60
29-Jul-92	08:00:39 AM	1.63	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	25	1.31	14	82.80
29-Jul-92	08:00:40 AM	1.65	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.98	1.33	14.1	82.70
29-Jul-92	08:00:41 AM	1.67	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.96	1.35	13.9	82.90
29-Jul-92	08:00:43 AM	1.70	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.94	1.37	13.9	82.90
29-Jul-92	08:00:44 AM	1.72	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.92	1.39	13.8	83.00
29-Jul-92	08:00:45 AM	1.73	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.9	1.41	14	82.80
29-Jul-92	08:00:46 AM	1.75	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.89	1.42	14.1	82.70
29-Jul-92	08:00:48 AM	1.78	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.87	1.44	14.1	82.70
29-Jul-92	08:00:49 AM	1.80	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.84	1.47	14.3	82.50
29-Jul-92	08:00:50 AM	1.82	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.83	1.48	14.3	82.50
29-Jul-92	08:00:52 AM	1.85	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.81	1.50	14.4	82.40
29-Jul-92	08:00:53 AM	1.87	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.79	1.52	14.5	82.30
29-Jul-92	08:00:54 AM	1.88	29.30	0.01	15.67	0.04	13.15	0.02	5.76	0.03	24.77	1.54	14.6	82.20
29-Jul-92	08:00:55 AM	1.90	29.30	0.01	15.67	0.04	13.15	0.02	5.77	0.04	24.76	1.55	14.6	82.20
29-Jul-92	08:01:00 AM	1.98	29.30	0.01	15.67	0.04	13.15	0.02	5.77	0.04	24.7	1.61	14.6	82.00
29-Jul-92	08:01:05 AM	2.07	29.30	0.01	15.67	0.04	13.15	0.02	5.77	0.04	24.63	1.68	14.7	82.10
29-Jul-92	08:01:10 AM	2.15	29.30	0.01	15.67	0.04	13.15	0.02	5.77	0.04	24.56	1.75	14.8	82.00
29-Jul-92	08:01:15 AM	2.23	29.30	0.01	15.67	0.04	13.15	0.02	5.77	0.04	24.5	1.81	14.7	82.10
29-Jul-92	08:01:20 AM	2.32	29.30	0.01	15.67	0.04	13.15	0.02	5.77	0.04	24.43	1.88	14.8	82.00
29-Jul-92	08:01:25 AM	2.40	29.31	0.02	15.67	0.04	13.15	0.02	5.77	0.04	24.37	1.94	14.6	82.20
29-Jul-92	08:01:30 AM	2.48	29.31	0.02	15.67	0.04	13.15	0.02	5.77	0.04	24.31	2.00	14.6	82.20
29-Jul-92	08:01:35 AM	2.57	29.31	0.02	15.67	0.04	13.15	0.02	5.77	0.04	24.25	2.06	14.8	82.00

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8
29-Jul-92	08:01:40 AM	2.65	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	24.19	2.12	15.1	81.70
29-Jul-92	08:01:45 AM	2.73	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	24.13	2.18	15.1	81.70
29-Jul-92	08:01:50 AM	2.82	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	24.08	2.23	15.1	81.70
29-Jul-92	08:01:55 AM	2.90	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	24.02	2.29	15.2	81.60
29-Jul-92	08:02:00 AM	2.98	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.97	2.34	15.7	81.10
29-Jul-92	08:02:05 AM	3.07	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.92	2.39	16.2	80.60
29-Jul-92	08:02:10 AM	3.15	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.87	2.44	16.6	80.20
29-Jul-92	08:02:15 AM	3.23	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.81	2.50	17	79.80
29-Jul-92	08:02:20 AM	3.32	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.76	2.55	17.2	79.60
29-Jul-92	08:02:25 AM	3.40	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.71	2.60	17.4	79.40
29-Jul-92	08:02:35 AM	3.57	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.62	2.69	17.5	79.30
29-Jul-92	08:02:45 AM	3.73	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.53	2.78	17.4	79.40
29-Jul-92	08:02:55 AM	3.90	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.44	2.87	18.1	78.70
29-Jul-92	08:03:05 AM	4.07	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.36	2.95	18.6	78.20
29-Jul-92	08:03:15 AM	4.23	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.27	3.04	18.7	78.10
29-Jul-92	08:03:25 AM	4.40	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.18	3.13	18.9	77.90
29-Jul-92	08:03:35 AM	4.57	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.1	3.21	18.8	78.00
29-Jul-92	08:03:45 AM	4.73	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	23.03	3.28	18.7	78.10
29-Jul-92	08:03:55 AM	4.90	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	22.95	3.36	18.6	78.20
29-Jul-92	08:04:05 AM	5.07	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	22.87	3.44	18.6	78.20
29-Jul-92	08:04:15 AM	5.23	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	22.79	3.52	18.6	78.20
29-Jul-92	08:04:25 AM	5.40	29.31	0.02	15.67	0.04	13.15	0.02	5.78	0.05	22.72	3.59	18.6	78.20
29-Jul-92	08:04:35 AM	5.57	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	22.65	3.66	18.6	78.20
29-Jul-92	08:04:45 AM	5.73	29.31	0.02	15.67	0.04	13.15	0.02	5.78	0.05	22.57	3.74	18.4	78.40
29-Jul-92	08:04:55 AM	5.90	29.31	0.02	15.67	0.04	13.15	0.02	5.78	0.05	22.5	3.81	18.5	78.30
29-Jul-92	08:05:05 AM	6.07	29.31	0.02	15.67	0.04	13.16	0.02	5.78	0.05	22.43	3.88	18.3	78.50
29-Jul-92	08:05:15 AM	6.23	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	22.36	3.95	18.4	78.40
29-Jul-92	08:05:25 AM	6.40	29.31	0.02	15.67	0.04	13.16	0.03	5.78	0.05	22.29	4.02	18.3	78.50
29-Jul-92	08:05:55 AM	6.90	29.32	0.03	15.67	0.04	13.16	0.03	5.78	0.05	22.09	4.22	18.2	78.60
29-Jul-92	08:06:25 AM	7.40	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	21.89	4.42	18	78.80
29-Jul-92	08:06:55 AM	7.90	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	21.7	4.61	18.1	78.70
29-Jul-92	08:07:25 AM	8.40	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	21.53	4.78	17.7	79.10
29-Jul-92	08:07:55 AM	8.90	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	21.35	4.96	17.7	79.10
29-Jul-92	08:08:25 AM	9.40	29.32	0.03	15.68	0.05	13.16	0.03	5.78	0.05	21.18	5.13	17.7	79.10
29-Jul-92	08:08:55 AM	9.90	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	21.02	5.29	17.3	79.50
29-Jul-92	08:09:25 AM	10.40	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	20.86	5.45	17.4	79.40
29-Jul-92	08:09:55 AM	10.90	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	20.7	5.61	17.2	79.60
29-Jul-92	08:10:25 AM	11.40	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	20.54	5.77	17.4	79.40
29-Jul-92	08:10:55 AM	11.90	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	20.4	5.91	17.2	79.60
29-Jul-92	08:11:25 AM	12.40	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	20.26	6.05	17.1	79.70
29-Jul-92	08:11:55 AM	12.90	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	20.12	6.19	17	79.80
29-Jul-92	08:12:26 AM	13.40	29.32	0.03	15.68	0.05	13.16	0.03	5.77	0.04	19.98	6.33	16.8	80.00
29-Jul-92	08:12:56 AM	13.90	29.32	0.03	15.68	0.05	13.16	0.03	5.76	0.03	19.85	6.46	16.7	80.10
29-Jul-92	08:13:25 AM	14.40	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	19.72	6.59	16.8	80.00
29-Jul-92	08:13:55 AM	14.90	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	19.59	6.72	16.7	80.10
29-Jul-92	08:14:25 AM	15.40	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	19.47	6.84	16.6	80.20
29-Jul-92	08:14:55 AM	15.90	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	19.35	6.96	16.5	80.30
29-Jul-92	08:15:25 AM	16.40	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	19.23	7.08	16.3	80.50
29-Jul-92	08:16:25 AM	17.40	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	19	7.31	16.2	80.60
29-Jul-92	08:17:25 AM	18.40	29.32	0.03	15.69	0.06	13.17	0.04	5.76	0.03	18.79	7.52	16	80.80
29-Jul-92	08:18:25 AM	19.40	29.32	0.03	15.69	0.06	13.17	0.04	5.75	0.02	18.57	7.74	16	80.80
29-Jul-92	08:19:25 AM	20.40	29.32	0.03	15.7	0.07	13.17	0.04	5.75	0.02	18.37	7.94	16	80.80
29-Jul-92	08:20:25 AM	21.40	29.32	0.03	15.69	0.06	13.17	0.04	5.75	0.02	18.18	8.13	16.2	80.60
29-Jul-92	08:21:25 AM	22.40	29.31	0.02	15.69	0.06	13.16	0.03	5.75	0.02	17.99	8.32	15.7	81.10
29-Jul-92	08:22:25 AM	23.40	29.32	0.03	15.69	0.06	13.17	0.04	5.75	0.02	17.82	8.49	15.8	81.00
29-Jul-92	08:23:25 AM	24.40	29.31	0.02	15.69	0.06	13.16	0.03	5.74	0.01	17.64	8.67	15.8	81.00
29-Jul-92	08:24:26 AM	25.40	29.32	0.03	15.7	0.07	13.17	0.04	5.74	0.01	17.47	8.84	15.7	81.10
29-Jul-92	08:25:26 AM	26.40	29.32	0.03	15.7	0.07	13.17	0.04	5.74	0.01	17.32	8.99	15.6	81.20
29-Jul-92	08:26:25 AM	27.40	29.32	0.03	15.7	0.07	13.17	0.04	5.74	0.01	17.16	9.15	15.5	81.30
29-Jul-92	08:27:25 AM	28.40	29.32	0.03	15.7	0.07	13.16	0.03	5.74	0.01	17.01	9.30	15.4	81.40
29-Jul-92	08:28:25 AM	29.40	29.31	0.02	15.7	0.07	13.16	0.03	5.74	0.01	16.86	9.45	15.3	81.50
29-Jul-92	08:29:25 AM	30.40	29.31	0.02	15.7	0.07	13.17	0.04	5.74	0.01	16.72	9.59	15.4	81.40
29-Jul-92	08:30:25 AM	31.40	29.31	0.02	15.7	0.07	13.17	0.04	5.74	0.01	16.57	9.74	15.2	81.60
29-Jul-92	08:33:25 AM	34.40	29.31	0.02	15.71	0.08	13.17	0.04	5.73	0.00	16.18	10.13	13.4	83.40

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.6	DRAWDOWN CH.6	
29-Jul-92	08:36:25 AM	37.40	29.31	0.02	15.71	0.09	13.17	0.04	5.73	0.00	15.79	10.52	13.1	83.70	
29-Jul-92	08:39:25 AM	40.40	29.31	0.02	15.72	0.09	13.18	0.05	5.73	0.00	15.42	10.89	12.9	83.90	
29-Jul-92	08:42:25 AM	43.40	29.31	0.02	15.7	0.07	13.17	0.04	5.73	0.00	15.09	11.22	12.9	83.90	
29-Jul-92	08:45:25 AM	46.40	29.31	0.02	15.71	0.08	13.17	0.04	5.72	-0.01	14.78	11.53	12.7	84.10	
29-Jul-92	08:48:25 AM	49.40	29.31	0.02	15.72	0.09	13.18	0.05	5.72	-0.01	14.5	11.81	12.6	84.20	
29-Jul-92	08:51:25 AM	52.40	29.30	0.01	15.72	0.09	13.18	0.05	5.72	-0.01	14.23	12.08	12.7	84.10	
29-Jul-92	08:54:25 AM	55.40	29.30	0.01	15.72	0.09	13.17	0.04	5.72	-0.01	13.98	12.33	12.5	84.30	
29-Jul-92	08:57:25 AM	58.40	29.30	0.01	15.72	0.09	13.17	0.04	5.72	-0.01	13.75	12.56	12.5	84.30	
29-Jul-92	09:00:25 AM	61.40	29.30	0.01	15.73	0.10	13.18	0.05	5.71	-0.02	13.52	12.79	12.3	84.50	
29-Jul-92	09:05:25 AM	66.40	29.30	0.01	15.73	0.10	13.18	0.05	5.71	-0.02	13.17	13.14	12.2	84.60	
29-Jul-92	09:10:25 AM	71.40	29.30	0.01	15.73	0.10	13.19	0.06	5.71	-0.02	12.86	13.45	12.5	84.30	
29-Jul-92	09:15:25 AM	76.40	29.29	0.00	15.75	0.12	13.21	0.08	5.71	-0.02	12.58	13.73	12.2	84.60	
29-Jul-92	09:20:25 AM	81.40	29.28	-0.01	15.76	0.13	13.22	0.09	5.71	-0.02	12.31	14.00	12.3	84.50	
29-Jul-92	09:25:25 AM	86.40	29.29	0.00	15.78	0.15	13.23	0.10	5.71	-0.02	12.08	14.23	12.1	84.70	
29-Jul-92	09:30:25 AM	91.40	29.28	-0.01	15.8	0.17	13.24	0.11	5.71	-0.02	11.84	14.47	12	84.80	
29-Jul-92	09:35:25 AM	96.40	29.28	-0.01	15.81	0.18	13.25	0.12	5.71	-0.02	11.63	14.68	12.1	84.70	
29-Jul-92	09:40:25 AM	101.40	29.28	-0.01	15.82	0.19	13.26	0.13	5.7	-0.03	11.44	14.87	11.9	84.90	
29-Jul-92	09:45:25 AM	106.40	29.28	-0.01	15.83	0.20	13.28	0.15	5.7	-0.03	11.25	15.06	11.8	85.00	
29-Jul-92	09:50:25 AM	111.40	29.27	-0.02	15.84	0.21	13.28	0.15	5.7	-0.03	11.08	15.23	11.5	85.30	
29-Jul-92	10:00:25 AM	121.40	29.27	-0.02	15.85	0.22	13.29	0.16	5.69	-0.04	10.77	15.54	11.8	85.00	
29-Jul-92	10:10:25 AM	131.40	29.26	-0.03	15.85	0.22	13.29	0.16	5.7	-0.03	10.49	15.82			-TRANSDUCER
29-Jul-92	10:20:25 AM	141.40	29.26	-0.03	15.87	0.24	13.3	0.17	5.7	-0.03	10.27	16.04			MALFUNCTIONS
29-Jul-92	10:30:25 AM	151.40	29.25	-0.04	15.91	0.28	13.34	0.21	5.69	-0.04	10.06	16.25			
29-Jul-92	10:40:25 AM	161.40	29.25	-0.04	15.95	0.32	13.38	0.25	5.69	-0.04	9.86	16.45			
29-Jul-92	10:50:25 AM	171.40	29.25	-0.04	15.99	0.36	13.4	0.27	5.69	-0.04	9.68	16.63			
29-Jul-92	11:00:25 AM	181.40	29.24	-0.05	16.04	0.41	13.44	0.31	5.68	-0.05	9.52	16.79			
29-Jul-92	11:10:25 AM	191.40	29.24	-0.05	16.09	0.46	13.49	0.36	5.68	-0.05	9.39	16.92			
29-Jul-92	11:15:25 AM	196.40		-29.29		-15.63		-13.13		-5.73			10.9	85.90	-BEGIN TAPE
29-Jul-92	11:20:25 AM	201.40	29.23	-0.06	16.13	0.50	13.52	0.39	5.68	-0.05	9.25	17.06			MEASURING
29-Jul-92	11:30:25 AM	211.40	29.23	-0.06	16.16	0.53	13.54	0.41	5.68	-0.05	9	17.31	8.4	88.40	
29-Jul-92	11:40:25 AM	221.40	29.23	-0.06	16.18	0.55	13.55	0.42	5.67	-0.06	8.8	17.51			
29-Jul-92	11:45:12 AM	226.19		-29.29		-15.63		-13.13		-5.73			8.4	88.40	
29-Jul-92	11:50:00 AM	230.98	29.22	-0.07	16.23	0.60	13.6	0.47	5.67	-0.06	8.51	17.80			
29-Jul-92	12:00:00 PM	240.98	29.22	-0.07	16.23	0.60	13.6	0.47	5.66	-0.07	8.49	17.82	8.3	88.50	
29-Jul-92	12:15:00 PM	255.98	29.21	-0.08	16.26	0.63	13.62	0.49	5.65	-0.08	8.35	17.96	8.3	88.50	
29-Jul-92	12:30:00 PM	270.98	29.21	-0.08	16.3	0.67	13.66	0.53	5.65	-0.08	8.2	18.11	8.2	88.60	
29-Jul-92	12:45:00 PM	285.98	29.20	-0.09	16.31	0.68	13.66	0.53	5.66	-0.07	8.05	18.26			
29-Jul-92	01:00:00 PM	300.98	29.13	-0.16	16.28	0.65	13.52	0.39	5.65	-0.08	7.9	18.41	8.2	88.60	
29-Jul-92	01:15:00 PM	315.98	29.15	-0.14	16.31	0.68	13.55	0.42	5.65	-0.08	7.8	18.51	8.2	88.60	
29-Jul-92	01:30:00 PM	330.98	29.13	-0.16	16.28	0.65	13.62	0.49	5.65	-0.08	7.7	18.61	8.2	88.60	VALUES
29-Jul-92	01:45:00 PM	345.98	29.15	-0.14	16.31	0.68	13.68	0.55	5.65	-0.08	7.61	18.70			
29-Jul-92	02:00:00 PM	360.98	29.17	-0.12	16.37	0.74	13.72	0.59	5.65	-0.08	7.55	18.76	8.1	88.70	
29-Jul-92	02:14:00 PM	374.98	29.19	-0.10	16.38	0.75	13.73	0.60	5.64	-0.09	7.51	18.80			
29-Jul-92	02:15:00 PM	375.98	29.19	-0.10	16.38	0.75	13.73	0.60	5.64	-0.09	7.5	18.81			
29-Jul-92	02:30:00 PM	390.98	29.19	-0.10	16.42	0.79	13.75	0.62	5.65	-0.08	7.46	18.85	8.1	88.70	
29-Jul-92	02:45:00 PM	405.98	29.16	-0.13	16.4	0.77	13.74	0.61	5.64	-0.09	7.39	18.92			
29-Jul-92	03:00:00 PM	420.98	29.17	-0.12	16.43	0.80	13.77	0.64	5.64	-0.09	7.32	18.99	7.7	89.10	
29-Jul-92	03:15:00 PM	435.98	29.16	-0.11	16.45	0.82	13.79	0.66	5.64	-0.09	7.26	19.05			
29-Jul-92	03:30:00 PM	450.98	29.17	-0.12	16.45	0.82	13.78	0.66	5.65	-0.08	7.21	19.10	7.8	89.00	
29-Jul-92	03:45:00 PM	465.98	29.17	-0.12	16.46	0.83	13.81	0.68	5.65	-0.08	7.2	19.11			
29-Jul-92	04:00:00 PM	480.98	29.16	-0.11	16.46	0.83	13.8	0.67	5.65	-0.08	7.15	19.16	7.7	89.10	
29-Jul-92	04:15:00 PM	495.98	29.19	-0.10	16.48	0.85	13.81	0.68	5.66	-0.07	7.12	19.19			
29-Jul-92	04:30:00 PM	510.98	29.16	-0.11	16.48	0.85	13.81	0.68	5.66	-0.07	7.1	19.21	7.8	89.00	
29-Jul-92	04:45:00 PM	525.98	29.16	-0.11	16.49	0.86	13.83	0.70	5.65	-0.08	7.08	19.23			
29-Jul-92	05:00:00 PM	540.98	29.16	-0.11	16.51	0.88	13.85	0.72	5.65	-0.08	7.04	19.27	7.5	89.30	
29-Jul-92	05:15:00 PM	555.98	29.19	-0.10	16.5	0.87	13.82	0.69	5.65	-0.08	7.01	19.30	7.8	89.00	
29-Jul-92	05:30:00 PM	570.98	29.17	-0.12	16.45	0.82	13.79	0.66	5.65	-0.08	6.98	19.33	7.5	89.30	VALUE
29-Jul-92	05:45:00 PM	585.98	29.19	-0.10	16.44	0.81	13.78	0.63	5.64	-0.09	6.96	19.35			
29-Jul-92	06:00:00 PM	600.98	29.19	-0.10	16.39	0.76	13.73	0.60	5.64	-0.09	6.94	19.37	7.5	89.30	
29-Jul-92	06:15:00 PM	615.98	29.19	-0.10	16.33	0.70	13.67	0.54	5.62	-0.11	6.91	19.40			
29-Jul-92	06:30:00 PM	630.98	29.20	-0.09	16.31	0.68	13.64	0.51	5.63	-0.10	6.89	19.45			
29-Jul-92	06:45:00 PM	645.98	29.19	-0.10	16.25	0.62	13.58	0.45	5.63	-0.10	6.88	19.45			
29-Jul-92	07:00:00 PM	660.98	29.19	-0.10	16.2	0.57	13.54	0.41	5.63	-0.10	6.85	19.46	7.3	89.50	
29-Jul-92	07:15:00 PM	675.98	29.19	-0.10	16.13	0.50	13.49	0.36	5.63	-0.10	6.83	19.48			

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.6	DRAWDOWN CH.6	
29-Jul-92	07:30:00 PM	690.98	29.19	-0.10	16.09	0.46	13.45	0.32	5.65	-0.08	6.82	19.49			
29-Jul-92	07:45:00 PM	705.98	29.11	-0.18	16.03	0.40	13.38	0.23	5.65	-0.08	6.76	19.55			
29-Jul-92	08:00:00 PM	720.98	29.13	-0.16	15.99	0.36	13.35	0.22	5.64	-0.09	6.74	19.57	7.1	89.70	
29-Jul-92	08:15:00 PM	735.98	29.13	-0.16	16	0.37	13.37	0.24	5.64	-0.09	6.72	19.59			
29-Jul-92	08:30:00 PM	750.98	29.14	-0.15	16	0.37	13.39	0.26	5.65	-0.08	6.7	19.61			
29-Jul-92	08:45:00 PM	765.98	29.13	-0.16	16.02	0.39	13.42	0.29	5.65	-0.08	6.69	19.62			
29-Jul-92	09:00:00 PM	780.98	29.13	-0.16	16.05	0.42	13.44	0.31	5.66	-0.07	6.67	19.64	7.1	89.70	
29-Jul-92	09:15:00 PM	795.98	29.12	-0.17	16.07	0.44	13.43	0.30	5.67	-0.06	6.64	19.67			
29-Jul-92	09:30:00 PM	810.98	29.03	-0.26	16.05	0.42	13.44	0.31	5.66	-0.07	6.6	19.71			
29-Jul-92	09:45:00 PM	825.98	29.06	-0.23	16.07	0.44	13.43	0.30	5.66	-0.07	6.58	19.73			
29-Jul-92	10:00:00 PM	840.98	29.06	-0.23	16.06	0.43	13.42	0.29	5.64	-0.09	6.57	19.74	6.9	89.90	
29-Jul-92	10:15:00 PM	855.98	29.05	-0.24	16.05	0.42	13.41	0.28	5.65	-0.08	6.51	19.80			-TRANSDUCER
29-Jul-92	10:30:00 PM	870.98	29.00	-0.29	16.1	0.47	13.43	0.30	5.66	-0.07	6.45	19.86			DISCONNECTED
29-Jul-92	10:45:00 PM	885.98	28.97	-0.32	16.12	0.49	13.52	0.39	5.66	-0.07	6.44	19.87			
29-Jul-92	11:00:00 PM	900.98	29.00	-0.29	16.17	0.54	13.55	0.42	5.66	-0.07	6.41	19.90	6.7	90.10	
29-Jul-92	11:15:00 PM	915.98	29.00	-0.29	16.15	0.52	13.53	0.40	5.67	-0.06	6.39	19.92			
29-Jul-92	11:30:00 PM	930.98	28.98	-0.33	16.09	0.46	13.48	0.35	5.67	-0.06	6.36	19.95			
29-Jul-92	11:45:00 PM	945.98	28.98	-0.31	16.12	0.49	13.51	0.38	5.67	-0.06	6.34	19.97			
30-Jul-92	12:00:00 AM	960.98	28.99	-0.30	16.19	0.56	13.58	0.45	5.68	-0.05	6.32	19.99	6.6	90.20	
30-Jul-92	12:15:00 AM	975.98	28.96	-0.33	16.24	0.61	13.62	0.49	5.69	-0.04	6.31	20.00			
30-Jul-92	12:30:00 AM	990.98	28.98	-0.31	16.25	0.62	13.65	0.52	5.69	-0.04	6.31	20.00			
30-Jul-92	12:45:00 AM	1005.98	28.97	-0.32	16.28	0.65	13.68	0.55	5.68	-0.05	6.29	20.02			
30-Jul-92	01:00:00 AM	1020.98	29.00	-0.29	16.33	0.70	13.72	0.59	5.69	-0.04	6.27	20.04	6.6	90.20	
30-Jul-92	01:15:00 AM	1035.98	28.98	-0.33	16.36	0.73	13.74	0.61	5.69	-0.04	6.25	20.06			
30-Jul-92	01:30:00 AM	1050.98	28.98	-0.31	16.37	0.74	13.75	0.62	5.7	-0.03	6.25	20.06			
30-Jul-92	01:45:00 AM	1065.98	28.97	-0.32	16.4	0.77	13.77	0.64	5.71	-0.02	6.24	20.07			
30-Jul-92	02:00:00 AM	1080.98	28.98	-0.31	16.37	0.74	13.8	0.67	5.72	-0.01	6.24	20.07	6.5	90.30	
30-Jul-92	02:15:00 AM	1095.98	28.99	-0.30	16.29	0.66	13.75	0.62	5.72	-0.01	6.22	20.09			
30-Jul-92	02:30:00 AM	1110.98	29.00	-0.29	16.34	0.71	13.74	0.61	5.72	-0.01	6.21	20.10			
30-Jul-92	02:45:00 AM	1125.98	28.99	-0.30	16.31	0.68	13.69	0.56	5.72	-0.01	6.19	20.12			
30-Jul-92	03:00:00 AM	1140.98	29.00	-0.29	16.3	0.67	13.68	0.55	5.72	-0.01	6.18	20.13	6.4	90.40	
30-Jul-92	03:15:00 AM	1155.98	29.02	-0.27	16.31	0.68	13.68	0.55	5.73	0.00	6.18	20.13			
30-Jul-92	03:30:00 AM	1170.98	29.00	-0.29	16.31	0.68	13.7	0.57	5.74	0.01	6.18	20.13			
30-Jul-92	03:45:00 AM	1185.98	29.02	-0.27	16.31	0.68	13.73	0.60	5.74	0.01	6.18	20.13			
30-Jul-92	04:00:00 AM	1200.98	29.02	-0.27	16.32	0.69	13.75	0.62	5.75	0.02	6.18	20.13			
30-Jul-92	04:15:00 AM	1215.98	29.04	-0.25	16.37	0.74	13.81	0.68	5.75	0.02	6.19	20.12			
30-Jul-92	04:30:00 AM	1230.98	29.04	-0.25	16.34	0.71	13.75	0.62	5.75	0.02	6.18	20.13	6.4	90.40	
30-Jul-92	04:45:00 AM	1245.98	29.04	-0.25	16.28	0.65	13.69	0.56	5.76	0.03	6.18	20.13			
30-Jul-92	05:00:00 AM	1260.98	29.06	-0.23	16.24	0.61	13.66	0.53	5.76	0.03	6.18	20.13			
30-Jul-92	05:15:00 AM	1275.98	29.06	-0.23	16.19	0.56	13.62	0.49	5.76	0.03	6.17	20.14			
30-Jul-92	05:30:00 AM	1290.98	29.06	-0.23	16.18	0.55	13.6	0.47	5.75	0.02	6.17	20.14			
30-Jul-92	05:45:00 AM	1305.98	29.07	-0.22	16.22	0.59	13.62	0.49	5.74	0.01	6.14	20.17			
30-Jul-92	06:00:00 AM	1320.98	29.06	-0.21	16.25	0.62	13.66	0.53	5.74	0.01	6.14	20.17	6.4	90.40	
30-Jul-92	06:15:00 AM	1335.98	29.09	-0.20	16.36	0.73	13.74	0.61	5.75	0.02	6.13	20.18			
30-Jul-92	06:30:00 AM	1350.98	29.04	-0.25	16.33	0.70	13.7	0.57	5.76	0.03	6.14	20.17			
30-Jul-92	06:45:00 AM	1365.98	29.05	-0.24	16.33	0.70	13.73	0.60	5.76	0.03	6.14	20.17			
30-Jul-92	07:00:00 AM	1380.98	29.06	-0.23	16.36	0.73	13.75	0.62	5.76	0.03	6.12	20.19			
30-Jul-92	07:15:00 AM	1395.98	29.06	-0.23	16.37	0.74	13.75	0.62	5.76	0.03	6.12	20.19			
30-Jul-92	07:30:00 AM	1410.98	29.05	-0.24	16.35	0.72	13.74	0.61	5.76	0.03	6.12	20.19			
30-Jul-92	07:45:00 AM	1425.98	29.05	-0.24	16.3	0.67	13.69	0.56	5.76	0.03	6.11	20.20			
30-Jul-92	08:00:00 AM	1440.98	29.04	-0.25	16.37	0.74	13.75	0.62	5.75	0.02	6.09	20.22	6.5	90.30	
30-Jul-92	08:15:00 AM	1455.98	29.05	-0.24	16.37	0.74	13.74	0.61	5.76	0.03	6.09	20.22			
30-Jul-92	08:30:00 AM	1470.98	29.02	-0.27	16.36	0.73	13.74	0.61	5.77	0.04	6.1	20.21			
30-Jul-92	08:45:00 AM	1485.98	29.01	-0.28	16.4	0.77	13.76	0.65	5.76	0.03	6.1	20.21			
30-Jul-92	09:00:00 AM	1500.98	29.01	-0.28	16.45	0.82	13.82	0.69	5.76	0.03	6.09	20.22	6.6	90.00	
30-Jul-92	09:15:00 AM	1515.98	29.02	-0.27	16.47	0.84	13.82	0.69	5.76	0.03	6.11	20.20			
30-Jul-92	09:30:00 AM	1530.98	29.00	-0.29	16.46	0.83	13.83	0.70	5.76	0.03	6.12	20.19			
30-Jul-92	09:45:00 AM	1545.98	29.00	-0.29	16.5	0.87	13.87	0.74	5.76	0.03	6.12	20.19			
30-Jul-92	10:00:00 AM	1560.98	29.00	-0.29	16.5	0.87	13.86	0.73	5.74	0.01	6.12	20.19	7	89.80	PROD. WELL
30-Jul-92	10:15:00 AM	1575.98	29.00	-0.29	16.52	0.89	13.87	0.74	5.74	0.01	6.11	20.20			RECOVERY
30-Jul-92	10:30:00 AM	1590.98	29.01	-0.28	16.57	0.94	13.94	0.81	5.72	-0.01	6.12	20.19			CHANNEL 6
30-Jul-92	10:45:00 AM	1605.98	29.00	-0.29	16.65	1.02	14.01	0.88	5.71	-0.02	6.11	20.20			
30-Jul-92	11:00:00 AM	1620.98	29.00	-0.29	16.69	1.06	14.07	0.94	5.71	-0.02	6.11	20.20	7.1	89.70	0.14
30-Jul-92	11:15:00 AM	1635.98	29.00	-0.29	16.77	1.14	14.14	1.01	5.7	-0.03	6.12	20.19			0.14

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8		
30-Jul-92	11:30:00 AM	1650.98	29.00	-0.29	16.84	1.21	14.21	1.08	5.7	-0.03	6.12	20.19	7.3	89.50	0.14	
30-Jul-92	11:45:00 AM	1665.98	29.00	-0.29	16.95	1.32	14.32	1.19	5.7	-0.03	6.13	20.18	7	89.80	0.14	
	recovery															BEGIN RECOVERY
30-Jul-92	11:59:01 AM	0.00	29.01	0.00	16.98	0.00	14.34	0.00	5.69	0.00	6.14	0.00			0.15	PHASE
30-Jul-92	11:59:02 AM	0.02	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:03 AM	0.03	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:05 AM	0.07	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:06 AM	0.08	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:07 AM	0.10	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:08 AM	0.12	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:09 AM	0.13	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:11 AM	0.17	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:12 AM	0.18	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:13 AM	0.20	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:14 AM	0.22	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:15 AM	0.23	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01	25.3	25.30		
30-Jul-92	11:59:16 AM	0.25	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:17 AM	0.27	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:18 AM	0.28	29.01	0.00	16.97	-0.01	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:19 AM	0.30	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:21 AM	0.33	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:22 AM	0.35	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:23 AM	0.37	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.15	
30-Jul-92	11:59:24 AM	0.38	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.15	
30-Jul-92	11:59:26 AM	0.42	29.01	0.00	16.98	0.00	14.34	0.00	5.69	0.00	6.14	0.00			0.16	
30-Jul-92	11:59:27 AM	0.43	29.01	0.00	16.98	0.00	14.34	0.00	5.69	0.00	6.14	0.00			0.15	
30-Jul-92	11:59:28 AM	0.45	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.15	
30-Jul-92	11:59:29 AM	0.47	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.15	
30-Jul-92	11:59:31 AM	0.50	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.15	
30-Jul-92	11:59:32 AM	0.52	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:33 AM	0.53	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.15	
30-Jul-92	11:59:34 AM	0.55	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.13	-0.01			0.14	
30-Jul-92	11:59:35 AM	0.57	29.01	0.00	16.98	0.00	14.34	0.00	5.69	0.00	6.14	0.00			0.14	
30-Jul-92	11:59:37 AM	0.60	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.14	0.00			0.13	
30-Jul-92	11:59:38 AM	0.62	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.14	0.00			0.14	
30-Jul-92	11:59:39 AM	0.63	29.01	0.00	16.98	0.00	14.34	0.00	5.69	0.00	6.15	0.01			0.13	
30-Jul-92	11:59:40 AM	0.65	29.01	0.00	16.98	0.00	14.34	0.00	5.69	0.00	6.16	0.02			0.15	
30-Jul-92	11:59:42 AM	0.68	29.01	0.00	16.98	0.00	14.33	-0.01	5.69	0.00	6.16	0.02			0.14	
30-Jul-92	11:59:43 AM	0.70	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.17	0.03			0.14	
30-Jul-92	11:59:44 AM	0.72	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.18	0.04			0.14	
30-Jul-92	11:59:45 AM	0.73	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.18	0.04			0.14	
30-Jul-92	11:59:47 AM	0.77	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.19	0.05			0.14	
30-Jul-92	11:59:48 AM	0.78	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.21	0.07			0.15	
30-Jul-92	11:59:49 AM	0.80	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.22	0.08			0.15	
30-Jul-92	11:59:50 AM	0.82	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.69	0.00	6.24	0.10			0.15	
30-Jul-92	11:59:52 AM	0.85	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.25	0.11			0.15	
30-Jul-92	11:59:53 AM	0.87	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.25	0.11			0.14	
30-Jul-92	11:59:54 AM	0.88	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.27	0.13			0.14	
30-Jul-92	11:59:55 AM	0.90	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.28	0.14			0.15	
30-Jul-92	11:59:57 AM	0.93	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.3	0.16			0.15	
30-Jul-92	11:59:58 AM	0.95	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.31	0.17			0.15	
30-Jul-92	11:59:59 AM	0.97	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.32	0.18			0.15	
30-Jul-92	12:00:00 PM	0.98	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.33	0.19	99.3	99.30	0.14	
30-Jul-92	12:00:02 PM	1.02	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.35	0.21			0.14	
30-Jul-92	12:00:03 PM	1.03	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.36	0.22			0.14	
30-Jul-92	12:00:04 PM	1.05	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.38	0.24			0.14	
30-Jul-92	12:00:06 PM	1.07	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.39	0.25			0.15	
30-Jul-92	12:00:08 PM	1.08	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.4	0.26			0.15	
30-Jul-92	12:00:08 PM	1.12	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.68	-0.01	6.42	0.28			0.16	
30-Jul-92	12:00:09 PM	1.13	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.43	0.29			0.15	
30-Jul-92	12:00:10 PM	1.15	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.44	0.30			0.14	
30-Jul-92	12:00:11 PM	1.17	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.46	0.32			0.14	
30-Jul-92	12:00:13 PM	1.20	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.68	-0.01	6.47	0.33			0.15	
30-Jul-92	12:00:14 PM	1.22	29.00	-0.01	16.97	-0.01	14.33	-0.01	5.68	-0.01	6.49	0.35			0.15	

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.6	DRAWDOWN CH.8		
30-Jul-92	12:00:15 PM	1.23	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.68	-0.01	6.5	0.36	97.5	97.50	0.15	
30-Jul-92	12:00:16 PM	1.25	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.68	-0.01	6.51	0.37			0.15	
30-Jul-92	12:00:18 PM	1.28	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.53	0.39			0.15	
30-Jul-92	12:00:19 PM	1.30	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.54	0.40			0.15	
30-Jul-92	12:00:20 PM	1.32	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.56	0.42			0.15	
30-Jul-92	12:00:21 PM	1.33	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.57	0.43			0.15	
30-Jul-92	12:00:23 PM	1.37	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.58	0.44			0.15	
30-Jul-92	12:00:24 PM	1.38	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.59	0.45			0.15	
30-Jul-92	12:00:25 PM	1.40	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.61	0.47			0.15	
30-Jul-92	12:00:26 PM	1.42	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.63	0.49			0.15	
30-Jul-92	12:00:28 PM	1.45	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.63	0.49			0.15	
30-Jul-92	12:00:29 PM	1.47	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.65	0.51			0.15	
30-Jul-92	12:00:30 PM	1.48	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.66	0.52	78.7	78.70	0.15	
30-Jul-92	12:00:31 PM	1.50	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.68	0.54			0.15	
30-Jul-92	12:00:33 PM	1.53	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.69	0.55			0.14	
30-Jul-92	12:00:34 PM	1.55	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.7	0.56			0.15	
30-Jul-92	12:00:35 PM	1.57	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.71	0.57			0.14	
30-Jul-92	12:00:36 PM	1.58	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.73	0.59			0.15	
30-Jul-92	12:00:37 PM	1.60	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.74	0.60			0.14	
30-Jul-92	12:00:39 PM	1.63	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.76	0.62			0.15	
30-Jul-92	12:00:40 PM	1.65	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.77	0.63			0.16	
30-Jul-92	12:00:41 PM	1.67	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.78	0.64			0.15	
30-Jul-92	12:00:42 PM	1.68	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.8	0.66			0.15	
30-Jul-92	12:00:44 PM	1.72	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.81	0.67			0.15	
30-Jul-92	12:00:45 PM	1.73	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.82	0.68	61.5	61.50	0.15	
30-Jul-92	12:00:46 PM	1.75	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.83	0.69			0.15	
30-Jul-92	12:00:47 PM	1.77	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.67	-0.02	6.85	0.71			0.15	
30-Jul-92	12:00:49 PM	1.80	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.86	0.72			0.15	
30-Jul-92	12:00:50 PM	1.82	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.88	0.74			0.15	
30-Jul-92	12:00:51 PM	1.83	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.89	0.75			0.15	
30-Jul-92	12:00:52 PM	1.85	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.67	-0.02	6.9	0.76			0.15	
30-Jul-92	12:00:57 PM	1.93	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.67	-0.02	6.95	0.81			0.15	
30-Jul-92	12:01:02 PM	2.02	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.67	-0.02	7	0.86			0.15	
30-Jul-92	12:01:07 PM	2.10	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.67	-0.02	7.05	0.91			0.15	
30-Jul-92	12:01:12 PM	2.18	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.66	-0.03	7.1	0.96			0.15	
30-Jul-92	12:01:15 PM	2.24	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.66	-0.03	7.1	0.96	88	88.00		
30-Jul-92	12:01:17 PM	2.27	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.66	-0.03	7.15	1.01			0.15	
30-Jul-92	12:01:22 PM	2.35	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.66	-0.03	7.2	1.06			0.15	
30-Jul-92	12:01:27 PM	2.43	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.66	-0.03	7.25	1.11			0.15	
30-Jul-92	12:01:30 PM	2.48	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.66	-0.03	7.25	1.11	87.3	87.30		
30-Jul-92	12:01:32 PM	2.52	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.66	-0.03	7.29	1.15			0.15	
30-Jul-92	12:01:37 PM	2.60	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.66	-0.03	7.34	1.20			0.15	
30-Jul-92	12:01:42 PM	2.68	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.66	-0.03	7.39	1.25			0.15	
30-Jul-92	12:01:47 PM	2.77	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.66	-0.03	7.43	1.29			0.15	
30-Jul-92	12:01:52 PM	2.85	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.66	-0.03	7.48	1.34			0.15	
30-Jul-92	12:01:57 PM	2.93	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	7.53	1.39			0.15	
30-Jul-92	12:02:02 PM	3.02	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.65	-0.04	7.57	1.43	71.3	71.30	0.46	-TRANSDUCER
30-Jul-92	12:02:07 PM	3.10	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.65	-0.04	7.61	1.47	71.5	71.50	0.74	BEGINS
30-Jul-92	12:02:12 PM	3.18	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.65	-0.04	7.66	1.52	71.8	71.80	1.02	RECORDING
30-Jul-92	12:02:17 PM	3.27	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.65	-0.04	7.7	1.56	72.1	72.10	1.31	
30-Jul-92	12:02:22 PM	3.35	29.00	-0.01	16.95	-0.03	14.32	-0.02	5.65	-0.04	7.74	1.60	72.4	72.40	1.58	
30-Jul-92	12:02:32 PM	3.52	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	7.83	1.69	72.8	72.80	2.05	
30-Jul-92	12:02:42 PM	3.68	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	7.91	1.77	73.3	73.30	2.53	
30-Jul-92	12:02:52 PM	3.85	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	7.99	1.85	73.8	73.80	2.97	
30-Jul-92	12:03:02 PM	4.02	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.07	1.93	74.2	74.20	3.37	
30-Jul-92	12:03:12 PM	4.18	29.00	-0.01	16.96	-0.02	14.32	-0.02	5.65	-0.04	8.15	2.01	74.6	74.60	3.76	
30-Jul-92	12:03:22 PM	4.35	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.23	2.09	74.9	74.90	4.13	
30-Jul-92	12:03:32 PM	4.52	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.3	2.16	75.3	75.30	4.52	
30-Jul-92	12:03:42 PM	4.68	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.38	2.24	75.6	75.60	4.83	
30-Jul-92	12:03:52 PM	4.85	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.45	2.31	75.9	75.90	5.13	
30-Jul-92	12:04:02 PM	5.02	28.99	-0.02	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.53	2.39	76.2	76.20	5.43	
30-Jul-92	12:04:12 PM	5.18	28.99	-0.02	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.6	2.46	76.5	76.50	5.71	
30-Jul-92	12:04:22 PM	5.35	29.00	-0.01	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.67	2.53	76.8	76.80	5.99	
30-Jul-92	12:04:32 PM	5.52	28.99	-0.02	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.75	2.61	77	77.00	6.25	

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.6	DRAWDOWN CH.6	
30-Jul-92	12:04:42 PM	5.68	28.99	-0.02	16.96	-0.02	14.33	-0.01	5.65	-0.04	8.81	2.67	77.3	77.30	6.5
30-Jul-92	12:04:52 PM	5.85	29.00	-0.01	16.97	-0.01	14.34	0.00	5.65	-0.04	8.88	2.74	77.5	77.50	6.74
30-Jul-92	12:05:02 PM	6.02	28.99	-0.02	16.98	0.00	14.33	-0.01	5.65	-0.04	8.94	2.80	77.8	77.80	6.96
30-Jul-92	12:05:12 PM	6.18	29.00	-0.01	16.98	0.00	14.33	-0.01	5.65	-0.04	9.01	2.87	78	78.00	7.19
30-Jul-92	12:05:22 PM	6.35	28.99	-0.02	16.98	0.00	14.34	0.00	5.64	-0.05	9.08	2.94	78.2	78.20	7.4
30-Jul-92	12:05:52 PM	6.85	28.99	-0.02	16.98	0.00	14.34	0.00	5.64	-0.05	9.27	3.13	78.9	78.90	8.08
30-Jul-92	12:06:22 PM	7.35	28.99	-0.02	16.98	0.00	14.34	0.00	5.64	-0.05	9.45	3.31	79.4	79.40	8.6
30-Jul-92	12:06:52 PM	7.85	28.99	-0.02	16.99	0.01	14.35	0.01	5.64	-0.05	9.64	3.50	79.8	79.80	9.05
30-Jul-92	12:07:22 PM	8.35	28.99	-0.02	16.99	0.01	14.35	0.01	5.64	-0.05	9.82	3.68	80.4	80.40	9.57
30-Jul-92	12:07:52 PM	8.85	28.99	-0.02	16.99	0.01	14.35	0.01	5.64	-0.05	9.98	3.84	80.8	80.80	9.99
30-Jul-92	12:08:22 PM	9.35	28.99	-0.02	16.99	0.01	14.35	0.01	5.64	-0.05	10.15	4.01	81.2	81.20	10.38
30-Jul-92	12:08:52 PM	9.85	28.99	-0.02	17	0.02	14.36	0.02	5.64	-0.05	10.31	4.17	81.5	81.50	10.77
30-Jul-92	12:09:22 PM	10.35	28.99	-0.02	17	0.02	14.36	0.02	5.66	-0.04	10.47	4.33	81.9	81.90	11.12
30-Jul-92	12:09:52 PM	10.85	28.99	-0.02	17.01	0.03	14.37	0.03	5.65	-0.04	10.62	4.48	82.3	82.30	11.46
30-Jul-92	12:10:22 PM	11.35	28.99	-0.02	17.01	0.03	14.37	0.03	5.65	-0.04	10.77	4.63	82.6	82.60	11.78
30-Jul-92	12:10:52 PM	11.85	28.99	-0.02	17.01	0.03	14.37	0.03	5.65	-0.04	10.92	4.78	83.1	83.10	12.08
30-Jul-92	12:11:22 PM	12.35	28.99	-0.02	17.01	0.03	14.38	0.04	5.65	-0.04	11.05	4.91	84.2	84.20	12.38
30-Jul-92	12:11:52 PM	12.85	28.99	-0.02	17.01	0.03	14.38	0.04	5.65	-0.04	11.19	5.05	84.5	84.50	12.66
30-Jul-92	12:12:22 PM	13.35	28.98	-0.03	17.01	0.03	14.38	0.04	5.65	-0.04	11.32	5.18	84.7	84.70	12.91
30-Jul-92	12:12:52 PM	13.85	28.98	-0.03	17.01	0.03	14.38	0.04	5.65	-0.04	11.45	5.31	85	85.00	13.17
30-Jul-92	12:13:22 PM	14.35	28.98	-0.03	17.02	0.04	14.38	0.04	5.65	-0.04	11.58	5.44	85.2	85.20	13.42
30-Jul-92	12:13:52 PM	14.85	28.98	-0.03	17.02	0.04	14.39	0.05	5.65	-0.04	11.7	5.56	85.4	85.40	13.65
30-Jul-92	12:14:22 PM	15.35	28.98	-0.03	17.02	0.04	14.39	0.05	5.65	-0.04	11.82	5.68	85.7	85.70	13.87
30-Jul-92	12:14:52 PM	15.85	28.98	-0.03	17.03	0.05	14.39	0.05	5.65	-0.04	11.95	5.81	85.9	85.90	14.08
30-Jul-92	12:15:22 PM	16.35	28.98	-0.03	17.03	0.05	14.39	0.05	5.65	-0.04	12.07	5.93	86.1	86.10	14.31
30-Jul-92	12:16:22 PM	17.35	28.98	-0.03	17.04	0.06	14.39	0.05	5.65	-0.04	12.29	6.15	86.5	86.50	14.7
30-Jul-92	12:17:22 PM	18.35	28.98	-0.03	17.04	0.06	14.4	0.06	5.65	-0.04	12.51	6.37	86.9	86.90	15.06
30-Jul-92	12:18:22 PM	19.35	28.98	-0.03	17.05	0.07	14.41	0.07	5.65	-0.04	12.72	6.58	87.2	87.20	15.41
30-Jul-92	12:19:22 PM	20.35	28.99	-0.02	17.06	0.08	14.41	0.07	5.66	-0.03	12.91	6.77	87.5	87.50	15.73
30-Jul-92	12:20:22 PM	21.35	28.99	-0.02	17.06	0.08	14.42	0.08	5.66	-0.03	13.11	6.97	87.9	87.90	16.1
30-Jul-92	12:21:22 PM	22.35	28.99	-0.02	17.07	0.09	14.42	0.08	5.66	-0.03	13.3	7.16	88.2	88.20	16.38
30-Jul-92	12:22:22 PM	23.35	28.99	-0.02	17.08	0.10	14.43	0.09	5.66	-0.03	13.49	7.35	88.5	88.50	16.66
30-Jul-92	12:23:22 PM	24.35	28.99	-0.02	17.08	0.10	14.44	0.10	5.66	-0.03	13.66	7.52	88.7	88.70	16.92
30-Jul-92	12:24:22 PM	25.35	28.99	-0.02	17.08	0.10	14.44	0.10	5.67	-0.02	13.82	7.68	89	89.00	17.17
30-Jul-92	12:25:22 PM	26.35	29.00	-0.01	17.08	0.10	14.44	0.10	5.67	-0.02	13.99	7.85	89.2	89.20	17.41
30-Jul-92	12:26:22 PM	27.35	28.99	-0.02	17.08	0.10	14.44	0.10	5.67	-0.02	14.14	8.00	89.4	89.40	17.65
30-Jul-92	12:27:22 PM	28.35	28.99	-0.02	17.09	0.11	14.45	0.11	5.67	-0.02	14.3	8.16	89.7	89.70	17.86
30-Jul-92	12:28:22 PM	29.35	28.99	-0.02	17.09	0.11	14.45	0.11	5.67	-0.02	14.45	8.31	89.9	89.90	18.08
30-Jul-92	12:29:22 PM	30.35	28.99	-0.02	17.1	0.12	14.45	0.11	5.67	-0.02	14.59	8.45	90.1	90.10	18.28
30-Jul-92	12:30:22 PM	31.35	28.99	-0.02	17.11	0.13	14.46	0.12	5.67	-0.02	14.73	8.59	90.3	90.30	18.48
30-Jul-92	12:33:22 PM	34.35	28.99	-0.02	17.12	0.14	14.47	0.13	5.67	-0.02	15.13	8.99	90.8	90.80	19.02
30-Jul-92	12:36:22 PM	37.35	28.99	-0.02	17.14	0.16	14.48	0.14	5.67	-0.02	15.5	9.36	91.3	91.30	19.54
30-Jul-92	12:39:22 PM	40.35	28.99	-0.02	17.14	0.16	14.5	0.16	5.67	-0.02	15.85	9.71	91.8	91.80	19.98
30-Jul-92	12:42:22 PM	43.35	28.99	-0.02	17.15	0.17	14.51	0.17	5.68	-0.01	16.17	10.03	92.2	92.20	20.41
30-Jul-92	12:45:22 PM	46.35	29.00	-0.01	17.16	0.18	14.51	0.17	5.69	-0.01	16.48	10.34	92.6	92.60	20.79
30-Jul-92	12:48:22 PM	49.35	29.00	-0.01	17.17	0.19	14.52	0.18	5.68	-0.01	16.76	10.62	93	93.00	21.16
30-Jul-92	12:51:22 PM	52.35	29.00	-0.01	17.19	0.21	14.53	0.19	5.68	-0.01	17.03	10.89	93.3	93.30	21.5
30-Jul-92	12:54:22 PM	55.35	29.00	-0.01	17.21	0.23	14.56	0.22	5.68	-0.01	17.28	11.14	93.6	93.60	21.82
30-Jul-92	12:57:22 PM	58.35	29.00	-0.01	17.21	0.23	14.57	0.23	5.68	-0.01	17.52	11.38	93.9	93.90	22.11
30-Jul-92	01:00:22 PM	61.35	29.00	-0.01	17.23	0.25	14.58	0.24	5.68	-0.01	17.75	11.61	94.2	94.20	22.39
30-Jul-92	01:05:22 PM	66.35	29.00	-0.01	17.25	0.27	14.6	0.26	5.68	-0.01	18.1	11.96	94.6	94.60	22.82
30-Jul-92	01:10:22 PM	71.35	29.00	-0.01	17.27	0.29	14.62	0.28	5.69	0.00	18.43	12.29	95	95.00	23.22
30-Jul-92	01:15:22 PM	76.35	29.01	0.00	17.29	0.31	14.64	0.30	5.69	0.00	18.74	12.60	95.4	95.40	23.59
30-Jul-92	01:20:22 PM	81.35	29.01	0.00	17.31	0.33	14.65	0.31	5.69	0.00	19.02	12.88	95.7	95.70	23.93
30-Jul-92	01:25:22 PM	86.35	29.01	0.00	17.33	0.35	14.67	0.33	5.69	0.00	19.29	13.15	96	96.00	24.25
30-Jul-92	01:30:22 PM	91.35	29.02	0.01	17.33	0.35	14.68	0.34	5.69	0.00	19.54	13.40	96.3	96.30	24.54
30-Jul-92	01:35:22 PM	96.35	29.03	0.02	17.35	0.37	14.71	0.37	5.7	0.01	19.77	13.63	96.6	96.60	24.81
30-Jul-92	01:40:22 PM	101.35	29.04	0.03	17.37	0.39	14.72	0.38	5.7	0.01	20	13.86	96.9	96.90	25.07
30-Jul-92	01:45:22 PM	106.35	29.04	0.03	17.38	0.40	14.73	0.39	5.7	0.01	20.21	14.07	97.1	97.10	25.31
30-Jul-92	01:50:22 PM	111.35	29.04	0.03	17.39	0.41	14.74	0.40	5.71	0.02	20.4	14.26	97.3	97.30	25.54
30-Jul-92	02:00:22 PM	121.35	29.05	0.04	17.4	0.42	14.76	0.42	5.72	0.03	20.76	14.62	97.8	97.80	26.06
30-Jul-92	02:10:22 PM	131.35	29.06	0.05	17.41	0.43	14.77	0.43	5.73	0.04	21.09	14.95	98.1	98.10	26.33
30-Jul-92	02:20:22 PM	141.35	29.06	0.05	17.44	0.46	14.8	0.46	5.74	0.05	21.38	15.24	98.5	98.50	26.67
30-Jul-92	02:30:22 PM	151.35	29.06	0.05	17.47	0.49	14.83	0.49	5.74	0.05	21.65	15.51	98.8	98.80	26.98

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8	
30-Jul-92	02:40:22 PM	161.35	29.08	0.07	17.5	0.52	14.88	0.52	5.75	0.06	21.91	15.77	99.1	99.10	27.27
30-Jul-92	02:50:22 PM	171.35	29.10	0.09	17.53	0.55	14.89	0.55	5.76	0.06	22.14	16.00	99.3	99.30	27.54
30-Jul-92	03:00:22 PM	181.35	29.11	0.10	17.55	0.57	14.91	0.57	5.75	0.06	22.36	16.22	99.6	99.60	27.78
30-Jul-92	03:10:22 PM	191.35	29.12	0.11	17.57	0.59	14.92	0.58	5.74	0.05	22.56	16.42	99.8	99.80	28.01
30-Jul-92	03:20:22 PM	201.35	29.12	0.11	17.59	0.61	14.95	0.61	5.74	0.05	22.75	16.61	100	100.00	28.23
30-Jul-92	03:30:22 PM	211.35	29.13	0.12	17.59	0.61	14.95	0.61	5.74	0.05	22.92	16.78	100.2	100.20	28.42
30-Jul-92	03:40:22 PM	221.35	29.13	0.12	17.58	0.60	14.94	0.60	5.74	0.05	23.08	16.94	100.4	100.40	28.6
30-Jul-92	03:50:00 PM	230.98	29.13	0.12	17.58	0.60	14.94	0.60	5.74	0.05	23.08	16.94		*0.00*	
30-Jul-92	04:02:00 PM	242.98	29.05	0.04	17.5	0.52	14.72	0.38	5.75	0.06	23.33	17.19	100.6	100.60	28.83
30-Jul-92	04:17:00 PM	257.98	29.06	0.07	17.48	0.50	14.83	0.49	5.75	0.06	23.52	17.38	100.9	100.90	29.1
30-Jul-92	04:32:00 PM	272.98	29.12	0.11	17.51	0.53	14.86	0.52	5.75	0.06	23.7	17.56	101.1	101.10	29.33
30-Jul-92	04:47:00 PM	287.98	29.13	0.12	17.51	0.53	14.87	0.53	5.75	0.06	23.87	17.73	101.3	101.30	29.52
30-Jul-92	05:02:00 PM	302.98	29.15	0.14	17.47	0.49	14.83	0.49	5.75	0.06	24.03	17.89	101.5	101.50	29.7
30-Jul-92	05:17:00 PM	317.98	29.16	0.15	17.44	0.46	14.8	0.46	5.75	0.06	24.16	18.02	101.6	101.60	29.83
30-Jul-92	05:32:00 PM	332.98	29.17	0.16	17.37	0.39	14.74	0.40	5.75	0.06	24.27	18.13	101.8	101.80	29.95
30-Jul-92	05:47:00 PM	347.98	29.16	0.17	17.39	0.41	14.76	0.41	5.75	0.06	24.38	18.24	101.9	101.90	30.08
30-Jul-92	06:02:00 PM	362.98	29.19	0.18	17.48	0.50	14.83	0.49	5.74	0.05	24.5	18.36	102	102.00	30.21
30-Jul-92	06:17:00 PM	377.98	29.19	0.18	17.5	0.52	14.84	0.50	5.74	0.06	24.61	18.47	102.1	102.10	30.34
30-Jul-92	06:32:00 PM	392.98	29.19	0.18	17.5	0.52	14.84	0.50	5.73	0.04	24.72	18.58	102.3	102.30	30.46
30-Jul-92	06:47:00 PM	407.98	29.19	0.18	17.5	0.52	14.83	0.49	5.73	0.04	24.82	18.68	102.4	102.40	30.57
30-Jul-92	07:02:00 PM	422.98	29.19	0.18	17.49	0.51	14.83	0.49	5.73	0.04	24.92	18.78	102.5	102.50	30.67
30-Jul-92	07:17:00 PM	437.98	29.19	0.18	17.46	0.48	14.81	0.47	5.74	0.05	25.01	18.87	102.6	102.60	30.77
30-Jul-92	07:32:00 PM	452.98	29.19	0.18	17.42	0.44	14.78	0.44	5.73	0.04	25.09	18.95	102.7	102.70	30.86
30-Jul-92	07:47:00 PM	467.98	29.19	0.18	17.49	0.51	14.83	0.49	5.74	0.05	25.17	19.03	102.7	102.70	30.94
30-Jul-92	08:02:00 PM	482.98	29.19	0.18	17.39	0.41	14.76	0.42	5.74	0.05	25.23	19.09	102.8	102.80	31.01
30-Jul-92	08:17:00 PM	497.98	29.18	0.17	17.38	0.40	14.77	0.43	5.74	0.05	25.28	19.14	102.8	102.80	31.05
30-Jul-92	08:32:00 PM	512.98	29.18	0.17	17.35	0.37	14.75	0.41	5.74	0.05	25.34	19.20	102.9	102.90	31.11
30-Jul-92	08:47:00 PM	527.98	29.18	0.17	17.4	0.42	14.78	0.44	5.74	0.05	25.38	19.24	103	103.00	31.15
30-Jul-92	09:02:00 PM	542.98	29.16	0.15	17.44	0.46	14.83	0.49	5.74	0.05	25.42	19.28	103	103.00	31.19
30-Jul-92	09:17:00 PM	557.98	29.16	0.15	17.52	0.54	14.91	0.57	5.74	0.05	25.48	19.34	103.1	103.10	31.26
30-Jul-92	09:32:00 PM	572.98	29.16	0.15	17.61	0.63	14.97	0.63	5.74	0.05	25.54	19.40	103.1	103.10	31.33
30-Jul-92	09:47:00 PM	587.98	29.15	0.14	17.64	0.66	14.99	0.65	5.74	0.05	25.6	19.46	103.2	103.20	31.39
30-Jul-92	10:02:00 PM	602.98	29.15	0.14	17.63	0.65	14.98	0.64	5.74	0.05	25.65	19.51	103.2	103.20	31.45
30-Jul-92	10:17:00 PM	617.98	29.13	0.12	17.62	0.64	14.96	0.62	5.74	0.05	25.69	19.55	103.3	103.30	31.5
30-Jul-92	10:32:00 PM	632.98	29.12	0.11	17.61	0.63	14.96	0.62	5.74	0.05	25.73	19.59	103.4	103.40	31.55
30-Jul-92	10:47:00 PM	647.98	29.12	0.11	17.61	0.63	14.96	0.62	5.74	0.05	25.78	19.64	103.4	103.40	31.59
30-Jul-92	11:02:00 PM	662.98	29.12	0.11	17.6	0.62	14.96	0.62	5.75	0.06	25.82	19.68	103.4	103.40	31.63
30-Jul-92	11:17:00 PM	677.98	29.12	0.11	17.65	0.67	15.01	0.67	5.75	0.06	25.86	19.72	103.5	103.50	31.68
30-Jul-92	11:32:00 PM	692.98	29.12	0.11	17.7	0.72	15.05	0.71	5.76	0.07	25.89	19.75	103.5	103.50	31.71
30-Jul-92	11:32:00 PM	692.98	29.12	0.11	17.74	0.76	15.09	0.75	5.76	0.07	25.92	19.78	103.6	103.60	31.75
30-Jul-92	11:47:00 PM	707.98		-29.01		-16.98	15.09	0.75	5.76	0.07	25.92	19.78	103.6	103.60	
31-Jul-92	12:02:00 AM	722.98	29.12	0.11	17.76	0.78	15.11	0.77	5.76	0.07	25.96	19.82	103.6	103.60	31.79
31-Jul-92	12:17:00 AM	737.98	29.11	0.10	17.78	0.80	15.13	0.79	5.76	0.07	25.99	19.85	103.6	103.60	31.82
31-Jul-92	12:32:00 AM	752.98	29.11	0.10	17.78	0.80	15.15	0.81	5.76	0.07	26.02	19.88	103.6	103.60	31.85
31-Jul-92	12:47:00 AM	767.98	29.12	0.11	17.78	0.80	15.13	0.79	5.76	0.07	26.05	19.91	103.7	103.70	31.88
31-Jul-92	01:02:00 AM	782.98	29.12	0.11	17.75	0.77	15.11	0.77	5.77	0.08	26.08	19.94	103.7	103.70	31.91
31-Jul-92	01:17:00 AM	797.98	29.12	0.11	17.75	0.77	15.13	0.79	5.77	0.08	26.11	19.97	103.7	103.70	31.94
31-Jul-92	01:32:00 AM	812.98	29.12	0.11	17.75	0.77	15.13	0.79	5.78	0.09	26.15	20.01	103.8	103.80	31.98
31-Jul-92	01:47:00 AM	827.98	29.13	0.12	17.75	0.77	15.13	0.79	5.78	0.09	26.18	20.04	103.8	103.80	32.01
31-Jul-92	02:02:00 AM	842.98	29.14	0.13	17.65	0.67	15.09	0.75	5.78	0.09	26.21	20.07	103.8	103.80	32.04
31-Jul-92	02:17:00 AM	857.98	29.14	0.13	17.65	0.67	15.06	0.72	5.79	0.10	26.24	20.10	103.9	103.90	32.07
31-Jul-92	02:32:00 AM	872.98	29.16	0.15	17.69	0.71	15.09	0.76	5.79	0.10	26.26	20.12	103.9	103.90	32.1
31-Jul-92	02:47:00 AM	887.98	29.16	0.15	17.62	0.64	15.03	0.69	5.79	0.10	26.29	20.15	103.9	103.90	32.13
31-Jul-92	03:02:00 AM	902.98	29.17	0.16	17.55	0.57	14.96	0.62	5.79	0.10	26.31	20.17	103.9	103.90	32.14
31-Jul-92	03:17:00 AM	917.98	29.18	0.17	17.49	0.51	14.91	0.57	5.79	0.10	26.34	20.20	104	104.00	32.18
31-Jul-92	03:32:00 AM	932.98	29.19	0.18	17.44	0.46	14.87	0.53	5.8	0.11	26.37	20.23	104	104.00	32.2
31-Jul-92	03:47:00 AM	947.98	29.20	0.19	17.4	0.42	14.86	0.52	5.8	0.11	26.39	20.25	104	104.00	32.23
31-Jul-92	04:02:00 AM	962.98	29.21	0.20	17.38	0.40	14.84	0.50	5.8	0.11	26.42	20.28	104.1	104.10	32.26
31-Jul-92	04:17:00 AM	977.98	29.22	0.21	17.4	0.42	14.86	0.52	5.8	0.11	26.44	20.30	104.1	104.10	32.28
31-Jul-92	04:32:00 AM	992.98	29.22	0.21	17.38	0.40	14.84	0.50	5.8	0.11	26.46	20.32	104.1	104.10	32.3
31-Jul-92	04:47:00 AM	1007.98	29.24	0.23	17.35	0.37	14.83	0.49	5.8	0.11	26.49	20.35	104.1	104.10	32.33
31-Jul-92	05:02:00 AM	1022.98	29.24	0.23	17.3	0.32	14.79	0.45	5.8	0.11	26.5	20.36	104.2	104.20	32.35
31-Jul-92	05:17:00 AM	1037.98	29.25	0.24	17.32	0.34	14.81	0.47	5.8	0.11	26.53	20.39	104.2	104.20	32.37
31-Jul-92	05:32:00 AM	1052.98	29.25	0.24	17.33	0.35	14.81	0.47	5.8	0.11	26.55	20.41	104.2	104.20	32.39

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.6	DRAWDOWN CH.8	
31-Jul-92	05:47:00 AM	1067.98	29.26	0.25	17.31	0.33	14.79	0.45	5.8	0.11	26.56	20.42	104.2	104.20	32.41
31-Jul-92	06:02:00 AM	1082.98	29.26	0.25	17.31	0.33	14.77	0.43	5.8	0.11	26.59	20.45	104.2	104.20	32.43
31-Jul-92	06:17:00 AM	1097.98	29.26	0.25	17.34	0.36	14.78	0.44	5.79	0.10	26.6	20.46	104.2	104.20	32.45
31-Jul-92	06:32:00 AM	1112.98	29.26	0.25	17.35	0.37	14.78	0.44	5.79	0.10	26.62	20.48	104.3	104.30	32.46
31-Jul-92	06:47:00 AM	1127.98	29.26	0.25	17.4	0.42	14.83	0.49	5.78	0.09	26.63	20.49	104.3	104.30	32.47
31-Jul-92	07:02:00 AM	1142.98	29.26	0.25	17.44	0.46	14.86	0.52	5.78	0.09	26.64	20.50	104.3	104.30	32.47
31-Jul-92	07:17:00 AM	1157.98	29.26	0.25	17.47	0.49	14.88	0.54	5.78	0.09	26.66	20.52	104.3	104.30	32.47
31-Jul-92	07:32:00 AM	1172.98	29.26	0.25	17.5	0.52	14.9	0.56	5.78	0.09	26.67	20.53	104.3	104.30	32.47
31-Jul-92	07:47:00 AM	1187.98	29.25	0.24	17.53	0.55	14.93	0.59	5.77	0.08	26.68	20.54	104.3	104.30	32.48
31-Jul-92	08:02:00 AM	1202.98	29.25	0.24	17.57	0.59	14.96	0.62	5.77	0.08	26.69	20.55	104.3	104.30	32.48
31-Jul-92	08:17:00 AM	1217.98	29.25	0.24	17.56	0.58	14.95	0.61	5.77	0.08	26.69	20.55	104.3	104.30	32.48
31-Jul-92	08:32:00 AM	1232.98	29.25	0.24	17.58	0.60	14.98	0.62	5.77	0.08	26.7	20.56	104.3	104.30	32.48
31-Jul-92	08:47:00 AM	1247.98	29.25	0.24	17.61	0.63	15.01	0.67	5.77	0.09	26.71	20.57	104.3	104.30	32.48
31-Jul-92	09:02:00 AM	1262.98	29.24	0.23	17.67	0.69	15.05	0.71	5.77	0.08	26.72	20.58	104.3	104.30	32.48
31-Jul-92	09:17:00 AM	1277.98	29.24	0.23	17.73	0.75	15.11	0.77	5.76	0.09	26.73	20.59	104.3	104.30	32.49
31-Jul-92	09:32:00 AM	1292.98	29.25	0.24	17.79	0.81	15.17	0.83	5.77	0.08	26.74	20.60	104.3	104.30	32.49
31-Jul-92	09:47:00 AM	1307.98	29.24	0.23	17.83	0.85	15.21	0.87	5.76	0.07	26.74	20.60	104.3	104.30	32.49
31-Jul-92	10:02:00 AM	1322.98	29.23	0.22	17.87	0.89	15.25	0.91	5.76	0.07	26.75	20.61	104.3	104.30	32.5
31-Jul-92	10:17:00 AM	1337.98	29.23	0.22	17.88	0.90	15.27	0.93	5.75	0.06	26.75	20.61	104.3	104.30	32.5
31-Jul-92	10:32:00 AM	1352.98	29.23	0.22	17.89	0.91	15.28	0.94	5.75	0.06	26.75	20.61	104.3	104.30	32.5
31-Jul-92	10:47:00 AM	1367.98	29.23	0.22	17.97	0.99	15.34	1.00	5.74	0.05	26.76	20.62	104.3	104.30	32.5
31-Jul-92	11:02:00 AM	1382.98	29.22	0.21	18.01	1.03	15.39	1.05	5.74	0.05	26.76	20.62	104.3	104.30	32.5
31-Jul-92	11:17:00 AM	1397.98	29.22	0.21	18.04	1.06	15.41	1.07	5.73	0.04	26.77	20.63	104.3	104.30	32.5
31-Jul-92	11:32:00 AM	1412.98	29.21	0.20	18.04	1.06	15.41	1.07	5.72	0.03	26.77	20.63	104.3	104.30	32.5
31-Jul-92	11:47:00 AM	1427.98	29.22	0.21	18.04	1.06	15.41	1.07	5.71	0.02	26.78	20.64	104.3	104.30	32.51
31-Jul-92	12:02:00 PM	1442.98	29.21	0.20	18.03	1.05	15.39	1.05	5.71	0.02	26.78	20.64	104.3	104.30	32.51
31-Jul-92	12:17:00 PM	1457.98	29.21	0.20	18.04	1.06	15.41	1.07	5.7	0.01	26.79	20.65	104.3	104.30	32.51
31-Jul-92	12:32:00 PM	1472.98	29.21	0.20	18.05	1.07	15.41	1.07	5.7	0.01	26.8	20.66	104.3	104.30	32.51
31-Jul-92	12:47:00 PM	1487.98	29.22	0.21	18.04	1.06	15.41	1.07	5.69	0.00	26.81	20.67	104.3	104.30	32.51
31-Jul-92	01:02:00 PM	1502.98	29.22	0.21	18.04	1.06	15.39	1.05	5.69	0.00	26.82	20.68	104.3	104.30	32.51
31-Jul-92	01:17:00 PM	1517.98	29.23	0.22	18.04	1.06	15.4	1.06	5.68	-0.01	26.82	20.68	104.3	104.30	32.51
31-Jul-92	01:32:00 PM	1532.98	29.23	0.22	18.05	1.07	15.41	1.07	5.68	-0.01	26.82	20.68	104.3	104.30	32.51
31-Jul-92	01:47:00 PM	1547.98	29.24	0.23	18.03	1.05	15.4	1.06	5.68	-0.01	26.83	20.69	104.3	104.30	32.51
31-Jul-92	02:02:00 PM	1562.98	29.24	0.23	18.02	1.04	15.39	1.05	5.67	-0.02	26.84	20.70	104.3	104.30	32.51
31-Jul-92	02:17:00 PM	1577.98	29.25	0.24	18.02	1.04	15.38	1.04	5.67	-0.02	26.85	20.71	104.3	104.30	32.51
31-Jul-92	02:32:00 PM	1592.98	29.25	0.24	18.02	1.04	15.39	1.05	5.67	-0.02	26.87	20.73	104.3	104.30	32.51
31-Jul-92	02:47:00 PM	1607.98	29.26	0.25	18	1.02	15.37	1.03	5.67	-0.02	26.88	20.74	104.3	104.30	32.51
31-Jul-92	03:02:00 PM	1622.98	29.27	0.26	17.98	1.00	15.35	1.01	5.67	-0.02	26.88	20.74	104.3	104.30	32.52
31-Jul-92	03:17:00 PM	1637.98	29.28	0.27	17.97	0.99	15.35	1.01	5.67	-0.02	26.89	20.75	104.3	104.30	32.52
31-Jul-92	03:32:00 PM	1652.98	29.29	0.28	17.97	0.99	15.35	1.01	5.66	-0.03	26.9	20.76	104.3	104.30	32.52
31-Jul-92	03:47:00 PM	1667.98	29.30	0.29	17.97	0.99	15.35	1.01	5.66	-0.03	26.92	20.78	104.3	104.30	32.52
31-Jul-92	04:02:00 PM	1682.98	29.31	0.30	17.97	0.99	15.35	1.01	5.66	-0.03	26.93	20.78	104.3	104.30	32.52
31-Jul-92	04:17:00 PM	1697.98	29.32	0.31	17.98	1.00	15.35	1.01	5.65	-0.04	26.94	20.80	104.3	104.30	32.52
31-Jul-92	04:32:00 PM	1712.98	29.32	0.31	17.98	1.00	15.35	1.01	5.65	-0.04	26.95	20.81	104.3	104.30	32.52
31-Jul-92	04:47:00 PM	1727.98	29.32	0.31	17.98	1.00	15.35	1.01	5.65	-0.04	26.95	20.81	104.3	104.30	32.52
31-Jul-92	05:02:00 PM	1742.98	29.32	0.31	18	1.02	15.35	1.01	5.65	-0.04	26.96	20.82	104.3	104.30	32.52
31-Jul-92	05:17:00 PM	1757.98	29.33	0.32	17.99	1.01	15.35	1.01	5.64	-0.05	26.97	20.83	104.3	104.30	32.52
31-Jul-92	05:32:00 PM	1772.98	29.33	0.32	17.99	1.01	15.35	1.01	5.64	-0.05	26.98	20.84	104.3	104.30	32.52
31-Jul-92	05:47:00 PM	1787.98	29.34	0.33	18	1.02	15.35	1.01	5.64	-0.05	26.99	20.85	104.3	104.30	32.52
31-Jul-92	06:02:00 PM	1802.98	29.34	0.33	17.98	1.00	15.34	1.00	5.64	-0.05	27	20.86	104.3	104.30	32.52
31-Jul-92	06:17:00 PM	1817.98	29.35	0.34	17.97	0.99	15.32	0.98	5.65	-0.04	27.01	20.87	104.3	104.30	32.52
31-Jul-92	06:32:00 PM	1832.98	29.36	0.35	17.92	0.94	15.28	0.94	5.65	-0.04	27.02	20.88	104.3	104.30	32.52
31-Jul-92	06:47:00 PM	1847.98	29.36	0.35	17.85	0.87	15.22	0.88	5.64	-0.05	27.03	20.89	104.3	104.30	32.52
31-Jul-92	07:02:00 PM	1862.98	29.36	0.35	17.82	0.84	15.19	0.85	5.65	-0.04	27.03	20.89	104.3	104.30	32.52
31-Jul-92	07:17:00 PM	1877.98	29.36	0.35	17.79	0.81	15.16	0.82	5.65	-0.04	27.04	20.90	104.3	104.30	32.52
31-Jul-92	07:32:00 PM	1892.98	29.36	0.35	17.79	0.81	15.16	0.82	5.65	-0.04	27.04	20.90	104.3	104.30	32.52
31-Jul-92	07:47:00 PM	1907.98	29.36	0.35	17.79	0.81	15.16	0.82	5.65	-0.04	27.05	20.91	104.3	104.30	32.52
31-Jul-92	08:02:00 PM	1922.98	29.36	0.35	17.79	0.81	15.16	0.82	5.65	-0.04	27.05	20.91	104.3	104.30	32.52
31-Jul-92	08:17:00 PM	1937.98	29.36	0.35	17.82	0.84	15.19	0.85	5.65	-0.04	27.06	20.92	104.3	104.30	32.52
31-Jul-92	08:32:00 PM	1952.98	29.35	0.34	17.85	0.87	15.22	0.88	5.65	-0.04	27.07	20.93	104.3	104.30	32.52
31-Jul-92	08:47:00 PM	1967.98	29.34	0.33	17.89	0.91	15.27	0.93	5.65	-0.04	27.07	20.93	104.3	104.30	32.52
31-Jul-92	09:02:00 PM	1982.98	29.34	0.33	17.91	0.93	15.29	0.95	5.65	-0.04	27.06	20.92	104.3	104.30	32.52
31-Jul-92	09:17:00 PM	1997.98	29.33	0.32	17.97	0.99	15.35	1.01	5.65	-0.04	27.06	20.92	104.3	104.30	32.52
31-Jul-92	09:32:00 PM	2012.98	29.32	0.31	18.04	1.06	15.39	1.05	5.66	-0.03	27.06	20.92	104.3	104.30	32.52

ROMP 20 OSPREY, ETBWRAP NO.4: LOWER INTERMEDIATE AQUIFER PUMPING TEST

TEST ZONE: 250 FT. - 370 FT. BLS; TAMPA MBR. ARCADIA FM., LOWER HAWTHORN GP.
PRODUCTION WELL: 12 INCH PVC CASING, L.S. - 250 FT.
11 INCH OPEN HOLE, 250 FT. - 370 FT.

PUMPING RATE: 400 GPM

DATE	TIME	ELAPSED TIME	SUW.-MON. CH.2	DRAWDOWN CH.2	HAW. UPR.-INT. CH.3	DRAWDOWN CH.3	UPR.-HAW. UPR INT. OB-2 CH.4	DRAWDOWN CH.4	SURF. MON. CH.7	DRAWDOWN CH.7	LWR HAW-TAMPA LWR INT. OB-2 CH.5	DRAWDOWN CH.5	LWR HAW. PROD. WELL CH.8	DRAWDOWN CH.8	
31-Jul-92	09:47:00 PM	2027.98	29.32	0.31	18.03	1.05	15.38	1.04	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	10:02:00 PM	2042.98	29.32	0.31	18.04	1.06	15.39	1.05	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	10:17:00 PM	2057.98	29.32	0.31	18.04	1.06	15.39	1.05	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	10:32:00 PM	2072.98	29.31	0.30	18.04	1.06	15.4	1.06	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	10:47:00 PM	2087.98	29.30	0.29	18.1	1.12	15.45	1.11	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	11:02:00 PM	2102.98	29.29	0.28	18.12	1.14	15.48	1.14	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	11:17:00 PM	2117.98	29.28	0.27	18.18	1.20	15.54	1.20	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	11:32:00 PM	2132.98	29.27	0.26	18.23	1.25	15.6	1.26	5.67	-0.02	27.06	20.92	104.3	104.30	32.52
31-Jul-92	11:32:00 PM	2147.98	29.27	0.26	18.29	1.31	15.65	1.31	5.67	-0.02	27.07	20.93	104.3	104.30	32.52
31-Jul-92	11:47:00 PM	2162.98	29.27	0.26	18.29	1.31	15.65	1.31	5.68	-0.01	27.07	20.93	104.3	104.30	

Appendix F

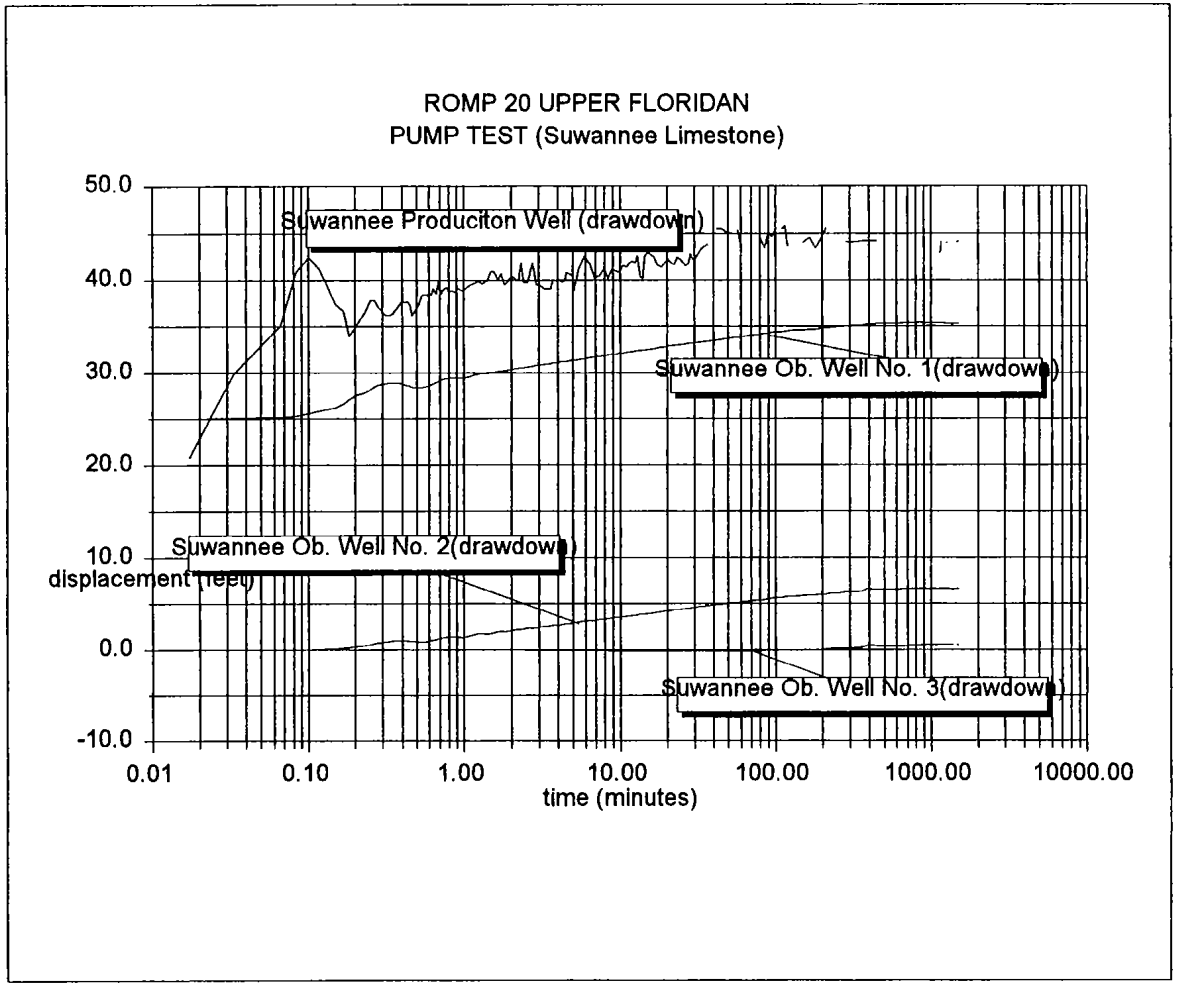


FIGURE 19.
SEMI-LOG DRAWDOWN PLOTS, SUWANNEE/ UPPER FLORIDAN AQUIFER PERFORMANCE TEST

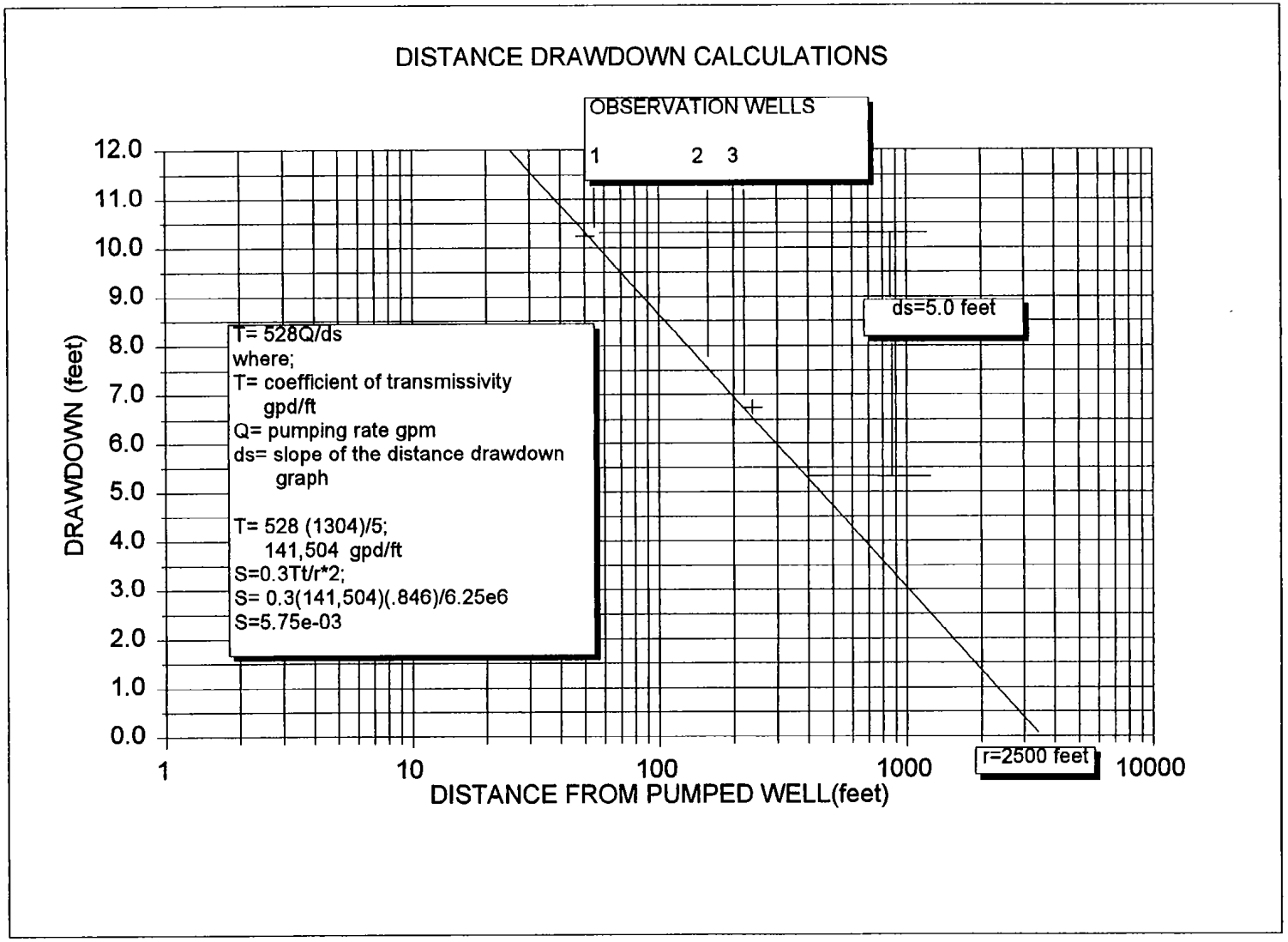
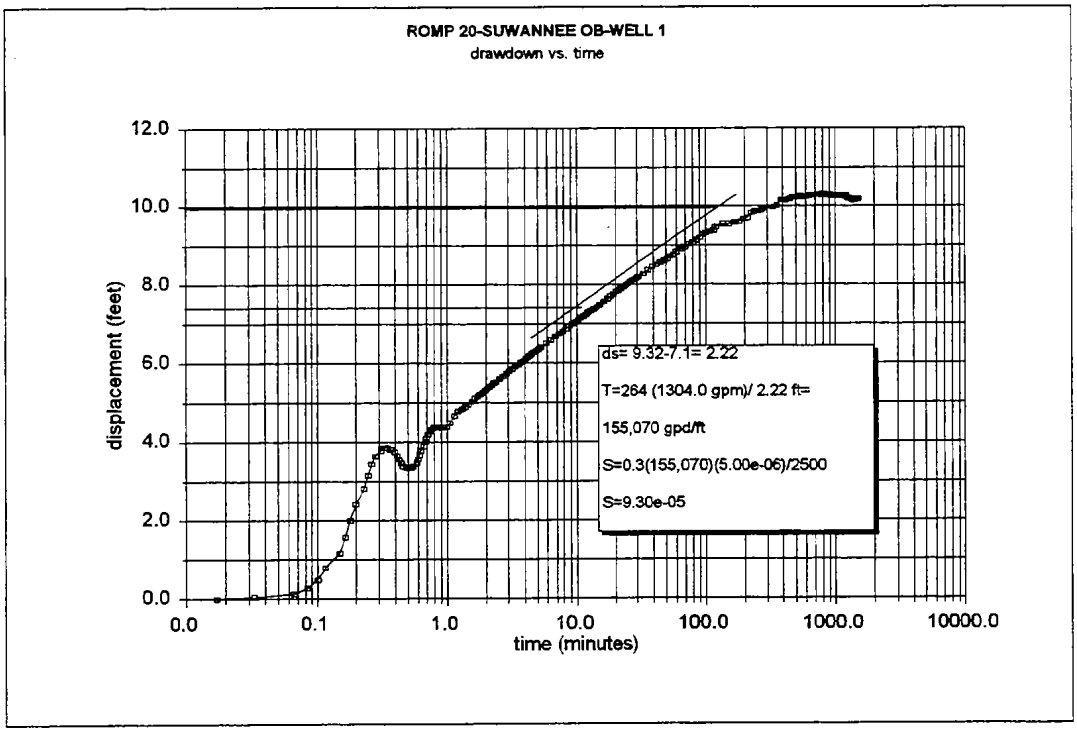
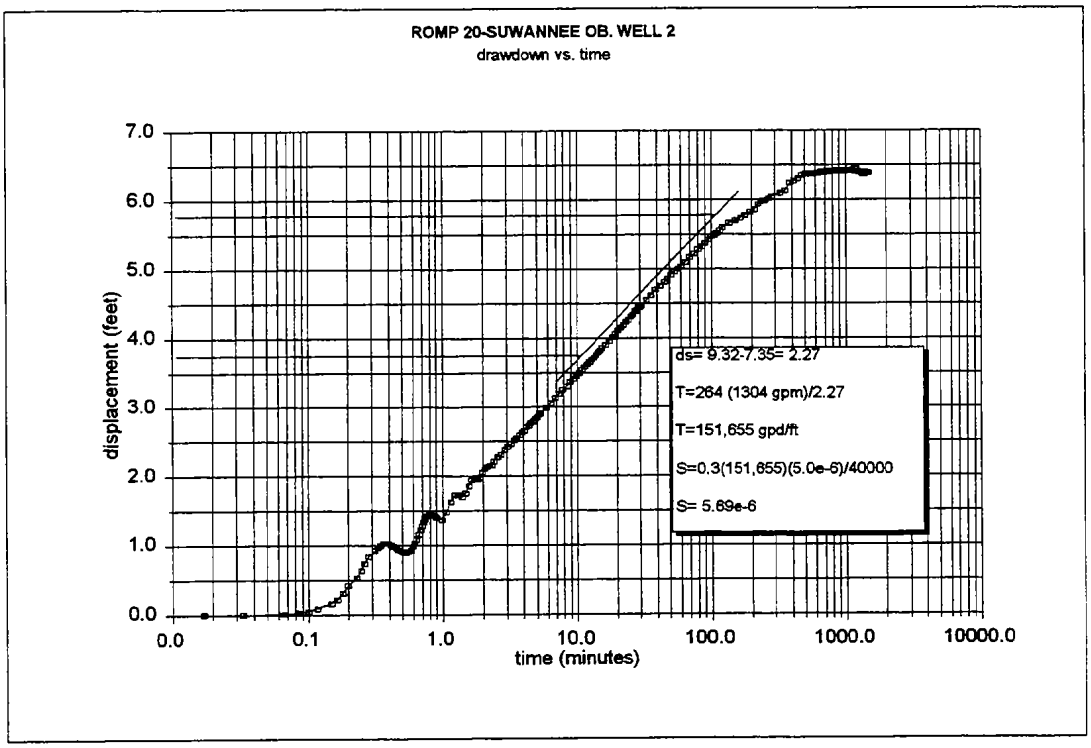


FIGURE 20.
TRANSMISSIVITY CALCULATIONS FOR SUWANNEE /UPPER FLORIDAN APT, DISTANCE DRAWDOWN





U=1.87r^2S/Tt

u=1.87(290 ft^2)(5.39e-6)/151,655(1.18e-04

1.49E-04

FIGURE 21.

JACOB STRAIGHT LINE ANALYSIS, SUWANNEE APT DRAWDOWN VS. TIME

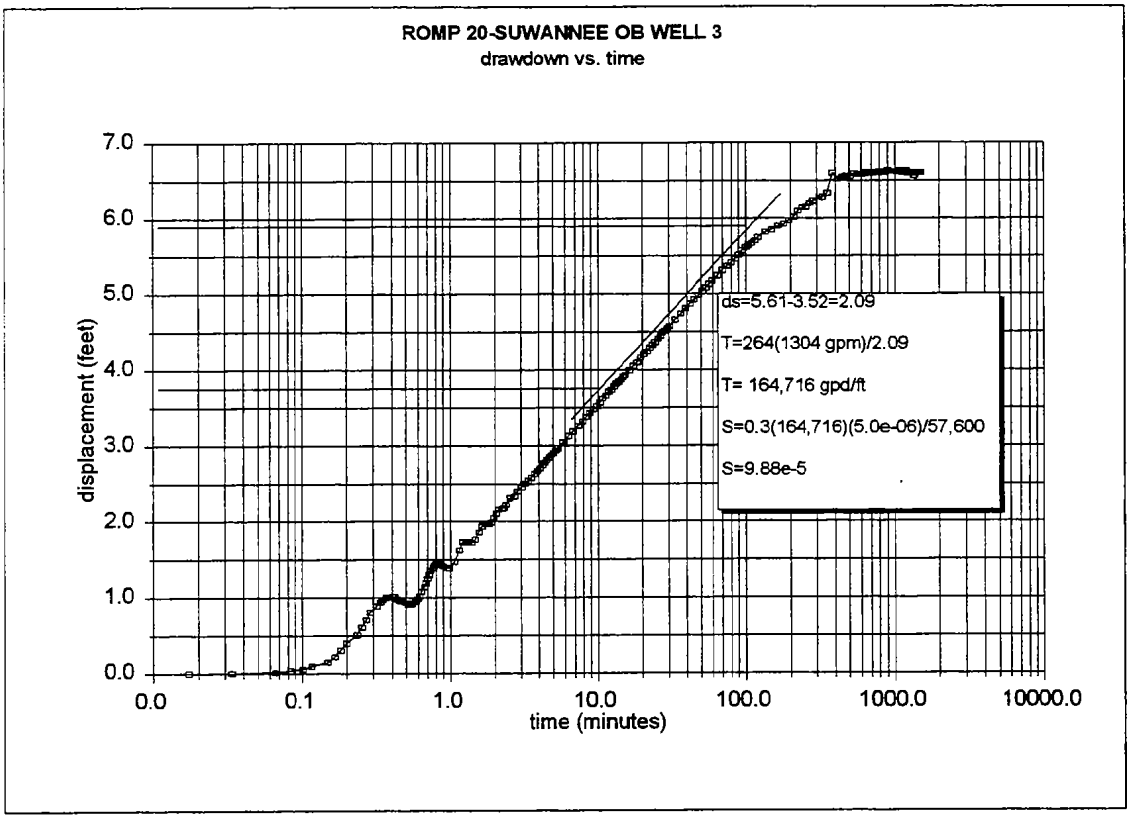
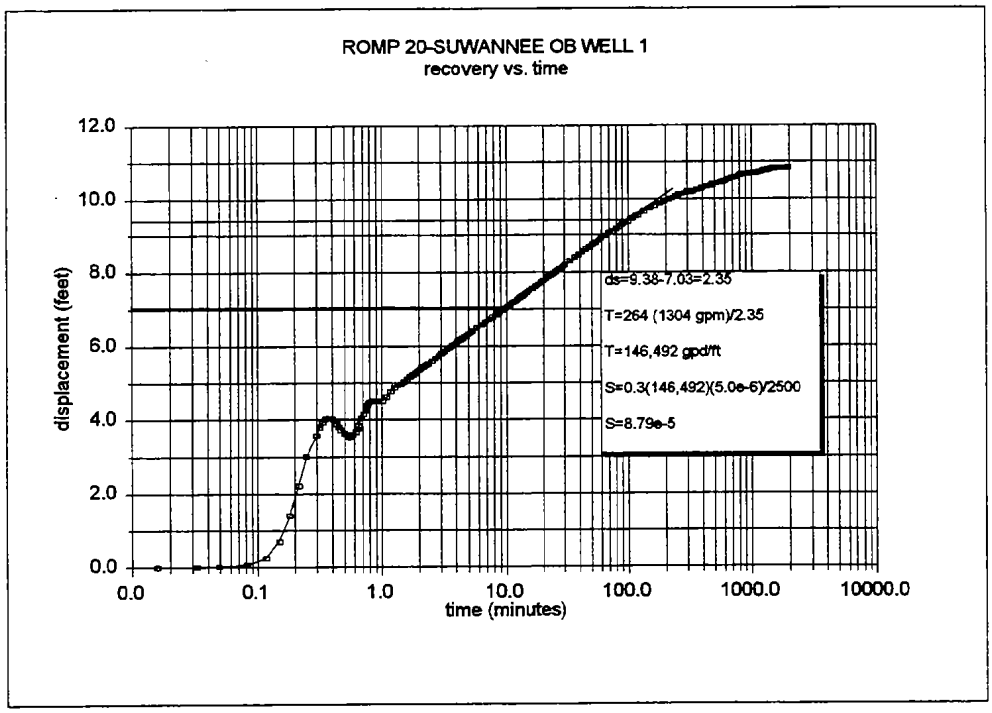


FIGURE 22.
JACOB STRAIGHT LINE ANALYSIS, SUWANNEE APT
DRAWDOWN VS. TIME



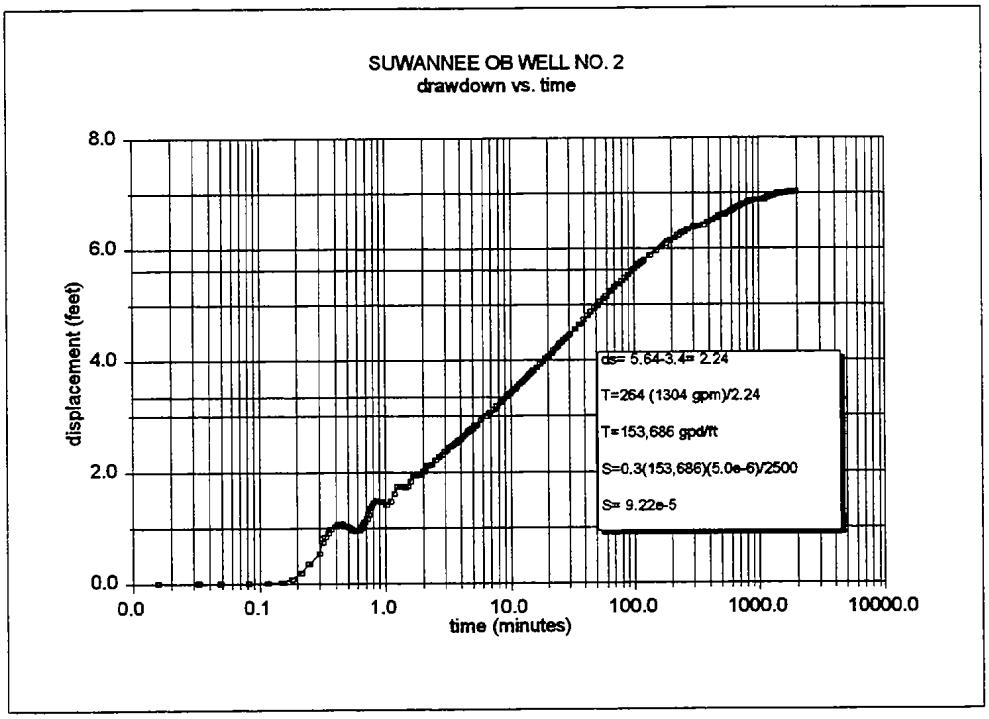


FIGURE 23.
JACOB STRAIGHT LINE ANALYSIS, SUWANNEE APT
RECOVERY VS. TIME

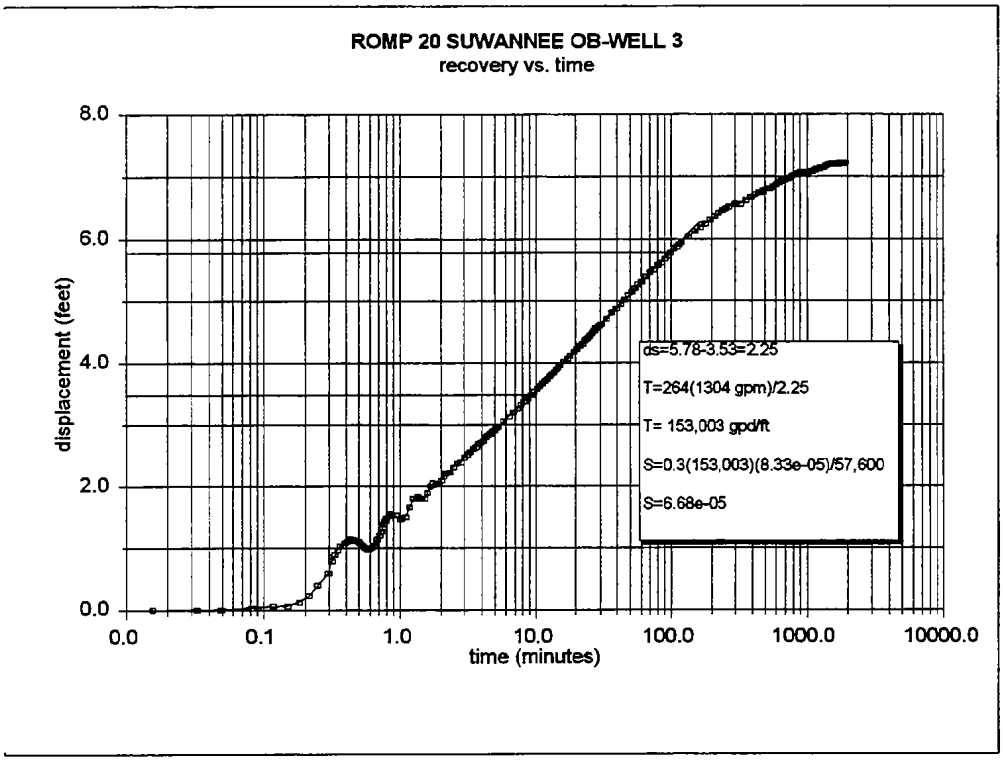
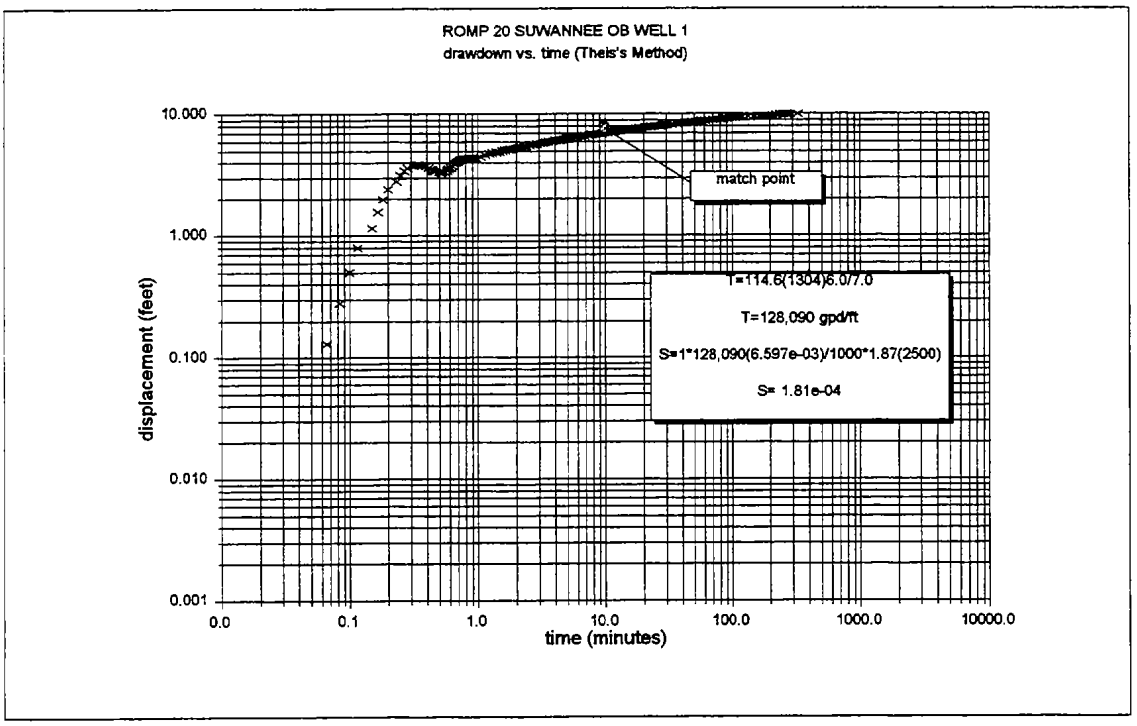


FIGURE 24.

JACOB STRAIGHT LINE ANALYSIS, SUWANNEE APT RECOVERY VS. TIME



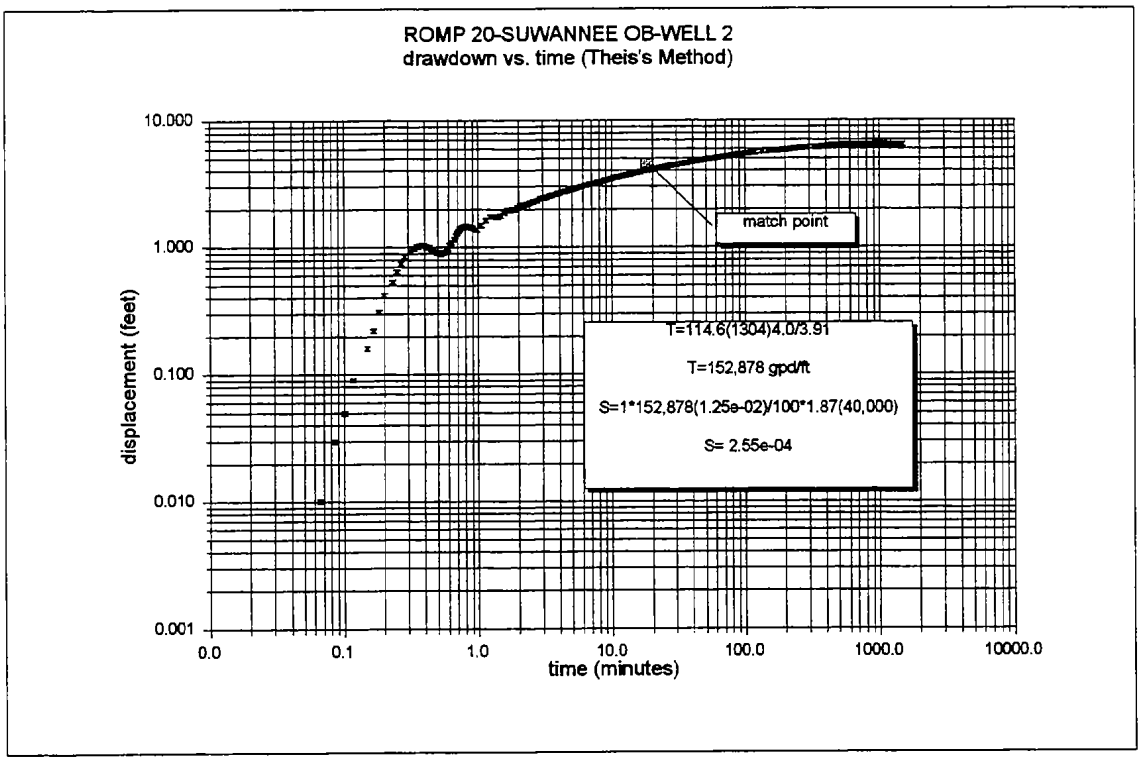


FIGURE 25.
THEIS ANALYSIS SUWANNEE AQUIFER PERFORMANCE TEST

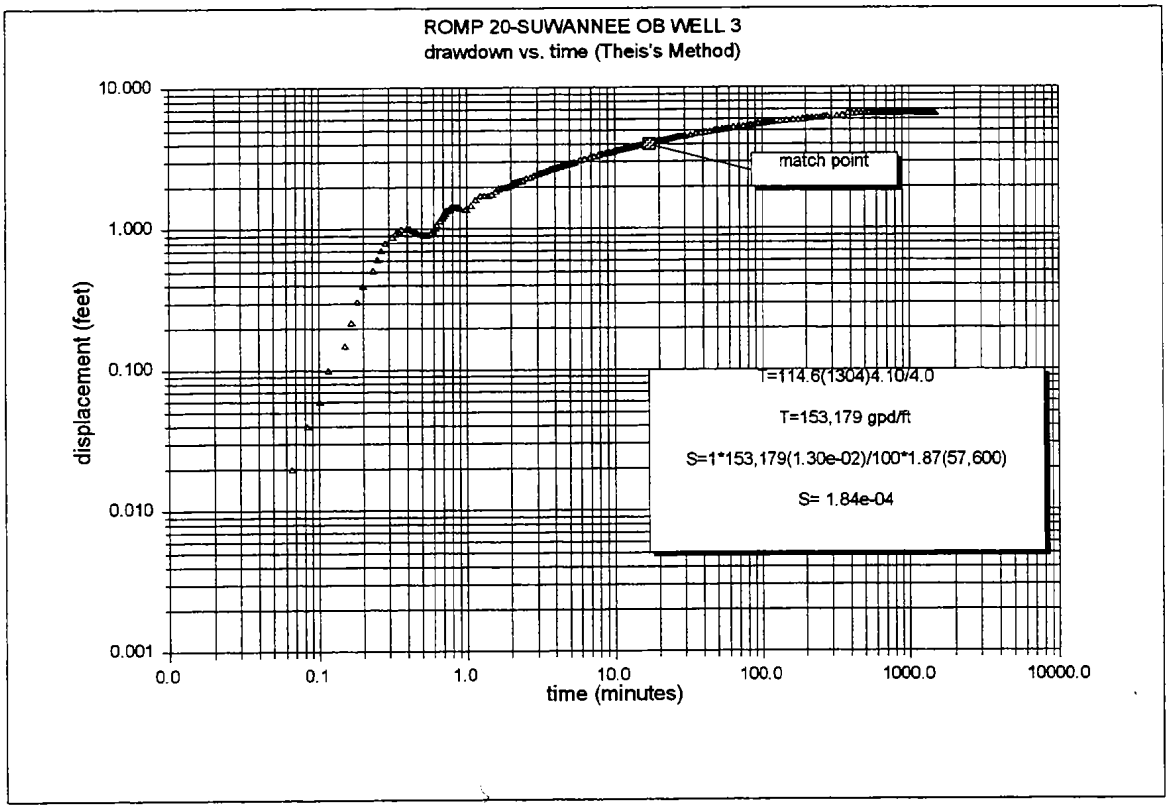
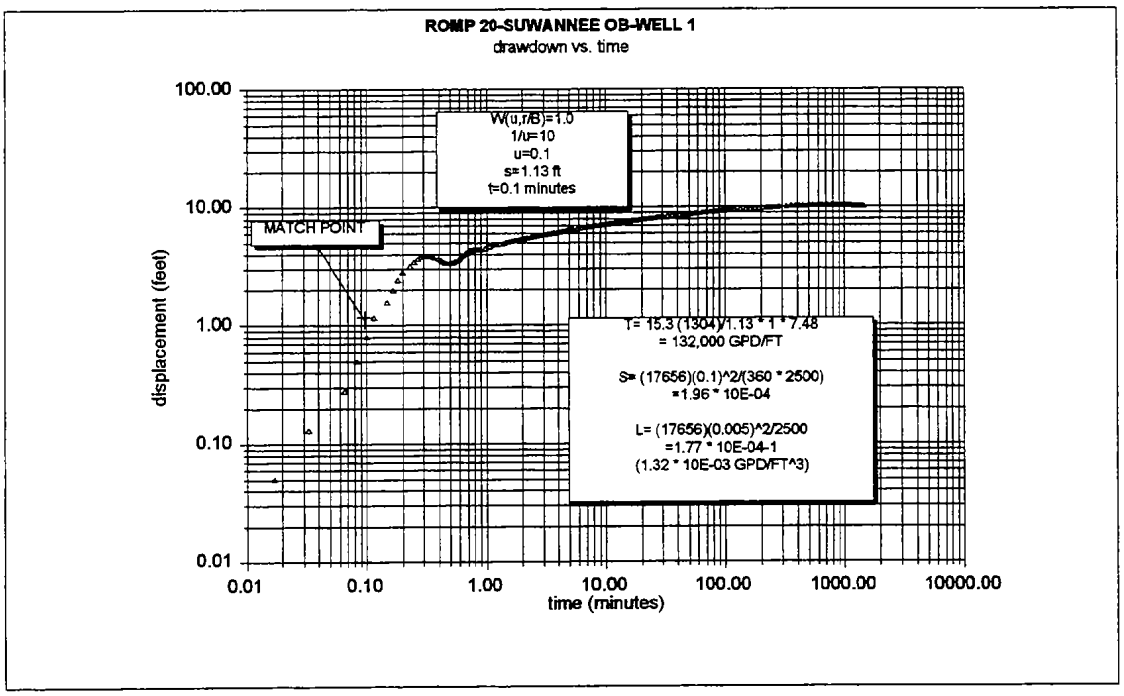


FIGURE 26.
THEIS ANALYSIS SUWANNEE AQUIFER PERFORMANCE TEST



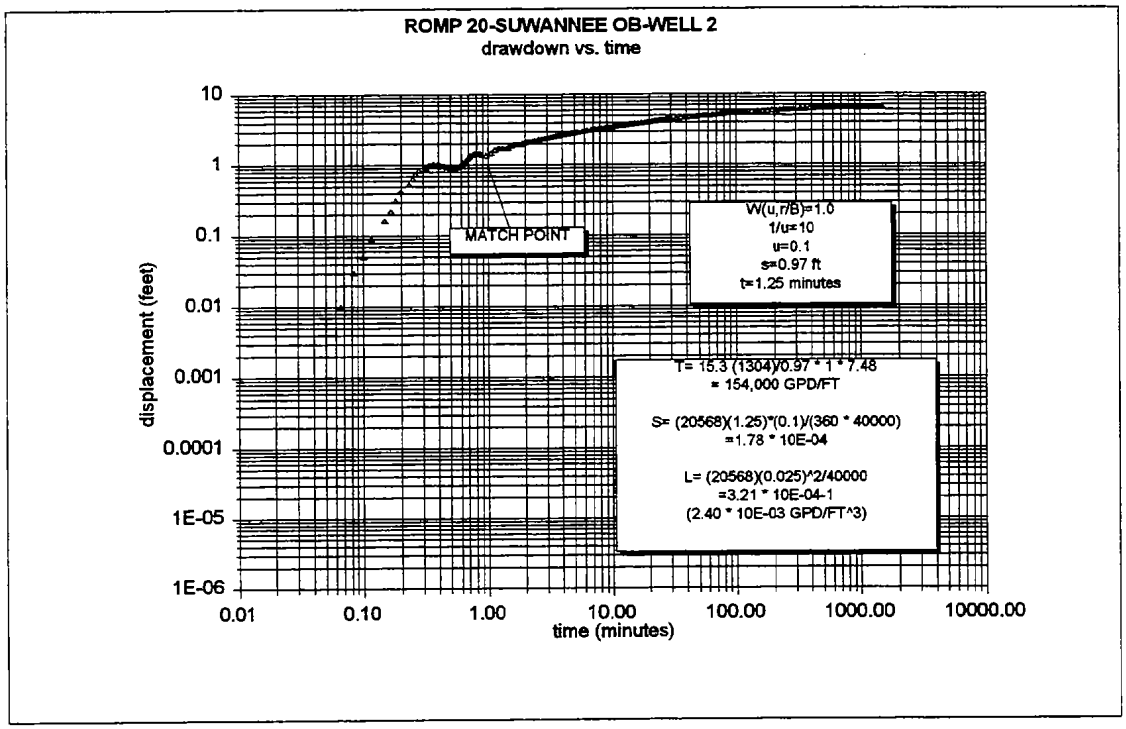


FIGURE 27.
HANTUSH-JACOB LOG LOG PLOTS

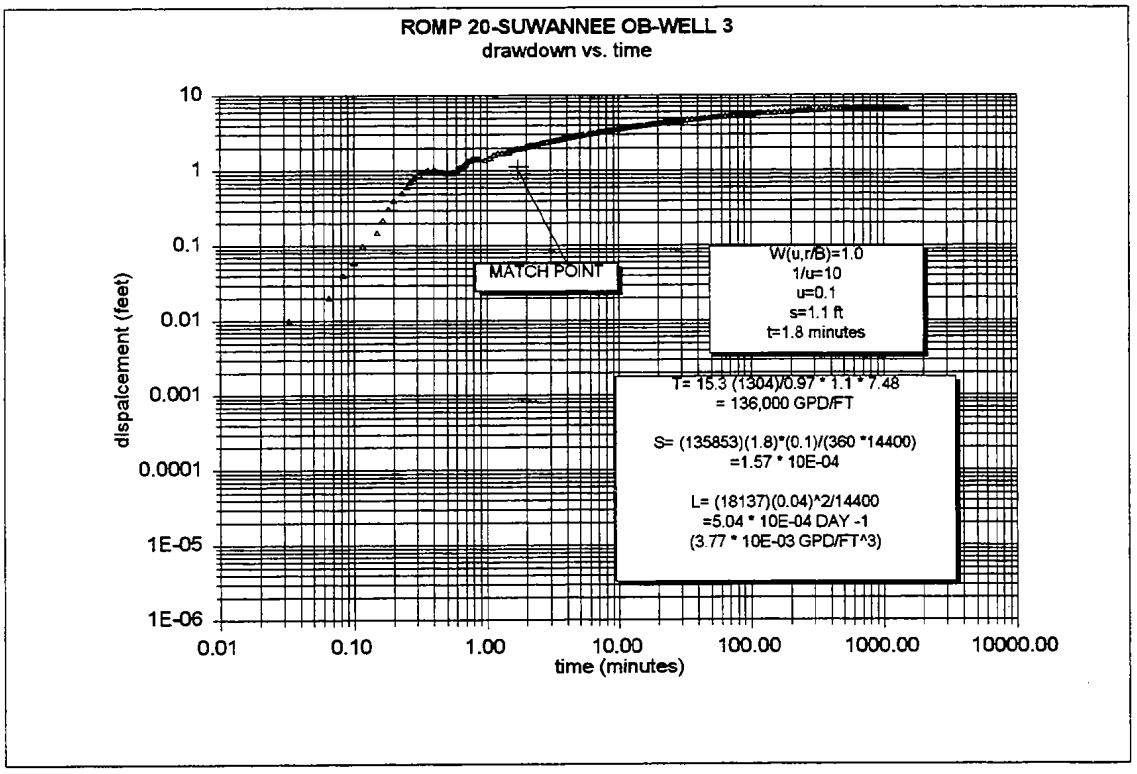


FIGURE 28.

HANTUSH-JACOB LOG LOG PLOTS

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm / Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT			CHANNEL 1	D-DOWN PROD.	CHANNEL 2	D-DOWN		CHANNEL 3	D-DOWN	CHANNEL 4	D-DOWN	CHANNEL 5	D-DOWN	CHANNEL 6	D-DOWN	CHANNEL 7	D-DOWN
DATE	TIME		SUW PROD	WELL	SUW OB-1	SUW OB-1		L.HAWTH	L.HAWTH	SUW OB-3	SUW OB-3	SUW OB-2	SUW OB-2	OCAL/AVPK	OCAL/AVPK	U.HAWTH	U.HAWTH
22-Jul-92	09:30:00 AM				28.8			23.97				27.01		23.74		5.76	
22-Jul-92	10:00:00 AM				28.74			23.95				26.93		23.69		5.9	
22-Jul-92	10:30:00 AM				29.19			24.01		26.94		27.17		23.7		6.07	
22-Jul-92	11:00:00 AM				29.22			24.02		26.95		27.2		23.7		6.27	
22-Jul-92	11:30:00 AM				29.23			24.03		26.96		27.22		23.7		6.41	
22-Jul-92	12:00:00 PM				29.23			24.04		26.96		27.22		23.7		6.51	
22-Jul-92	12:30:00 PM				29.23			24.06		26.97		27.22		23.71		6.59	
22-Jul-92	01:00:00 PM				29.21			24.06		26.96		27.22		23.7		6.63	
22-Jul-92	01:30:00 PM				29.94			24.07		27.41		27.68		23.71		6.67	
	BEGIN DRAWDOWN																
22-Jul-92	02:29:59 PM	0	54.9	54.9	29.83	29.83	0	24.13	0	27.33	0	27.66	0	23.69	0	6.68	0
22-Jul-92	02:30:00 PM	0.01728	34	20.9	29.82	25.08	0	24.13	0	27.33	0	27.55	0	23.69	0	6.68	0
22-Jul-92	02:30:01 PM	0.03312	24.9	30	29.77	26.13	0.05	24.12	0.01	27.32	0.01	27.55	0	23.69	0	6.68	0
22-Jul-92	02:30:03 PM	0.06624	19.8	35.1	29.69	25.21	0.13	24.11	0.02	27.31	0.02	27.54	0.01	23.69	0	6.68	0
22-Jul-92	02:30:04 PM	0.08352	14.1	40.8	29.54	25.36	0.28	24.11	0.02	27.29	0.04	27.52	0.03	23.69	0	6.68	0
22-Jul-92	02:30:05 PM	0.1008	12.5	42.4	29.32	25.58	0.5	24.11	0.02	27.27	0.06	27.5	0.05	23.69	0	6.68	0
22-Jul-92	02:30:06 PM	0.11664	13.6	41.3	29.02	25.88	0.8	24.11	0.02	27.23	0.1	27.46	0.09	23.68	0.01	6.68	0
22-Jul-92	02:30:08 PM	0.14976	17.5	37.4	28.66	26.24	1.16	24.11	0.02	27.18	0.15	27.39	0.16	23.68	0.01	6.68	0
22-Jul-92	02:30:09 PM	0.16704	18.2	36.7	28.25	26.65	1.57	24.11	0.02	27.11	0.22	27.33	0.22	23.68	0.01	6.68	0
22-Jul-92	02:30:10 PM	0.18288	20.9	34	27.83	27.07	1.99	24.11	0.02	27.02	0.31	27.24	0.31	23.69	0	6.68	0
22-Jul-92	02:30:11 PM	0.20016	20	34.9	27.4	27.5	2.42	24.11	0.02	26.93	0.4	27.13	0.42	23.69	0	6.68	0
22-Jul-92	02:30:13 PM	0.23328	18.3	36.6	27.01	27.89	2.81	24.11	0.02	26.82	0.51	27.02	0.53	23.69	0	6.68	0
22-Jul-92	02:30:14 PM	0.25056	17.1	37.8	26.66	28.24	3.16	24.11	0.02	26.72	0.61	26.91	0.64	23.68	0.01	6.68	0
22-Jul-92	02:30:15 PM	0.2664	17.1	37.8	26.38	28.52	3.44	24.1	0.03	26.62	0.71	26.81	0.74	23.69	0	6.68	0
22-Jul-92	02:30:16 PM	0.28368	17.8	37.1	26.18	28.72	3.64	24.11	0.02	26.53	0.8	26.71	0.84	23.69	0	6.68	0
22-Jul-92	02:30:18 PM	0.3168	18.7	36.2	26.04	28.86	3.78	24.11	0.02	26.45	0.88	26.63	0.92	23.69	0	6.68	0
22-Jul-92	02:30:19 PM	0.33408	18.7	36.2	25.97	28.93	3.85	24.11	0.02	26.39	0.94	26.58	0.97	23.69	0	6.68	0
22-Jul-92	02:30:20 PM	0.34992	18.5	36.4	25.96	28.94	3.86	24.11	0.02	26.38	0.97	26.55	1	23.69	0	6.68	0
22-Jul-92	02:30:21 PM	0.3672	18.1	36.8	26	28.9	3.82	24.11	0.02	26.33	1	26.52	1.03	23.69	0	6.68	0
22-Jul-92	02:30:23 PM	0.40032	17.2	37.7	26.07	28.83	3.75	24.11	0.02	26.32	1.01	26.52	1.03	23.69	0	6.68	0
22-Jul-92	02:30:24 PM	0.41616	17.3	37.6	26.17	28.73	3.65	24.11	0.02	26.32	1.01	26.54	1.01	23.69	0	6.68	0
22-Jul-92	02:30:25 PM	0.43344	17.2	37.7	26.26	28.64	3.56	24.11	0.02	26.35	0.98	26.56	0.99	23.7	-0.01	6.68	0
22-Jul-92	02:30:26 PM	0.45072	17.7	37.2	26.35	28.55	3.47	24.11	0.02	26.37	0.96	26.59	0.96	23.7	-0.01	6.68	0
22-Jul-92	02:30:27 PM	0.46656	18.7	36.2	26.43	28.47	3.39	24.11	0.02	26.38	0.95	26.62	0.93	23.7	-0.01	6.68	0
22-Jul-92	02:30:29 PM	0.49968	18	36.9	26.47	28.43	3.35	24.11	0.02	26.4	0.93	26.64	0.91	23.7	-0.01	6.68	0
22-Jul-92	02:30:30 PM	0.51696	17.6	37.3	26.49	28.41	3.33	24.11	0.02	26.42	0.91	26.65	0.9	23.7	-0.01	6.69	-0.01
22-Jul-92	02:30:31 PM	0.5328	16.6	38.3	26.47	28.43	3.35	24.11	0.02	26.42	0.91	26.66	0.89	23.7	-0.01	6.69	-0.01
22-Jul-92	02:30:32 PM	0.55008	16.5	38.4	26.43	28.47	3.39	24.11	0.02	26.41	0.92	26.64	0.91	23.7	-0.01	6.69	-0.01
22-Jul-92	02:30:34 PM	0.5832	16.5	38.4	26.35	28.55	3.47	24.11	0.02	26.38	0.95	26.62	0.93	23.69	0	6.69	-0.01
22-Jul-92	02:30:35 PM	0.60048	16.5	38.4	26.26	28.64	3.56	24.11	0.02	26.35	0.98	26.57	0.98	23.7	-0.01	6.69	-0.01
22-Jul-92	02:30:36 PM	0.61632	16.5	38.4	26.18	28.74	3.66	24.12	0.01	26.31	1.02	26.52	1.03	23.69	0	6.69	-0.01
22-Jul-92	02:30:37 PM	0.6336	15.9	39	26.05	28.85	3.77	24.12	0.01	26.25	1.08	26.47	1.08	23.7	-0.01	6.69	-0.01
22-Jul-92	02:30:39 PM	0.66672	16.3	38.6	25.92	28.98	3.9	24.12	0.01	26.19	1.14	26.4	1.15	23.69	0	6.69	-0.01
22-Jul-92	02:30:40 PM	0.684	16.2	38.7	25.81	29.09	4.01	24.11	0.02	26.14	1.19	26.33	1.22	23.69	0	6.69	-0.01
22-Jul-92	02:30:41 PM	0.69984	15.6	39.1	25.72	29.18	4.1	24.12	0.01	26.08	1.25	26.27	1.28	23.69	0	6.69	-0.01
22-Jul-92	02:30:42 PM	0.71712	16.3	38.6	25.63	29.27	4.19	24.12	0.01	26.03	1.3	26.22	1.33	23.69	0	6.69	-0.01
22-Jul-92	02:30:43 PM	0.73296	16	38.9	25.55	29.35	4.27	24.12	0.01	25.98	1.35	26.17	1.38	23.69	0	6.69	-0.01
22-Jul-92	02:30:45 PM	0.76752	15.7	39.2	25.5	29.4	4.32	24.12	0.01	25.94	1.39	26.13	1.42	23.69	0	6.69	-0.01
22-Jul-92	02:30:46 PM	0.78336	15.8	39.1	25.47	29.43	4.35	24.12	0.01	25.91	1.42	26.11	1.44	23.69	0	6.69	-0.01
22-Jul-92	02:30:47 PM	0.80064	16.2	38.7	25.44	29.48	4.38	24.12	0.01	25.89	1.44	26.1	1.45	23.69	0	6.69	-0.01
22-Jul-92	02:30:48 PM	0.81648	16.1	38.8	25.43	29.47	4.39	24.12	0.01	25.89	1.44	26.1	1.45	23.69	0	6.69	-0.01
22-Jul-92	02:30:50 PM	0.8496	16.1	38.8	25.43	29.47	4.39	24.12	0.01	25.89	1.44	26.11	1.44	23.69	0	6.69	-0.01
22-Jul-92	02:30:51 PM	0.86688	16.2	38.7	25.43	29.47	4.39	24.12	0.01	25.89	1.44	26.11	1.44	23.69	0	6.69	-0.01
22-Jul-92	02:30:52 PM	0.88416	16.2	38.7	25.44	29.46	4.38	24.12	0.01	25.91	1.42	26.13	1.42	23.69	0	6.69	-0.01
22-Jul-92	02:30:53 PM	0.9	15.8	39.1	25.45	29.45	4.37	24.12	0.01	25.92	1.41	26.15	1.4	23.7	-0.01	6.69	-0.01
22-Jul-92	02:30:58 PM	0.98352	16.1	38.8	25.44	29.46	4.38	24.13	0	25.94	1.39	26.18	1.37	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:03 PM	1.06704	15.6	39.3	25.33	29.57	4.49	24.13	0	25.86	1.47	26.07	1.48	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:08 PM	1.15056	15.3	39.6	25.16	29.74	4.66	24.13	0	25.71	1.62	25.92	1.63	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:13 PM	1.23408	15.1	39.8	25.04	29.86	4.78	24.13	0	25.6	1.73	25.82	1.73	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:18 PM	1.31616	15.3	39.6	24.97	29.93	4.85	24.13	0	25.6	1.73	25.82	1.73	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:23 PM	1.39968	15	39.9	24.93	29.97	4.89	24.13	0	25.61	1.72	25.85	1.7	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:28 PM	1.4832	14	40.9	24.87	30.03	4.95	24.13	0	25.57	1.76	25.79	1.76	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:33 PM	1.56672	14	40.9	24.79	30.11	5.03	24.13	0	25.47	1.86	25.69	1.86	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:38 PM	1.65024	14.8	40.1	24.72	30.18	5.1	24.14	-0.01	25.39	1.94	25.61	1.94	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:43 PM	1.73376	14.2	40.7	24.66	30.24	5.16	24.14	-0.01	25.36	1.97	25.59	1.96	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:48 PM	1.81728	15.4	39.5	24.62	30.28	5.2	24.14	-0.01	25.36	1.97	25.6	1.95	23.7	-0.01	6.7	-0.02

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm./ Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT			CHANNEL 1	D-DOWN PROD.	CHANNEL 2	D-DOWN		CHANNEL 3	D-DOWN	CHANNEL 4	D-DOWN	CHANNEL 5	D-DOWN	CHANNEL 6	D-DOWN	CHANNEL 7	D-DOWN
DATE	TIME		SUW PROD	WELL	SUW OB-1	SUW OB-1		L.HAWTH	L.HAWTH	SUW OB-3	SUW OB-3	SUW OB-2	SUW OB-2	OCAL/AVPK	OCAL/AVPK	U.HAWTH	U.HAWTH
22-Jul-92	02:31:53 PM	1.9008	15.1	39.8	24.57	30.33	5.25	24.15	-0.02	25.34	1.99	25.57	1.98	23.7	-0.01	6.7	-0.02
22-Jul-92	02:31:58 PM	1.98288	14.6	40.3	24.52	30.38	5.3	24.14	-0.01	25.28	2.05	25.5	2.05	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:03 PM	2.0664	14.5	40.4	24.47	30.43	5.35	24.15	-0.02	25.22	2.11	25.44	2.11	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:08 PM	2.14992	14.9	40	24.42	30.48	5.4	24.15	-0.02	25.17	2.16	25.41	2.14	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:13 PM	2.23344	14.8	40.1	24.38	30.52	5.44	24.15	-0.02	25.16	2.17	25.4	2.15	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:18 PM	2.31696	13.1	41.8	24.33	30.57	5.49	24.15	-0.02	25.15	2.18	25.39	2.16	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:23 PM	2.40048	15.2	39.7	24.3	30.6	5.52	24.15	-0.02	25.11	2.22	25.34	2.21	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:33 PM	2.56808	15.2	39.7	24.22	30.68	5.6	24.16	-0.03	25.02	2.31	25.27	2.28	23.7	-0.01	6.7	-0.02
22-Jul-92	02:32:43 PM	2.73312	13.1	41.8	24.15	30.75	5.67	24.16	-0.03	25	2.33	25.24	2.31	23.71	-0.02	6.7	-0.02
22-Jul-92	02:32:53 PM	2.90016	15.4	39.5	24.08	30.82	5.74	24.17	-0.04	24.93	2.4	25.17	2.38	23.7	-0.01	6.7	-0.02
22-Jul-92	02:33:03 PM	3.0672	15.4	39.5	24.02	30.88	5.8	24.17	-0.04	24.88	2.45	25.12	2.43	23.7	-0.01	6.7	-0.02
22-Jul-92	02:33:13 PM	3.2328	15.9	39	23.98	30.94	5.86	24.17	-0.04	24.83	2.5	26.09	2.46	23.71	-0.02	6.7	-0.02
22-Jul-92	02:33:23 PM	3.39984	15.9	39	23.91	30.99	5.91	24.18	-0.05	24.78	2.55	25.03	2.52	23.71	-0.02	6.7	-0.02
22-Jul-92	02:33:33 PM	3.56688	15.9	39	23.86	31.04	5.96	24.18	-0.05	24.75	2.58	25	2.55	23.7	-0.01	6.7	-0.02
22-Jul-92	02:33:43 PM	3.73392	14.9	40	23.81	31.09	6.01	24.18	-0.05	24.7	2.63	24.96	2.59	23.71	-0.02	6.7	-0.02
22-Jul-92	02:33:53 PM	3.89952	15	39.9	23.76	31.14	6.06	24.18	-0.05	24.66	2.67	24.92	2.63	23.71	-0.02	6.7	-0.02
22-Jul-92	02:34:03 PM	4.06656	14.8	40.1	23.71	31.19	6.11	24.19	-0.06	24.63	2.7	24.89	2.66	23.7	-0.01	6.7	-0.02
22-Jul-92	02:34:13 PM	4.2336	15.2	39.7	23.67	31.23	6.15	24.19	-0.06	24.58	2.75	24.84	2.71	23.7	-0.01	6.7	-0.02
22-Jul-92	02:34:23 PM	4.40064	14.9	40	23.63	31.27	6.19	24.19	-0.06	24.55	2.78	24.82	2.73	23.7	-0.01	6.7	-0.02
22-Jul-92	02:34:33 PM	4.56624	14.1	40.8	23.59	31.31	6.23	24.19	-0.06	24.51	2.82	24.78	2.77	23.7	-0.01	6.7	-0.02
22-Jul-92	02:34:43 PM	4.73328	14.3	40.6	23.55	31.35	6.27	24.19	-0.06	24.48	2.85	24.75	2.8	23.7	-0.01	6.7	-0.02
22-Jul-92	02:34:53 PM	4.90032	14.4	40.5	23.51	31.39	6.31	24.19	-0.06	24.45	2.88	24.72	2.83	23.7	-0.01	6.7	-0.02
22-Jul-92	02:35:03 PM	5.06736	16	38.9	23.48	31.42	6.34	24.19	-0.06	24.42	2.91	24.7	2.85	23.7	-0.01	6.7	-0.02
22-Jul-92	02:35:13 PM	5.23296	14.9	40	23.44	31.46	6.38	24.19	-0.06	24.39	2.94	24.66	2.89	23.7	-0.01	6.7	-0.02
22-Jul-92	02:35:23 PM	5.4	13.7	41.2	23.41	31.49	6.41	24.19	-0.06	24.36	2.97	24.64	2.91	23.7	-0.01	6.7	-0.02
22-Jul-92	02:35:53 PM	5.89968	12.3	42.6	23.31	31.59	6.51	24.19	-0.06	24.28	3.05	24.56	2.99	23.7	-0.01	6.7	-0.02
22-Jul-92	02:36:23 PM	6.4008	13.2	41.7	23.23	31.67	6.59	24.19	-0.06	24.2	3.13	24.49	3.06	23.7	-0.01	6.7	-0.02
22-Jul-92	02:36:53 PM	6.90048	14.6	40.3	23.14	31.76	6.68	24.2	-0.07	24.14	3.19	24.42	3.13	23.7	-0.01	6.7	-0.02
22-Jul-92	02:37:23 PM	7.40016	14.4	40.6	23.06	31.82	6.74	24.2	-0.07	24.07	3.26	24.36	3.19	23.69	0	6.7	-0.02
22-Jul-92	02:37:53 PM	7.89984	13.6	41.3	23.01	31.89	6.81	24.2	-0.07	24.01	3.32	24.3	3.25	23.69	0	6.7	-0.02
22-Jul-92	02:38:23 PM	8.39952	14.7	40.2	22.95	31.95	6.87	24.21	-0.08	23.95	3.38	24.25	3.3	23.69	0	6.7	-0.02
22-Jul-92	02:38:53 PM	8.90064	13.7	41.2	22.88	32.02	6.94	24.21	-0.08	23.9	3.43	24.19	3.36	23.68	0.01	6.7	-0.02
22-Jul-92	02:39:23 PM	9.40032	13.9	41	22.82	32.08	7	24.21	-0.08	23.85	3.48	24.14	3.41	23.68	0.01	6.69	-0.01
22-Jul-92	02:39:53 PM	9.9	14	40.9	22.77	32.13	7.05	24.21	-0.08	23.81	3.52	24.1	3.45	23.68	0.01	6.69	-0.01
22-Jul-92	02:40:23 PM	10.39968	13.3	41.6	22.72	32.18	7.1	24.21	-0.08	23.76	3.57	24.06	3.49	23.68	0.01	6.7	-0.02
22-Jul-92	02:40:53 PM	10.9008	13.5	41.4	22.66	32.24	7.16	24.21	-0.08	23.71	3.62	24.01	3.54	23.68	0.01	6.69	-0.01
22-Jul-92	02:41:23 PM	11.40048	13	41.9	22.62	32.28	7.2	24.22	-0.09	23.67	3.66	23.97	3.58	23.68	0.01	6.69	-0.01
22-Jul-92	02:41:53 PM	11.90016	12.9	42	22.58	32.32	7.24	24.22	-0.09	23.62	3.71	23.93	3.62	23.68	0.01	6.69	-0.01
22-Jul-92	02:42:23 PM	12.39984	13	41.9	22.53	32.37	7.29	24.22	-0.09	23.59	3.74	23.9	3.65	23.68	0.01	6.69	-0.01
22-Jul-92	02:42:53 PM	12.89952	12.3	42.6	22.48	32.42	7.34	24.22	-0.09	23.55	3.78	23.86	3.69	23.67	0.02	6.7	-0.02
22-Jul-92	02:43:23 PM	13.40064	14.5	40.4	22.45	32.45	7.37	24.22	-0.09	23.52	3.81	23.83	3.72	23.68	0.01	6.7	-0.02
22-Jul-92	02:43:53 PM	13.90032	14.6	40.3	22.42	32.48	7.4	24.23	-0.1	23.49	3.84	23.8	3.75	23.67	0.02	6.7	-0.02
22-Jul-92	02:44:23 PM	14.4	12.3	42.6	22.39	32.51	7.43	24.23	-0.1	23.46	3.87	23.76	3.79	23.67	0.02	6.7	-0.02
22-Jul-92	02:44:53 PM	14.89968	12	42.9	22.35	32.55	7.47	24.23	-0.1	23.42	3.91	23.73	3.82	23.66	0.03	6.7	-0.02
22-Jul-92	02:45:23 PM	15.4008	12.1	42.8	22.33	32.57	7.49	24.23	-0.1	23.4	3.93	23.7	3.85	23.66	0.03	6.7	-0.02
22-Jul-92	02:46:23 PM	16.40016	12.4	42.5	22.28	32.64	7.56	24.23	-0.1	23.34	3.99	23.65	3.9	23.66	0.03	6.7	-0.02
22-Jul-92	02:47:23 PM	17.39952	13.3	41.6	22.18	32.72	7.64	24.23	-0.1	23.28	4.05	23.59	3.96	23.65	0.04	6.7	-0.02
22-Jul-92	02:48:23 PM	18.40032	13.5	41.4	22.12	32.78	7.7	24.23	-0.1	23.23	4.1	23.54	4.01	23.65	0.04	6.7	-0.02
22-Jul-92	02:49:23 PM	19.39968	13	41.9	22.07	32.83	7.75	24.23	-0.1	23.17	4.16	23.49	4.06	23.64	0.05	6.7	-0.02
22-Jul-92	02:50:23 PM	20.40048	12.7	42.2	22.01	32.89	7.81	24.23	-0.1	23.12	4.21	23.44	4.11	23.64	0.05	6.7	-0.02
22-Jul-92	02:51:23 PM	21.39984	13.1	41.8	21.97	32.93	7.85	24.24	-0.11	23.09	4.24	23.4	4.15	23.63	0.06	6.7	-0.02
22-Jul-92	02:52:23 PM	22.40064	13.2	41.7	21.92	32.98	7.9	24.23	-0.1	23.04	4.29	23.36	4.19	23.63	0.06	6.7	-0.02
22-Jul-92	02:53:23 PM	23.4	12.5	42.4	21.88	33.02	7.94	24.24	-0.11	23	4.33	23.31	4.24	23.62	0.07	6.7	-0.02
22-Jul-92	02:54:23 PM	24.4008	12.7	42.2	21.84	33.06	7.98	24.24	-0.11	22.97	4.36	23.29	4.28	23.62	0.07	6.71	-0.03
22-Jul-92	02:55:23 PM	25.40016	13	41.9	21.8	33.1	8.02	24.24	-0.11	22.92	4.41	23.24	4.31	23.62	0.07	6.71	-0.03
22-Jul-92	02:56:23 PM	26.39952	13.4	41.5	21.76	33.14	8.06	24.24	-0.11	22.89	4.44	23.21	4.34	23.61	0.08	6.71	-0.03
22-Jul-92	02:57:23 PM	27.40032	13.1	41.8	21.72	33.18	8.1	24.24	-0.11	22.84	4.49	23.17	4.38	23.61	0.08	6.71	-0.03
22-Jul-92	02:58:23 PM	28.39968	12.1	42.8	21.69	33.21	8.13	24.24	-0.11	22.82	4.51	23.14	4.41	23.61	0.08	6.71	-0.03
22-Jul-92	02:59:23 PM	29.40048	12.7	42.2	21.66	33.24	8.16	24.24	-0.11	22.79	4.54	23.11	4.44	23.61	0.08	6.71	-0.03
22-Jul-92	03:00:23 PM	30.39984	12.7	42.2	21.63	33.27	8.19	24.24	-0.11	22.76	4.57	23.09	4.46	23.6	0.09	6.71	-0.03
22-Jul-92	03:03:23 PM	33.4008	11.6	43.3	21.55	33.35	8.27	24.24	-0.11	22.67	4.66	23	4.55	23.59	0.1	6.7	-0.02
22-Jul-92	03:06:23 PM	36.40032	11.1	43.8	21.45	33.45	8.37	24.24	-0.11	22.59	4.74	22.93	4.62	23.58	0.11	6.7	-0.02
22-Jul-92	03:09:23 PM	39.39984			21.37	33.53	8.45	24.23	-0.1	22.52	4.81	22.85	4.7	23.58	0.13	6.7	-0.02
22-Jul-92	03:12:23 PM	42.4008	9.4	45.5	21.31	33.59	8.51	24.24	-0.11	22.46	4.87	22.79	4.76	23.55	0.14	6.7	-0.02
22-Jul-92	03:15:23 PM	45.40032	9.4	45.5	21.25	33.65	8.57	24.24	-0.11	22.4	4.93	22.74	4.81	23.55	0.14	6.7	-0.02
22-Jul-92	03:18:23 PM	48.39984	9.8	45.1	21.21	33.69	8.61	24.24	-0.11	22.35	4.98	22.69	4.86	23.56	0.14	6.7	-0.02

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm./ Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT			CHANNEL 1	D-DOWN PROD.		CHANNEL 2	D-DOWN		CHANNEL 3	D-DOWN	CHANNEL 4	D-DOWN	CHANNEL 5	D-DOWN	CHANNEL 6	D-DOWN	CHANNEL 7	D-DOWN
DATE	TIME		SUW PROD	WELL		SUW OB-1	SUW OB-1		L.HAWTH	L.HAWTH	SUW OB-3	SUW OB-3	SUW OB-2	SUW OB-2	OCAL/AVPK	OCAL/AVPK	U.HAWTH	U.HAWTH
22-Jul-92	03:21:23 PM	51.4008	9.9		45	21.15	33.75	8.87	24.23	-0.1	22.29	5.04	22.64	4.91	23.55	0.14	6.7	-0.02
22-Jul-92	03:24:23 PM	54.40032				21.1	33.8	8.72	24.23	-0.1	22.25	5.08	22.59	4.96	23.55	0.14	6.7	-0.02
22-Jul-92	03:27:23 PM	57.39984	9.6		45.3	21.05	33.85	8.77	24.24	-0.11	22.2	5.13	22.55	5	23.54	0.15	6.71	-0.03
22-Jul-92	03:30:23 PM	60.4008	11.5		43.4	20.99	33.91	8.83	24.23	-0.1	22.16	5.17	22.51	5.04	23.54	0.15	6.71	-0.03
22-Jul-92	03:35:23 PM	65.40048				20.92	33.98	8.9	24.23	-0.1	22.09	5.24	22.45	5.1	23.52	0.17	6.71	-0.03
22-Jul-92	03:40:23 PM	70.40016	9		45.9	20.86	34.04	8.96	24.22	-0.09	22.02	5.31	22.38	5.17	23.5	0.19	6.71	-0.03
22-Jul-92	03:45:23 PM	75.39984				20.79	34.11	9.03	24.21	-0.08	21.97	5.36	22.33	5.22	23.49	0.2	6.72	-0.04
22-Jul-92	03:50:23 PM	80.39952	10.4		44.5	20.74	34.16	9.08	24.21	-0.08	21.92	5.41	22.27	5.28	23.49	0.2	6.72	-0.04
22-Jul-92	03:55:23 PM	85.40064	11.4		43.5	20.68	34.22	9.14	24.2	-0.07	21.87	5.46	22.23	5.32	23.49	0.2	6.72	-0.04
22-Jul-92	04:00:23 PM	90.40032	9.9		46	20.62	34.28	9.2	24.19	-0.06	21.82	5.51	22.18	5.37	23.48	0.21	6.72	-0.04
22-Jul-92	04:05:23 PM	95.4	10.2		44.7	20.54	34.36	9.28	24.19	-0.06	21.76	5.57	22.13	5.42	23.47	0.22	6.72	-0.04
22-Jul-92	04:10:23 PM	100.39968	9.4		45.5	20.5	34.4	9.32	24.19	-0.06	21.72	5.61	22.08	5.47	23.47	0.22	6.72	-0.04
22-Jul-92	04:15:23 PM	105.4008				20.47	34.43	9.35	24.19	-0.06	21.69	5.64	22.06	5.49	23.46	0.23	6.72	-0.04
22-Jul-92	04:20:23 PM	110.40048	9.4		45.5	20.46	34.44	9.36	24.19	-0.06	21.68	5.67	22.03	5.52	23.45	0.24	6.72	-0.04
22-Jul-92	04:25:23 PM	115.40016	9.1		45.8	20.43	34.47	9.39	24.18	-0.05	21.63	5.7	22	5.55	23.44	0.25	6.72	-0.04
22-Jul-92	04:30:23 PM	120.39984	11.3		43.6	20.35	34.55	9.47	24.16	-0.03	21.58	5.75	21.95	5.6	23.43	0.26	6.77	-0.09
22-Jul-92	04:45:23 PM	135.40032				20.28	34.62	9.54	24.18	-0.05	21.51	5.82	21.88	5.67	23.43	0.26	6.78	-0.1
22-Jul-92	05:00:23 PM	150.4008	10.8		44.1	20.28	34.62	9.54	24.17	-0.04	21.48	5.85	21.85	5.7	23.42	0.27	6.66	0.02
22-Jul-92	05:15:23 PM	165.39984	10.3		44.6	20.23	34.67	9.59	24.13	0	21.43	5.9	21.81	5.74	23.41	0.28	6.58	0.1
22-Jul-92	05:30:23 PM	180.40032	11.5		43.4	20.21	34.69	9.61	24.1	0.03	21.4	5.93	21.77	5.78	23.4	0.29	6.52	0.16
22-Jul-92	05:45:23 PM	195.4008	10.5		44.4	20.15	34.75	9.67	24.06	0.07	21.36	5.97	21.73	5.82	23.38	0.31	6.55	0.13
22-Jul-92	06:00:23 PM	210.39984	9.4		45.5	20.12	34.78	9.7	24.02	0.11	21.31	6.02	21.69	5.86	23.37	0.32	6.6	0.08
22-Jul-92	06:15:23 PM	225.40032				19.99	34.91	9.83	23.99	0.14	21.23	6.1	21.61	5.94	23.35	0.34	6.62	0.06
22-Jul-92	06:30:23 PM	240.4008				19.94	34.96	9.88	23.99	0.14	21.19	6.14	21.57	5.98	23.34	0.35	6.61	0.07
22-Jul-92	06:45:23 PM	255.39984				19.95	34.95	9.87	23.99	0.14	21.18	6.15	21.56	5.99	23.32	0.37	6.64	0.04
22-Jul-92	07:00:23 PM	270.40032				19.91	34.99	9.91	23.98	0.17	21.13	6.2	21.53	6.02	23.32	0.37	6.61	0.07
22-Jul-92	07:15:23 PM	285.4008	10.8		44.1	19.87	35.03	9.95	23.94	0.19	21.1	6.23	21.5	6.05	23.31	0.38	6.4	0.28
22-Jul-92	08:00:00 PM	330.01632	10.8		44.1	19.84	35.06	9.98	23.89	0.24	21.05	6.28	21.46	6.09	23.29	0.4	6.33	0.35
22-Jul-92	08:30:00 PM	360.01728	10.7		44.2	19.8	35.1	10.02	23.81	0.32	21	6.33	21.42	6.13	23.27	0.42	6.3	0.38
22-Jul-92	09:00:00 PM	390.0168	10.7		44.2	19.66	35.24	10.16	23.61	0.52	20.73	6.6	21.31	6.24	23.16	0.53	6.6	0.06
22-Jul-92	09:30:00 PM	420.01632	10.7		44.2	19.67	35.23	10.15	23.62	0.51	20.81	6.52	21.28	6.27	23.2	0.49	6.72	-0.04
22-Jul-92	10:00:00 PM	450.01728	10.7		44.2	19.63	35.27	10.19	23.64	0.49	20.79	6.54	21.24	6.31	23.19	0.5	6.82	-0.14
22-Jul-92	10:30:00 PM	480.0168				19.58	35.32	10.24	23.66	0.47	20.77	6.56	21.2	6.35	23.17	0.52	6.89	-0.21
22-Jul-92	11:00:00 PM	510.01632	10.6		44.3	19.59	35.31	10.23	23.67	0.46	20.77	6.56	21.18	6.37	23.17	0.52	6.93	-0.25
22-Jul-92	11:30:00 PM	540.01728				19.56	35.34	10.26	23.66	0.47	20.74	6.59	21.17	6.38	23.15	0.54	6.98	-0.3
23-Jul-92	12:00:00 AM	570.01728	10.7		44.2	19.58	35.32	10.24	23.66	0.47	20.75	6.58	21.18	6.37	23.14	0.55	7.05	-0.37
23-Jul-92	12:30:00 AM	600.01728				19.57	35.33	10.25	23.66	0.47	20.75	6.58	21.17	6.38	23.14	0.55	7.06	-0.38
23-Jul-92	01:00:00 AM	630.01728	10.6		44.3	19.56	35.34	10.26	23.66	0.47	20.74	6.59	21.17	6.38	23.14	0.55	7.06	-0.4
23-Jul-92	01:30:00 AM	660.01728				19.53	35.37	10.29	23.65	0.48	20.72	6.61	21.14	6.41	23.15	0.54	7.03	-0.35
23-Jul-92	02:00:00 AM	690.01728	10.6		44.3	19.53	35.37	10.29	23.64	0.49	20.73	6.6	21.15	6.4	23.13	0.56	6.97	-0.29
23-Jul-92	02:30:00 AM	720.01728				19.53	35.37	10.29	23.63	0.5	20.73	6.6	21.15	6.4	23.12	0.57	6.89	-0.21
23-Jul-92	03:00:00 AM	750.01728	10.5		44.4	19.51	35.39	10.31	23.62	0.51	20.72	6.61	21.13	6.42	23.12	0.57	6.83	-0.15
23-Jul-92	03:30:00 AM	780.01728				19.52	35.38	10.3	23.6	0.53	20.72	6.61	21.14	6.41	23.11	0.58	6.84	-0.16
23-Jul-92	04:00:00 AM	810.01728	10.5		44.4	19.51	35.39	10.31	23.6	0.53	20.71	6.62	21.13	6.42	23.12	0.57	6.8	-0.12
23-Jul-92	04:30:00 AM	840.01728				19.5	35.4	10.32	23.59	0.54	20.71	6.62	21.12	6.43	23.13	0.56	6.67	0.01
23-Jul-92	05:00:00 AM	870.01728	10.6		44.3	19.54	35.36	10.28	23.57	0.56	20.72	6.61	21.13	6.42	23.12	0.57	6.68	0
23-Jul-92	05:30:00 AM	900.01728				19.52	35.38	10.3	23.55	0.58	20.7	6.63	21.12	6.43	23.11	0.58	6.75	-0.07
23-Jul-92	06:00:00 AM	930.01728	10.7		44.2	19.53	35.37	10.29	23.55	0.58	20.71	6.62	21.13	6.42	23.11	0.58	6.78	-0.1
23-Jul-92	06:30:00 AM	960.01728				19.54	35.36	10.28	23.54	0.59	20.71	6.62	21.13	6.42	23.1	0.59	6.83	-0.15
23-Jul-92	07:00:00 AM	990.01728	10.7		44.2	19.53	35.37	10.29	23.53	0.6	20.71	6.62	21.13	6.42	23.1	0.59	6.89	-0.21
23-Jul-92	07:30:00 AM	1020.01728				19.53	35.37	10.29	23.52	0.61	20.71	6.62	21.13	6.42	23.1	0.59	7.03	-0.35
23-Jul-92	08:00:00 AM	1050.01728	10.8		44.1	19.54	35.36	10.28	23.52	0.61	20.71	6.62	21.12	6.43	23.1	0.59	7.09	-0.41
23-Jul-92	08:30:00 AM	1080.01728				19.53	35.37	10.29	23.51	0.62	20.7	6.63	21.12	6.43	23.1	0.59	7.16	-0.48
23-Jul-92	09:00:00 AM	1110.01728				19.54	35.36	10.28	23.52	0.61	20.71	6.62	21.12	6.43	23.09	0.6	7.17	-0.49
23-Jul-92	09:30:00 AM	1140.01728	11.9		43	19.55	35.35	10.27	23.52	0.61	20.72	6.61	21.13	6.42	23.09	0.6	7.2	-0.52
23-Jul-92	10:00:00 AM	1170.01728	10.8		44.1	19.54	35.36	10.28	23.51	0.62	20.69	6.64	21.11	6.44	23.07	0.62	7.19	-0.51
23-Jul-92	10:30:00 AM	1200.01728				19.53	35.37	10.29	23.51	0.62	20.69	6.64	21.11	6.44	23.06	0.63	7.19	-0.51
23-Jul-92	11:00:00 AM	1230.01728				19.51	35.29	10.21	23.51	0.62	20.72	6.61	21.14	6.41	23.06	0.63	7.2	-0.52
23-Jul-92	11:30:00 AM	1260.01728	10.9		44	19.59	35.31	10.23	23.52	0.61	20.73	6.6	21.14	6.41	23.06	0.63	7.17	-0.49
23-Jul-92	12:00:00 PM	1290.01728	10.9		44	19.62	35.28	10.2	23.52	0.61	20.73	6.6	21.15	6.4	23.05	0.64	7.17	-0.49
23-Jul-92	12:30:00 PM	1320.01728				19.63	35.27	10.19	23.52	0.61	20.73	6.6	21.16	6.39	23.06	0.63	7.18	-0.5
23-Jul-92	01:00:00 PM	1350.01728	10.8		44.1	19.67	35.23	10.16	23.52	0.61	20.76	6.57	21.18	6.37	23.06	0.63	7.19	-0.51
23-Jul-92	01:30:00 PM	1380.01728				19.65	35.26	10.17	23.53	0.6	20.76	6.57	21.18	6.37	23.07	0.62	7.19	-0.51
23-Jul-92	02:00:00 PM	1410.01728				19.64	35.26	10.16			20.72	6.61	21.16	6.39	23.09	0.6	7.18	-0.5
23-Jul-92	02:30:00 PM	1440.01728				19.65	35.25	10.17			20.72	6.61	21.15	6.4	23.1	0.59	7.19	-0.51
23-Jul-92	02:59:01 PM	1470.01728	10.8		44.1	19.64	35.26	10.16	23.53	0.6	20.72	6.61	21.16	6.39	23.09	0.6	7.19	-0.51

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm./ Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT DATE	TIME		CHANNEL 1 SUW PROD	D-DOWN PROD. WELL	CHANNEL 2 SUW OB-1	D-DOWN SUW OB-1		CHANNEL 3 L.HAWTH	D-DOWN L.HAWTH	CHANNEL 4 SUW OB-3	D-DOWN SUW OB-3	CHANNEL 5 SUW OB-2	D-DOWN SUW OB-2	CHANNEL 6 OCAL/AVPK	D-DOWN OCAL/AVPK	CHANNEL 7 U.HAWTH	D-DOWN U.HAWTH
23-Jul-92	03:00:00 PM	1500.01728	10.7	44.2	19.64	35.26	10.18	23.53	0.6	20.72	6.61	21.16	6.39	23.09	0.6	7.19	-0.51
	BEGIN RECOVERY																
23-Jul-92	03:00:01 PM	0	10.7		19.64					20.72		21.16		23.09		7.19	
23-Jul-92	03:00:02 PM	0.01564	11.1	0	19.64	0			0	20.72	0	21.16	0	23.09		7.19	
23-Jul-92	03:00:03 PM	0.03312	14.3	3.2	19.65	0.01				20.73	0.01	21.16	0	23.1		7.19	
23-Jul-92	03:00:04 PM	0.04896	21.6	10.5	19.67	0.03				20.73	0.01	21.16	0	23.09		7.19	
23-Jul-92	03:00:06 PM	0.06208	33.9	22.8	19.71	0.07				20.76	0.04	21.16	0	23.1		7.19	
23-Jul-92	03:00:06 PM	0.11664			19.9	0.26				20.78	0.06	21.17	0.01	23.1		7.2	
23-Jul-92	03:00:10 PM	0.14976			20.34	0.7				20.79	0.07	21.18	0.02	23.1		7.19	
23-Jul-92	03:00:12 PM	0.18288			21.04	1.4				20.85	0.13	21.24	0.08	23.1		7.19	
23-Jul-92	03:00:14 PM	0.216			21.86	2.22				20.95	0.23	21.35	0.19	23.1		7.2	
23-Jul-92	03:00:16 PM	0.24912			22.64	3				21.11	0.39	21.51	0.35	23.1		7.19	
23-Jul-92	03:00:19 PM	0.29952			23.21	3.57				21.31	0.59	21.7	0.54	23.1		7.19	
23-Jul-92	03:00:20 PM	0.3168	61.4	50.3	23.42	3.78				21.51	0.79	21.9	0.74	23.1		7.19	
23-Jul-92	03:00:21 PM	0.33264	57.3	46.2	23.56	3.92				21.61	0.89	22	0.84	23.1		7.19	
23-Jul-92	03:00:22 PM	0.34992	51.4	40.3	23.65	4.01				21.69	0.97	22.08	0.92	23.1		7.19	
23-Jul-92	03:00:23 PM	0.36576	46.6	35.5	23.68	4.04				21.75	1.03	22.14	0.98	23.09		7.19	
23-Jul-92	03:00:25 PM	0.39888	47.9	36.8	23.66	4.02				21.8	1.08	22.2	1.04	23.09		7.19	
23-Jul-92	03:00:26 PM	0.41616	48.3	37.2	23.61	3.97				21.83	1.11	22.22	1.06	23.09		7.19	
23-Jul-92	03:00:27 PM	0.43344	48.5	37.4	23.53	3.89				21.86	1.14	22.24	1.08	23.1		7.19	
23-Jul-92	03:00:28 PM	0.44928	48.6	37.5	23.44	3.8				21.86	1.14	22.24	1.08	23.1		7.19	
23-Jul-92	03:00:29 PM	0.46656	48.7	37.6	23.36	3.72				21.84	1.12	22.21	1.05	23.09		7.19	
23-Jul-92	03:00:31 PM	0.49968	48.6	37.5	23.28	3.64				21.82	1.1	22.2	1.04	23.09		7.19	
23-Jul-92	03:00:32 PM	0.51552	48.5	37.4	23.23	3.59				21.79	1.07	22.17	1.01	23.09		7.19	
23-Jul-92	03:00:33 PM	0.5328	48.4	37.3	23.18	3.54				21.76	1.04	22.14	0.98	23.09		7.19	
23-Jul-92	03:00:34 PM	0.55008	48.3	37.2	23.17	3.53				21.73	1.01	22.12	0.96	23.09		7.19	
23-Jul-92	03:00:35 PM	0.56592	48.5	37.4	23.19	3.55				21.71	0.99	22.11	0.95	23.09		7.19	
23-Jul-92	03:00:36 PM	0.5832	48.7	37.6	23.23	3.59				21.7	0.98	22.11	0.95	23.09		7.19	
23-Jul-92	03:00:38 PM	0.61632	48.9	37.8	23.3	3.66				21.71	0.99	22.12	0.96	23.09		7.19	
23-Jul-92	03:00:39 PM	0.63216	49.2	38.1	23.39	3.75				21.73	1.01	22.14	0.98	23.09		7.19	
23-Jul-92	03:00:40 PM	0.64944	49.2	38.1	23.48	3.84				21.76	1.04	22.18	1.02	23.1		7.19	
23-Jul-92	03:00:41 PM	0.66672	48.9	37.8	23.59	3.95				21.81	1.09	22.22	1.06	23.1		7.19	
23-Jul-92	03:00:42 PM	0.68256	48.9	37.8	23.68	4.04				21.86	1.14	22.27	1.11	23.09		7.18	
23-Jul-92	03:00:44 PM	0.71568	48.8	37.7	23.79	4.15				21.92	1.2	22.33	1.17	23.09		7.18	
23-Jul-92	03:00:45 PM	0.73296	48.8	37.7	23.88	4.24				21.98	1.26	22.4	1.24	23.09		7.18	
23-Jul-92	03:00:46 PM	0.7488	48.8	37.7	23.96	4.32				22.05	1.33	22.46	1.3	23.09		7.18	
23-Jul-92	03:00:47 PM	0.76608	48.9	37.8	24.03	4.39				22.11	1.39	22.52	1.36	23.09		7.18	
23-Jul-92	03:00:48 PM	0.78336	49.1	38	24.08	4.44				22.16	1.44	22.56	1.4	23.1		7.18	
23-Jul-92	03:00:49 PM	0.7992	49.1	38	24.12	4.48				22.2	1.48	22.6	1.44	23.1		7.18	
23-Jul-92	03:00:51 PM	0.83232	49.2	38.1	24.14	4.5				22.24	1.52	22.63	1.47	23.1		7.18	
23-Jul-92	03:00:52 PM	0.8496	49.1	38	24.15	4.51				22.27	1.55	22.65	1.49	23.1		7.18	
23-Jul-92	03:00:57 PM	0.93312	49.1	38	24.14	4.5				22.25	1.53	22.63	1.47	23.1		7.18	
23-Jul-92	03:01:02 PM	1.01664	49.3	38.2	24.15	4.51		23.48	23.48	22.19	1.47	22.58	1.42	23.1		7.18	
23-Jul-92	03:01:07 PM	1.09872	49.3	38.2	24.25	4.61				22.23	1.51	22.64	1.48	23.1		7.18	
23-Jul-92	03:01:12 PM	1.18224	49.4	38.3	24.4	4.76				22.39	1.67	22.78	1.62	23.1		7.17	
23-Jul-92	03:01:17 PM	1.26576	49.5	38.4	24.51	4.87				22.52	1.8	22.9	1.74	23.1		7.17	
23-Jul-92	03:01:22 PM	1.34928	49.6	38.5	24.57	4.93				22.55	1.83	22.91	1.75	23.1		7.17	
23-Jul-92	03:01:27 PM	1.4328	49.6	38.5	24.61	4.97				22.52	1.8	22.89	1.73	23.1		7.17	
23-Jul-92	03:01:32 PM	1.51632	49.7	38.6	24.67	5.03				22.52	1.8	22.91	1.75	23.1		7.17	
23-Jul-92	03:01:37 PM	1.59984	49.3	38.2	24.74	5.1				22.61	1.89	23	1.84	23.1		7.17	
23-Jul-92	03:01:42 PM	1.68336	49.8	38.7	24.81	5.17				22.72	2	23.09	1.93	23.1		7.17	
23-Jul-92	03:01:47 PM	1.76544	49.8	38.7	24.86	5.22				22.77	2.05	23.12	1.96	23.1		7.18	
23-Jul-92	03:01:52 PM	1.84896	49.9	38.8	24.9	5.26				22.75	2.03	23.11	1.95	23.1		7.17	
23-Jul-92	03:01:57 PM	1.93248	49.9	38.8	24.95	5.31				22.76	2.04	23.13	1.97	23.1		7.17	
23-Jul-92	03:02:02 PM	2.016	50	38.9	25	5.36		23.48	23.48	22.81	2.09	23.18	2.02	23.1		7.17	
23-Jul-92	03:02:07 PM	2.09952	50	38.9	25.04	5.4				22.88	2.16	23.24	2.08	23.1		7.17	
23-Jul-92	03:02:12 PM	2.18304	50	38.9	25.09	5.45				22.93	2.21	23.28	2.12	23.1		7.17	
23-Jul-92	03:02:17 PM	2.26656	50.1	39	25.13	5.49				22.94	2.22	23.29	2.13	23.1		7.17	
23-Jul-92	03:02:22 PM	2.35008	50.1	39	25.18	5.52				22.94	2.22	23.3	2.14	23.1		7.17	
23-Jul-92	03:02:32 PM	2.51568	50.1	39	25.23	5.59				23.03	2.31	23.38	2.22	23.1		7.17	
23-Jul-92	03:02:42 PM	2.68272	50.2	39.1	25.31	5.67				23.09	2.37	23.43	2.27	23.1		7.17	
23-Jul-92	03:02:52 PM	2.84976	50.3	39.2	25.37	5.73				23.11	2.39	23.47	2.31	23.1		7.17	
23-Jul-92	03:03:02 PM	3.01536	50.3	39.2	25.43	5.79		23.48	23.48	23.19	2.47	23.53	2.37	23.09		7.17	
23-Jul-92	03:03:12 PM	3.1824	50.4	39.3	25.49	5.85				23.23	2.51	23.56	2.4	23.09		7.17	
23-Jul-92	03:03:22 PM	3.34944	50.4	39.3	25.55	5.91				23.27	2.55	23.61	2.45	23.09		7.17	
23-Jul-92	03:03:32 PM	3.51648	50.5	39.4	25.6	5.96				23.32	2.6	23.65	2.49	23.09		7.17	

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm./ Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT DATE	TIME		CHANNEL 1 SUW PROD	D-DOWN PROD. WELL	CHANNEL 2 SUW OB-1	D-DOWN SUW OB-1	CHANNEL 3 L.HAWTH	D-DOWN L.HAWTH	CHANNEL 4 SUW OB-3	D-DOWN SUW OB-3	CHANNEL 5 SUW OB-2	D-DOWN SUW OB-2	CHANNEL 6 OCAL/AVPK	D-DOWN OCAL/AVPK	CHANNEL 7 U.HAWTH	D-DOWN U.HAWTH
23-Jul-92	03:03:42 PM	3.68208	50.5	39.4	25.65	6.01			23.35	2.63	23.68	2.52	23.1		7.17	
23-Jul-92	03:03:52 PM	3.84912	50.6	39.5	25.69	6.05			23.4	2.68	23.72	2.56	23.09		7.17	
23-Jul-92	03:04:02 PM	4.01616	50.6	39.5	25.73	6.09	23.43	23.43	23.43	2.71	23.75	2.59	23.09		7.17	
23-Jul-92	03:04:12 PM	4.1832	50.6	39.5	25.78	6.14			23.46	2.74	23.79	2.63	23.1		7.17	
23-Jul-92	03:04:22 PM	4.3488	50.7	39.6	25.82	6.18			23.51	2.79	23.83	2.67	23.1		7.17	
23-Jul-92	03:04:32 PM	4.51584	50.7	39.6	25.86	6.22			23.54	2.82	23.86	2.7	23.1		7.17	
23-Jul-92	03:04:42 PM	4.68288	50.7	39.6	25.9	6.26			23.57	2.85	23.89	2.73	23.1		7.17	
23-Jul-92	03:04:52 PM	4.84992	50.8	39.7	25.93	6.29			23.61	2.89	23.92	2.76	23.1		7.17	
23-Jul-92	03:05:02 PM	5.01552	50.8	39.7	25.97	6.33	23.43	23.43	23.63	2.91	23.94	2.78	23.1		7.17	
23-Jul-92	03:05:12 PM	5.18256	50.9	39.8	26	6.36			23.67	2.95	23.98	2.82	23.1		7.17	
23-Jul-92	03:05:22 PM	5.3496	51	39.9	26.05	6.41			23.69	2.97	24	2.84	23.1		7.17	
23-Jul-92	03:05:52 PM	5.84928	51	39.9	26.13	6.49			23.77	3.05	24.08	2.92	23.1		7.17	
23-Jul-92	03:06:22 PM	6.34896	51.1	40	26.22	6.58	23.43	23.43	23.85	3.13	24.16	3	23.1		7.17	
23-Jul-92	03:06:52 PM	6.84864	51.1	40	26.3	6.66			23.92	3.2	24.22	3.06	23.1		7.17	
23-Jul-92	03:07:22 PM	7.34976	51.2	40.1	26.37	6.73			23.96	3.26	24.28	3.12	23.1		7.17	
23-Jul-92	03:07:52 PM	7.84944	51.3	40.2	26.43	6.79			24.04	3.32	24.34	3.18	23.1		7.17	
23-Jul-92	03:08:22 PM	8.34912	51.3	40.2	26.5	6.86	23.13	23.13	24.1	3.38	24.41	3.25	23.11		7.17	
23-Jul-92	03:08:52 PM	8.8488	51.4	40.3	26.56	6.92			24.15	3.43	24.46	3.3	23.11		7.17	
23-Jul-92	03:09:22 PM	9.34992	51.4	40.3	26.62	6.98			24.2	3.48	24.51	3.35	23.11		7.17	
23-Jul-92	03:09:52 PM	9.8496	51.5	40.4	26.67	7.03			24.25	3.53	24.56	3.4	23.11		7.17	
23-Jul-92	03:10:22 PM	10.34928	51.5	40.4	26.72	7.08	23.08	23.08	24.3	3.58	24.6	3.44	23.12		7.17	
23-Jul-92	03:10:52 PM	10.84896	51.6	40.5	26.77	7.13			24.34	3.62	24.64	3.48	23.12		7.17	
23-Jul-92	03:11:22 PM	11.35008	51.6	40.5	26.82	7.18			24.38	3.66	24.69	3.53	23.12		7.17	
23-Jul-92	03:11:52 PM	11.84976	51.6	40.5	26.86	7.22			24.43	3.71	24.73	3.57	23.13		7.17	
23-Jul-92	03:12:22 PM	12.34944	51.7	40.6	26.9	7.26	23.03	23.03	24.46	3.74	24.77	3.61	23.13		7.17	
23-Jul-92	03:12:52 PM	12.84912	51.7	40.6	26.95	7.31			24.51	3.79	24.8	3.64	23.14		7.17	
23-Jul-92	03:13:22 PM	13.3488	51.8	40.7	26.99	7.35			24.54	3.82	24.84	3.68	23.14		7.17	
23-Jul-92	03:13:52 PM	13.84992	51.8	40.7	27.02	7.38			24.57	3.85	24.87	3.71	23.13		7.16	
23-Jul-92	03:14:22 PM	14.3496	51.8	40.7	27.06	7.42	23.03	23.03	24.61	3.89	24.9	3.74	23.14		7.14	
23-Jul-92	03:14:52 PM	14.84928	51.9	40.8	27.1	7.46			24.64	3.92	24.94	3.78	23.14		7.14	
23-Jul-92	03:15:22 PM	15.34896	51.9	40.8	27.14	7.5			24.68	3.96	24.97	3.81	23.14		7.15	
23-Jul-92	03:16:22 PM	16.34976	51.9	40.8	27.2	7.56	23.03	23.03	24.74	4.02	25.03	3.87	23.15		7.15	
23-Jul-92	03:17:22 PM	17.34912	52	40.9	27.26	7.62			24.79	4.07	25.09	3.93	23.15		7.15	
23-Jul-92	03:18:22 PM	18.34992	52.1	41	27.31	7.67	23.03	23.03	24.84	4.12	25.14	3.98	23.16		7.14	
23-Jul-92	03:19:22 PM	19.34928	52.1	41	27.37	7.73			24.9	4.18	25.19	4.03	23.16		7.14	
23-Jul-92	03:20:22 PM	20.35008	52.2	41.1	27.42	7.78	23.02	23.02	24.94	4.22	25.23	4.07	23.16		7.13	
23-Jul-92	03:21:22 PM	21.34944	52.2	41.1	27.47	7.83			24.99	4.27	25.28	4.12	23.17		7.13	
23-Jul-92	03:22:22 PM	22.3488	52.3	41.2	27.52	7.88			25.03	4.31	25.33	4.17	23.17		7.14	
23-Jul-92	03:23:22 PM	23.3496	52.3	41.2	27.56	7.92			25.06	4.36	25.37	4.21	23.17		7.15	
23-Jul-92	03:24:22 PM	24.34896	52.3	41.2	27.6	7.96			25.12	4.4	25.41	4.25	23.18		7.15	
23-Jul-92	03:25:22 PM	25.34976	52.4	41.3	27.65	8.01	23	23	25.16	4.44	25.46	4.3	23.18		7.16	
23-Jul-92	03:26:22 PM	26.34912	52.4	41.3	27.69	8.05			25.2	4.48	25.49	4.33	23.19		7.16	
23-Jul-92	03:27:22 PM	27.34992	52.5	41.4	27.73	8.09			25.24	4.52	25.53	4.37	23.19		7.16	
23-Jul-92	03:28:22 PM	28.34928	52.5	41.4	27.77	8.13			25.28	4.56	25.58	4.4	23.19		7.16	
23-Jul-92	03:29:22 PM	29.34864	52.5	41.4	27.8	8.16			25.31	4.59	25.6	4.44	23.2		7.16	
23-Jul-92	03:30:22 PM	30.34944	52.5	41.4	27.84	8.2	22.99	22.99	25.34	4.62	25.63	4.47	23.2		7.16	
23-Jul-92	03:33:22 PM	33.34896	52.7	41.6	27.94	8.3			25.43	4.71	25.73	4.57	23.21		7.16	
23-Jul-92	03:36:22 PM	36.34992	52.7	41.6	28.03	8.39	22.98	22.98	25.53	4.81	25.81	4.65	23.22		7.16	
23-Jul-92	03:39:22 PM	39.34944	52.8	41.7	28.11	8.47			25.6	4.88	25.89	4.73	23.23		7.17	
23-Jul-92	03:42:22 PM	42.34896	53	41.9	28.19	8.55	22.98	22.98	25.67	4.95	25.96	4.8	23.23		7.16	
23-Jul-92	03:45:22 PM	45.34992	53	41.9	28.26	8.62			25.74	5.02	26.03	4.87	23.23		7.17	
23-Jul-92	03:48:22 PM	48.34944	53	41.9	28.32	8.68			25.81	5.09	26.1	4.94	23.24		7.17	
23-Jul-92	03:51:22 PM	51.34896	53.1	42	28.38	8.74	23	23	25.86	5.14	26.15	4.99	23.25		7.17	
23-Jul-92	03:54:22 PM	54.34992	53.1	42	28.44	8.8			25.92	5.2	26.21	5.05	23.26		7.17	
23-Jul-92	03:57:22 PM	57.34944	53.2	42.1	28.5	8.86			25.98	5.26	26.27	5.11	23.28		7.18	
23-Jul-92	04:00:22 PM	60.34896	53.2	42.1	28.55	8.91	23	23	26.03	5.31	26.31	5.15	23.28		7.18	
23-Jul-92	04:05:22 PM	65.35008	53.3	42.2	28.63	8.99			26.11	5.39	26.4	5.24	23.29		7.17	
23-Jul-92	04:10:22 PM	70.34976	53.4	42.3	28.7	9.06			26.18	5.46	26.47	5.31	23.3		7.16	
23-Jul-92	04:15:22 PM	75.34944	53.4	42.3	28.75	9.11			26.23	5.51	26.52	5.36	23.3		7.16	
23-Jul-92	04:20:22 PM	80.34912	53.5	42.4	28.82	9.18			26.3	5.58	26.58	5.42	23.31		7.16	
23-Jul-92	04:25:22 PM	85.3488	53.5	42.4	28.87	9.23			26.34	5.62	26.63	5.47	23.32		7.16	
23-Jul-92	04:30:22 PM	90.34992	53.6	42.5	28.93	9.29			26.4	5.68	26.69	5.53	23.35		7.17	
23-Jul-92	04:35:22 PM	95.3496	53.7	42.6	28.99	9.35			26.45	5.73	26.75	5.59	23.36		7.17	
23-Jul-92	04:40:22 PM	100.34928	53.7	42.6	29.02	9.38			26.5	5.78	26.8	5.64	23.37		7.18	
23-Jul-92	04:45:22 PM	105.34896	53.7	42.6	29.09	9.45			26.55	5.83	26.85	5.69	23.38		7.19	
23-Jul-92	04:50:22 PM	110.35008	53.8	42.7	29.12	9.48			26.59	5.87	26.88	5.72	23.39		7.2	

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm./ Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT DATE	TIME		CHANNEL 1 SUW PROD	D-DOWN PROD. WELL	CHANNEL 2 SUW OB-1	D-DOWN SUW OB-1	CHANNEL 3 L.HAWTH	D-DOWN L.HAWTH	CHANNEL 4 SUW OB-3	D-DOWN SUW OB-3	CHANNEL 5 SUW OB-2	D-DOWN SUW OB-2	CHANNEL 6 OCAL/AVPK	D-DOWN OCAL/AVPK	CHANNEL 7 U.HAWTH	D-DOWN U.HAWTH
23-Jul-92	04:55:22 PM	115.34976	53.8	42.7	29.17	9.53			26.83	5.91	26.92	5.76	23.4		7.21	
23-Jul-92	05:00:22 PM	120.34944	53.9	42.8	29.19	9.55			26.86	5.94	26.95	5.79	23.4		7.23	
23-Jul-92	05:15:22 PM	135.34992	54	42.9	29.29	9.65	23.1	23.1	26.75	6.03	27.04	5.88	23.42		7.27	
23-Jul-92	05:30:22 PM	150.34896	54.1	43	29.38	9.74			26.84	6.12	27.13	5.97	23.45		7.27	
23-Jul-92	05:45:22 PM	165.34944	54.1	43	29.45	9.81			26.9	6.18	27.19	6.03	23.45		7.28	
23-Jul-92	06:00:22 PM	180.34992	54.2	43.1	29.51	9.87	23.16	23.16	26.96	6.24	27.25	6.09	23.47		7.32	
23-Jul-92	06:15:22 PM	195.34896	54.2	43.1	29.56	9.92			27.02	6.3	27.31	6.15	23.49		7.35	
23-Jul-92	06:30:22 PM	210.34944	54.3	43.2	29.62	9.96	23.18	23.18	27.07	6.35	27.35	6.19	23.49		7.37	
23-Jul-92	06:45:22 PM	225.34992	54.3	43.2	29.65	10.01			27.12	6.4	27.4	6.24	23.51		7.43	
23-Jul-92	07:00:22 PM	240.34896	54.4	43.3	29.71	10.07			27.17	6.45	27.45	6.29	23.53		7.47	
23-Jul-92	07:15:22 PM	255.34944	54.4	43.3	29.74	10.1			27.2	6.48	27.47	6.31	23.53		7.52	
23-Jul-92	07:30:22 PM	270.34992	54.4	43.3	29.77	10.13			27.23	6.51	27.51	6.35	23.54		7.57	
23-Jul-92	06:00:00 PM	299.98224	54.5	43.4	29.81	10.17			27.27	6.55	27.54	6.38	23.55		7.59	
23-Jul-92	06:02:00 PM	301.9824	54.5	43.4	29.83	10.19			27.28	6.56	27.56	6.4	23.55		7.62	
23-Jul-92	06:32:00 PM	331.98336	54.4	43.3	29.83	10.19			27.27	6.55	27.57	6.41	23.53		7.71	
23-Jul-92	09:02:00 PM	361.98288	54.5	43.4	29.88	10.24			27.33	6.61	27.59	6.43	23.55		7.82	
23-Jul-92	09:32:00 PM	391.9824	54.6	43.5	29.92	10.28			27.38	6.66	27.64	6.48	23.55		7.92	
23-Jul-92	10:02:00 PM	421.98336	54.7	43.6	29.96	10.32			27.42	6.7	27.67	6.51	23.56		7.98	
23-Jul-92	10:32:00 PM	451.98288	54.7	43.6	29.98	10.34			27.46	6.74	27.71	6.55	23.57		8.08	
23-Jul-92	11:02:00 PM	481.9824	54.8	43.7	30.01	10.37			27.47	6.75	27.73	6.57	23.57		8.14	
23-Jul-92	11:02:00 PM	481.9824	54.8	43.7	30.03	10.39			27.5	6.78	27.76	6.6	23.58		8.2	
24-Jul-92	12:02:00 AM	541.9824	54.8	43.7	30.07	10.43			27.53	6.81	27.78	6.62	23.59		8.21	
24-Jul-92	12:32:00 AM	571.9824	54.8	43.7	30.09	10.45			27.56	6.84	27.81	6.65	23.6		8.24	
24-Jul-92	01:02:00 AM	601.9824	54.8	43.7	30.11	10.47			27.59	6.87	27.84	6.68	23.61		8.3	
24-Jul-92	01:32:00 AM	631.9824	54.8	43.7	30.15	10.51			27.62	6.9	27.87	6.71	23.64		8.3	
24-Jul-92	02:02:00 AM	661.9824	54.8	43.7	30.17	10.53			27.65	6.93	27.9	6.74	23.67		8.33	
24-Jul-92	02:32:00 AM	691.9824	54.8	43.7	30.2	10.56			27.66	6.94	27.92	6.76	23.68		8.19	
24-Jul-92	03:02:00 AM	721.9824	54.8	43.7	30.21	10.57			27.68	6.96	27.94	6.78	23.69		8.14	
24-Jul-92	03:32:00 AM	751.9824	54.9	43.8	30.23	10.59			27.7	6.98	27.96	6.8	23.7		8.04	
24-Jul-92	04:02:00 AM	781.9824	54.9	43.8	30.26	10.62			27.72	7	27.97	6.81	23.72		7.97	
24-Jul-92	04:32:00 AM	811.9824	54.9	43.8	30.28	10.64			27.74	7.02	28	6.84	23.73		7.89	
24-Jul-92	05:02:00 AM	841.9824	54.9	43.8	30.29	10.65			27.75	7.03	28.01	6.85	23.74		7.86	
24-Jul-92	05:32:00 AM	871.9824	54.9	43.8	30.3	10.66			27.77	7.05	28.03	6.87	23.75		7.81	
24-Jul-92	06:02:00 AM	901.9824	54.9	43.8	30.31	10.67			27.78	7.06	28.03	6.87	23.75		7.83	
24-Jul-92	06:32:00 AM	931.9824	54.9	43.8	30.32	10.68			27.78	7.06	28.04	6.88	23.76		7.87	
24-Jul-92	07:02:00 AM	961.9824	54.9	43.8	30.32	10.68			27.78	7.06	28.04	6.88	23.75		7.87	
24-Jul-92	07:32:00 AM	991.9824	54.9	43.8	30.33	10.69			27.79	7.07	28.04	6.88	23.75		7.87	
24-Jul-92	08:02:00 AM	1021.9824	54.9	43.8	30.33	10.69			27.79	7.07	28.04	6.88	23.74		7.83	
24-Jul-92	08:32:00 AM	1051.9824	54.9	43.8	30.33	10.69			27.79	7.07	28.04	6.88	23.74		7.81	
24-Jul-92	09:02:00 AM	1081.9824	54.9	43.8	30.34	10.7			27.8	7.08	28.05	6.89	23.74		7.81	
24-Jul-92	09:32:00 AM	1111.9824	54.9	43.8	30.34	10.7			27.8	7.08	28.05	6.89	23.74		7.83	
24-Jul-92	10:02:00 AM	1141.9824	55	43.9	30.35	10.71			27.82	7.1	28.07	6.91	23.74		7.84	
24-Jul-92	10:32:00 AM	1171.9824	55	43.9	30.37	10.73			27.84	7.12	28.08	6.92	23.75		7.87	
24-Jul-92	11:02:00 AM	1201.9824	55	43.9	30.37	10.73			27.84	7.12	28.09	6.93	23.74		7.88	
24-Jul-92	11:32:00 AM	1231.9824	55	43.9	30.39	10.75			27.84	7.12	28.1	6.94	23.75		7.92	
24-Jul-92	12:02:00 PM	1261.9824	55	43.9	30.4	10.76			27.86	7.14	28.1	6.94	23.76		7.93	
24-Jul-92	12:32:00 PM	1291.9824	55	43.9	30.41	10.77			27.86	7.14	28.11	6.95	23.76		7.94	
24-Jul-92	01:02:00 PM	1321.9824	55	43.9	30.41	10.77			27.86	7.14	28.11	6.95	23.77		7.96	
24-Jul-92	01:32:00 PM	1351.9824	55	43.9	30.41	10.77			27.87	7.15	28.13	6.97	23.77		8.01	
24-Jul-92	02:02:00 PM	1381.9824	55	43.9	30.43	10.79			27.89	7.17	28.14	6.98	23.78		8.02	
24-Jul-92	02:32:00 PM	1411.9824	55	43.9	30.44	10.8			27.9	7.18	28.16	7	23.8		8.04	
24-Jul-92	03:02:00 PM	1441.9824	55	43.9	30.44	10.8			27.9	7.18	28.15	6.99	23.78		8.06	
24-Jul-92	03:32:00 PM	1471.9824	55	43.9	30.46	10.82			27.91	7.19	28.16	7	23.81		8.15	
24-Jul-92	04:02:00 PM	1501.9824	55	43.9	30.47	10.83			27.91	7.19	28.17	7.01	23.82		8.19	
24-Jul-92	04:32:00 PM	1531.9824	55	43.9	30.47	10.83			27.92	7.2	28.17	7.01	23.84		8.23	
24-Jul-92	05:02:00 PM	1561.9824	55	43.9	30.46	10.82			27.91	7.19	28.16	7	23.83		8.12	
24-Jul-92	05:32:00 PM	1591.9824	55	43.9	30.47	10.83			27.92	7.2	28.17	7.01	23.83		8.19	
24-Jul-92	06:02:00 PM	1621.9824	55	43.9	30.47	10.83			27.92	7.2	28.18	7.02	23.84		8.31	
24-Jul-92	06:32:00 PM	1651.9824	55	43.9	30.47	10.83			27.92	7.2	28.18	7.02	23.84		8.35	
24-Jul-92	07:02:00 PM	1681.9824	55	43.9	30.47	10.83			27.91	7.19	28.17	7.01	23.83		8.36	
24-Jul-92	07:32:00 PM	1711.9824	55	43.9	30.47	10.83			27.91	7.19	28.17	7.01	23.83		8.29	
24-Jul-92	08:02:00 PM	1741.9824	55	43.9	30.47	10.83			27.92	7.2	28.17	7.01	23.85		8.32	
24-Jul-92	08:32:00 PM	1771.9824	55	43.9	30.47	10.83			27.93	7.21	28.19	7.03	23.86		8.36	
24-Jul-92	09:02:00 PM	1801.9824	55	43.9	30.47	10.83			27.92	7.2	28.18	7.02	23.86		8.48	
24-Jul-92	09:32:00 PM	1831.9824	55	43.9	30.47	10.83			27.92	7.2	28.17	7.01	23.85		8.55	
24-Jul-92	10:02:00 PM	1861.9824	55	43.9	30.47	10.83			27.92	7.2	28.18	7.02	23.85		8.56	

D.J. DeWitt, Geohydrologic Data : ROMP 20 OSPREY, WRAP # 4 : Suwannee Fm./ Floridan APT. 7-22-92 to 7-27-92

24.5 hour pumping phase from 7/22, 2:30 PM to 7/23, 3:00 PM.
19 hour recovery phase from 7/23, 3:00 PM to 7/24, 10:00 AM.
Background data collected for 5 hours prior to pumping, and for 63 hours after recovery.
Discharge rate 1300 GPM. Discharge water quality, 3300 umhos to 3700 umhos conductivity.
Total discharge volume, 1,911,000 gallons.

R-20 FLORIDAN APT DATE	TIME		CHANNEL 1 SUW PROD	D-DOWN PROD. WELL	CHANNEL 2 SUW OB-1	D-DOWN SUW OB-1	CHANNEL 3 L.HAWTH	D-DOWN L.HAWTH	CHANNEL 4 SUW OB-3	D-DOWN SUW OB-3	CHANNEL 5 SUW OB-2	D-DOWN SUW OB-2	CHANNEL 6 OCAL/AVPK	D-DOWN OCAL/AVPK	CHANNEL 7 U.HAWTH	D-DOWN U.HAWTH
24-Jul-92	10:32:00 PM	1891.9824	55	43.9	30.47	10.83			27.92	7.2	28.18	7.02	23.85		8.58	
24-Jul-92	11:02:00 PM	1921.9824	55	43.9	30.47	10.83			27.92	7.2	28.18	7.02	23.86		8.55	
24-Jul-92	11:02:00 PM	1951.9824	55	43.9	30.48	10.84			27.93	7.21	28.19	7.03	23.87		8.52	