HAWAII SCIENTIFIC DRILLING PROJECT

CORE LOGS AND SUMMARIZING DATA 1999

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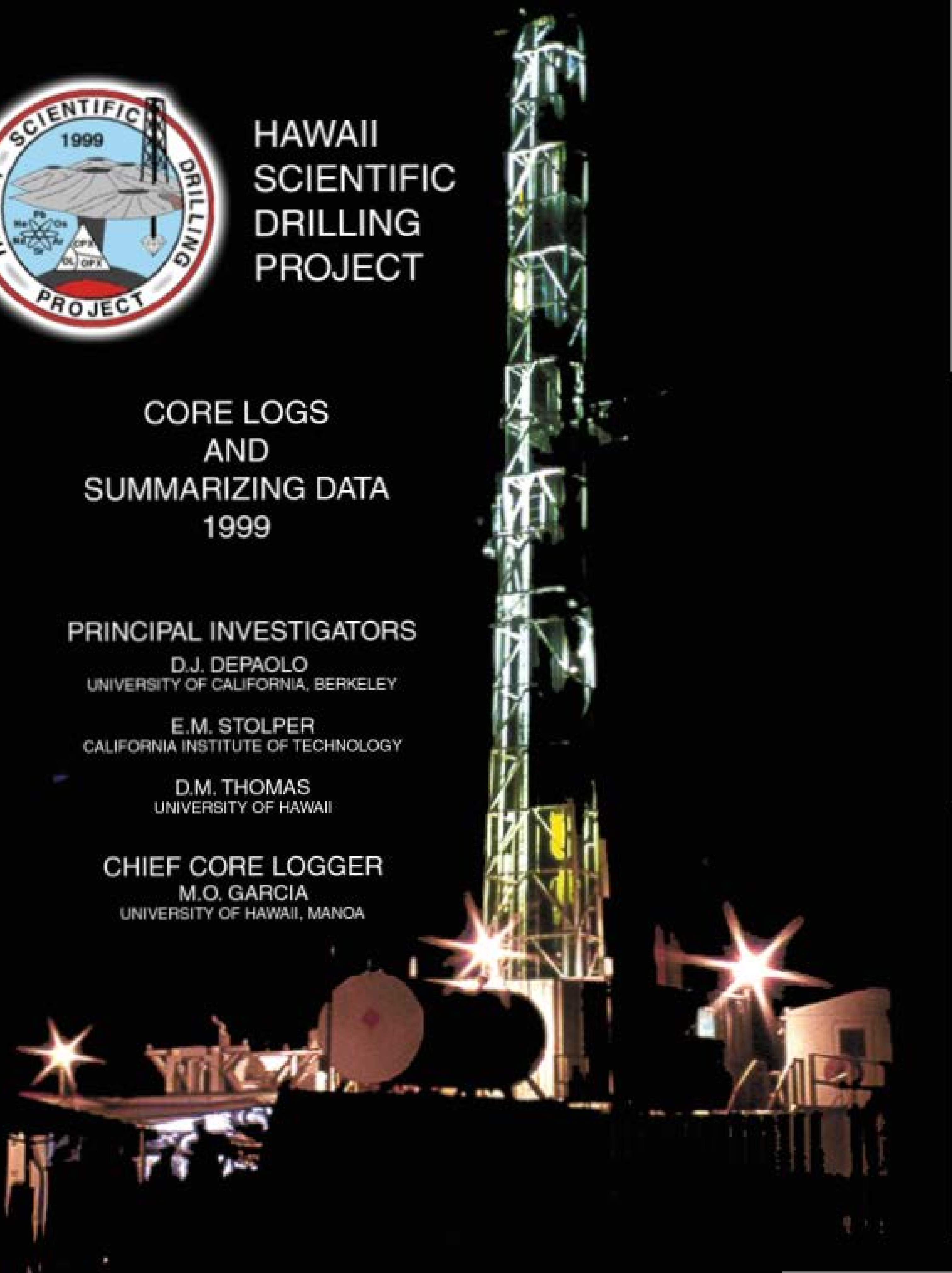

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The initials of the logger for each box are listed in the core logging pages. If two loggers collaborated on logging a box, both loggers' initials are listed, separated by a comma. If one logger later revised the work of another logger, as happened during the revision of logging procedures for hyaloclastites, the original logger is listed first followed by a slash and the initials of the logger who revised the log.

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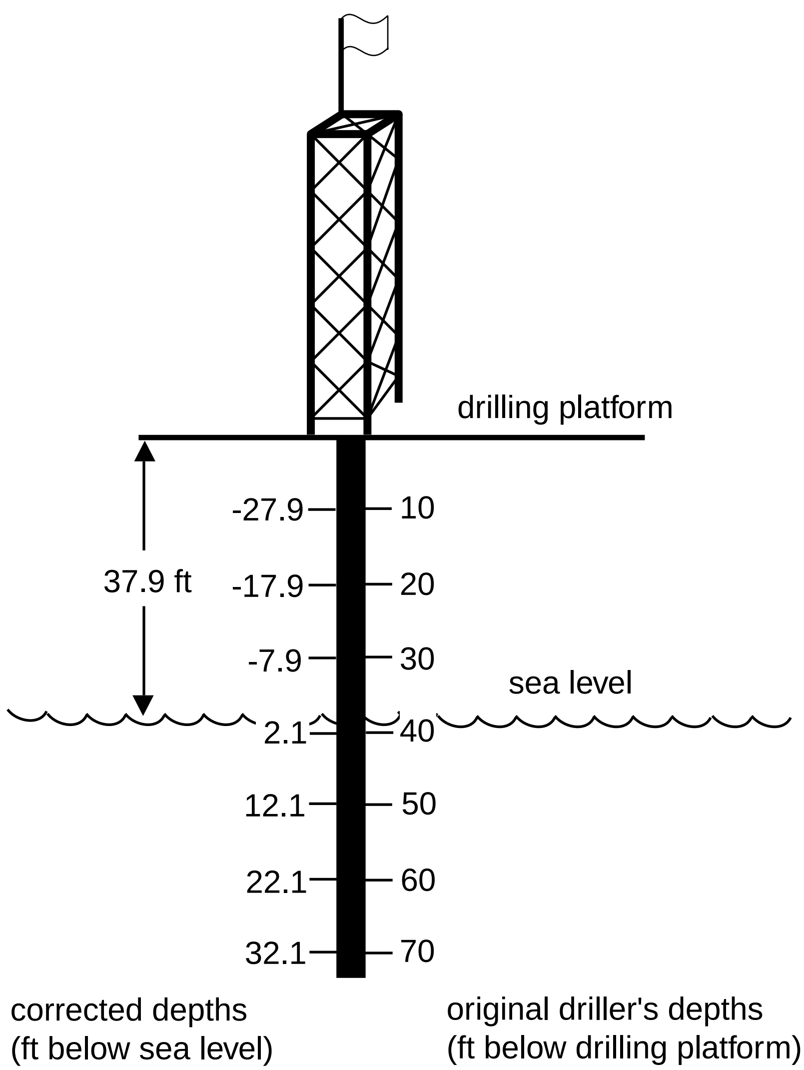
*****PLEASE NOTE*****

All depths listed in this volume are driller's depths which have been corrected to account for the elevation of the drilling platform. Original run and box depths recorded at the drill site, and depths of many samples that were collected and distributed were in "feet below the drilling platform." Corrected depths are listed as ft bsl (feet below sea level) and are calculated by subtracting 37.9 feet from the original depths (see diagram below). If you are working with HSDP samples please note this change and correct the depths you have calculated for your samples so we can keep depth information consistent. To further prevent confusion, please name all samples according to the HSDP naming convention. This format is SRXXXX-YY.YY (S for sample and R for run). The four digit run number and relative depth within the run allow the exact location of the sample to be plotted directly by looking at the sample name. Also be aware that depth labels seen in the box photographs are original, uncorrected depths. However, all other depths recorded in this volume are corrected and listed as ft bsl.



THE HSDP WEB SITE

The Drilling Information System (DIS) database and the HSDP web site were created to organize the vast amount of information collected at the drill site and to present it to the community of HSDP researchers who are following the progress of the project from around the globe. The international nature of the HSDP makes the Internet an especially valuable tool for exchanging information and consolidating research efforts related to HSDP.

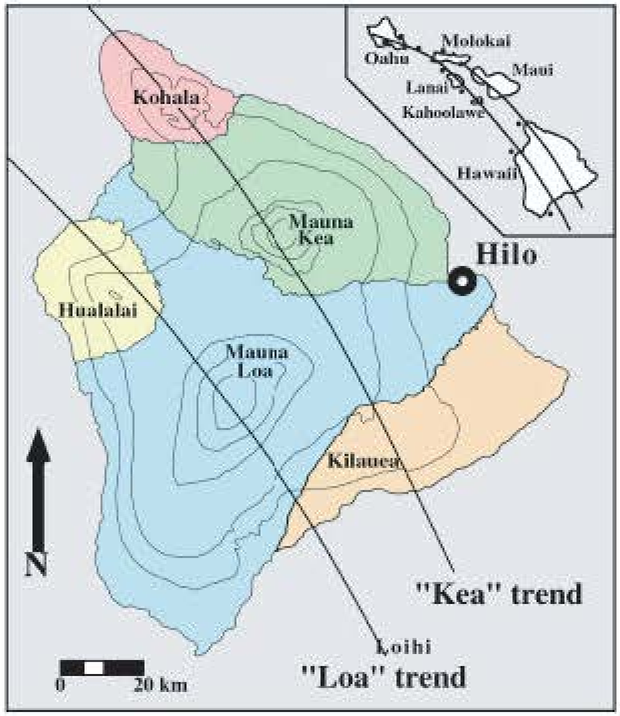
Throughout the duration of drilling and logging in Hilo, information was entered into the DIS database and uploaded daily to the HSDP web site to allow cooperating researchers to have near real time access to project data. Daily data packages contained updates on all information collected at the site for that day: core run and box depths, core logs, digital photographs of core boxes and drill site activity, and reports on drilling engineering and progress. Archives of the daily data reports are available on the HSDP web site along with the summarizing tables and core logs found in this volume. In addition, images of the archive core boxes and high-resolution digital scans of every individual core piece can be viewed on the web site. The HSDP web site is currently maintained by GeoForschungsZentrum Potsdam (GFZ) in Germany. The URL for the HSDP web site is http://icdp.gfz-potsdam.de/html/hawaii/news.html. The site also has a link to data from the 1993 pilot hole project.

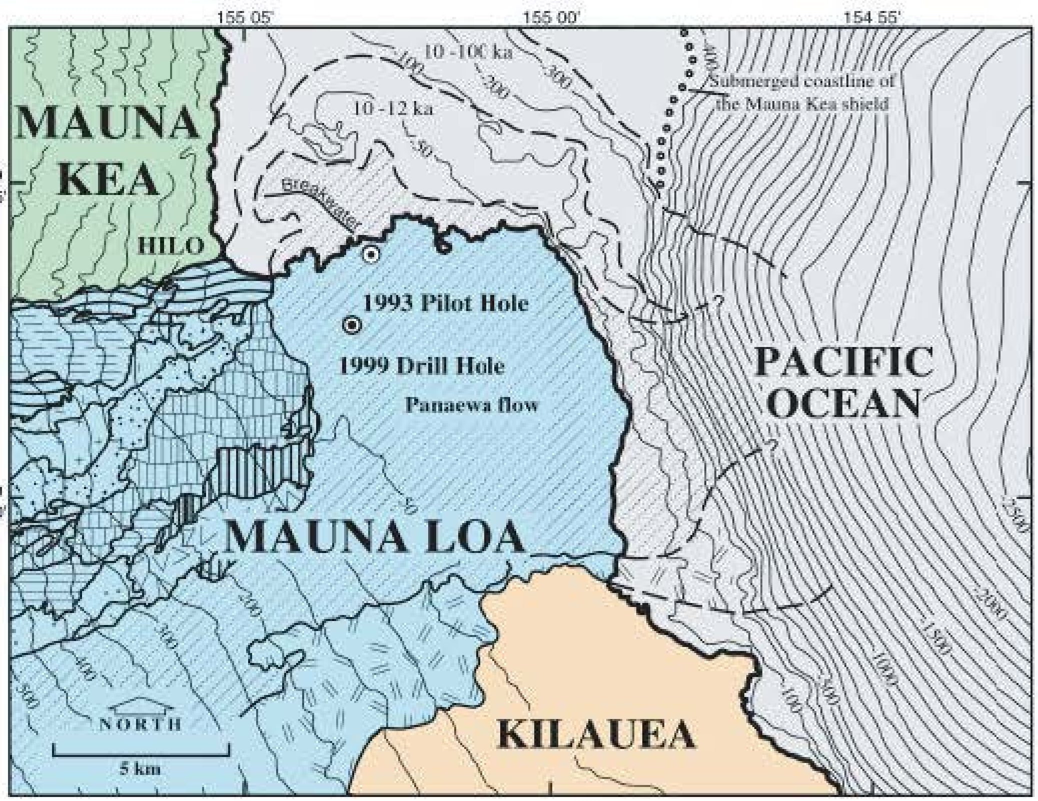
THE DRILLING INFORMATION SYSTEM (DIS) DATABASE AND THE DIS WEB-INTERFACE

The DIS database is a customized Microsoft Access database developed by Ronald Conze (Operational Support Group ICDP at GFZ) and Frank Krysiak (smartcube ltd., Germany). The general structure of the database is organized to record all information collected during a drilling project. Specific data structures and input forms were tailored to the needs of HSDP and were modified as needed during the course of the project. Within the database are standardized input forms for core logging, sample information and other drilling data. Volunteers, HSDP staff members, project P.I.s and visiting scientists performed core logging and data entries into DIS. The use of standardized logging and data input forms helped to ensure that core loggers evaluated a consistent set of criteria and that data were entered in the database in the proper format and style. Data in DIS, including the annotations on box photographs, may be searched and filtered to obtain subsets of information. For more information about the DIS or the HSDP web site, contact Ronald Conze (conze@gfz-potsdam.de).

The DIS is also designed to accommodate analytical data produced by investigators working on HSDP drill core. Members of the HSDP research community can view current HSDP data including preliminary geochemical, petrological and geophysical research results and also enter information through the web-interface with the DIS database. The web interface is intended to provide a forum for collaboration and discussion of research results among HSDP investigators. Access to the DIS web interface is available to all HSDP researchers who are performing analyses on the drill core or who are participating in well logging activities. Investigators can enter preliminary research results by performing a simple data registration procedure and then sending data as text files or jpeg images to the DIS administrator. Then any registered member of the HSDP community can view and download the information from the secure web site. To obtain an account and password and find out more about how to use the web-interface, contact Caroline Seaman at seaman@gps.caltech.edu.

MAP OF DRILL SITE LOCATION





CORE HANDLING PROCEDURES

General statement

A prerequisite for the success of the Hawaii Scientific Drilling Project (HSDP) is the acquisition and documentation of continuous cores in stratigraphic sequence. We describe here the procedures followed for core handling and preparation, the splitting of the core into working and archive halves, and primary core descriptions.

Core preparation

Core drilling was conducted 24 hours a day using wire-line techniques. Handling and curation procedures began when the inner core barrel was removed from the hole. After consultation with the core driller and a brief training program for the drilling crew regarding the importance of maintaining core orientation, sequencing and continuity, removal of the core from the inner core barrel was done by the drilling hands under the supervision of the core driller. In order to avoid contamination of the core by phosphorous and rare earth elements, no smoking was allowed near the core, and all hand jewelry was removed to minimize contamination by platinum group elements.

1. Removal of the core from the core barrel
   a) The core was removed from the core barrel by the drilling crew and placed in sequentially numbered 6’ PVC trays. The PVC trays were securely mounted on 8” wide planks which provided stability and allowed drainage of water and drilling mud through ~5 mm diameter holes spaced evenly along the bottoms of the PVC trays. Orange paint was used to mark the tops of the trays, and drillers were careful to place the top of the core at the top of the tray. Once the trays were filled with core they were fitted with end blocks and PVC top covers. The core trays were stacked in sequence under a tarp awning adjacent to the drilling rig until they were transported to the processing area by the core logging team.
   b) For each core run, the drilling crew prepared a wooden block with the core run number, the top and bottom driller’s depths, and the amount of core recovered. The wooden block was placed at the top of the appropriate PVC core tray and remained with the core run until the core was completely washed, marked, and boxed.
   c) At the start of each day, members of the core logging team inspected core that had accumulated during the previous night before transporting it to the core handling area. For each core run, the lead team member checked that the PVC trays were properly oriented and arranged in sequence and that the information on the wooden block was correct.
   d) The trays were transported to the core logging area on a flatbed trailer. Members of the core logging team either rode on the trailer or walked behind the trailer to ensure that the core trays were not disturbed during transport
2. Washing
   a) The core trays were laid out on the core-washing area (a gently sloping concrete pad) with the trays for each run arranged in sequence.
   b) The core was washed carefully and thoroughly using water hoses and brushes to remove drilling mud and rock cuttings. Special care was taken during the washing of soil or non-coherent core to prevent disruption or loss of core.
   c) After washing, the entire core logging team reviewed the recovered core. Any unusual geologic features and contacts were identified and noted by the lead team member. This core review also helped to identify any mix-ups or misorientations of the core that occurred during handling.
3. Run information and core boxing
   a) Individual core runs were placed on working tables for preliminary logging. A Run Information Form (RIF) was filled out for each core run. The run number, driller’s depths, date, and any unusual conditions related to the recovery of the core were noted on the RIF (see Figure 1).
   b) The core was aligned, and individual pieces were fitted together where possible. The top of the core run being processed was compared to the bottom of the previous core run, and it was noted on the RIF whether these two pieces of core could be fitted together. The length of recovered core was measured in feet (to the nearest tenth) and this was recorded on the RIF. This length included the best estimates for lengths of rubble zones. Sometimes, measured core recovery recorded on the RIF exceeded recovery reported by drillers due to the difficulty of estimating the length of these rubble sections.

HAWAII SCIENTIFIC DRILLING PROJECT
Run Information Sheet

Date ____________

Run Logger ____________

Run Number ____________

Top Depth ____________ ft.
(from drillers)
Bottom Depth ____________ ft.
(from drillers)
Recovery ____________ ft.
(total amount actually recovered)

Top Box Number ________

Bottom Box Number ________

Remarks/Special Features: ________________________________

____

____

____

____

____

Core Continuity: Continuous with previous core? Yes No ?

Figure 1. Sample RIF.

c) The core was then marked for “up” orientation with blue and red, permanent, waterproof felt-tipped pens (see Figure 2.) If necessary, the surface of the core was first dried with a heat gun to prevent smudging of the pen marks. Orientation lines were marked twice on the core, on opposite sides, so that when the core was split into working and archive portions, each piece retained a set of lines.

Figure 2. Core orientation lines showing red on the right to indicate the proper “up” direction.

d) Black lines were drawn circumscribing the core at 1-ft intervals starting at the top of each run. The intervals were marked with the run number and depth, in feet, below the start of the run. Depth intervals within rubbly sections were estimated, and Styrofoam blocks labeled with the run number and depth were placed in the rubble zones at 1-ft intervals.

e) Delicate (e.g., ash or soil) or highly fractured core (common in the pillow basalts) was sealed in shrink-wrap to preserve its integrity.

f) Preliminary identification of units was made and the location of contacts and unusual features (e.g., delicate glass-bearing sections, secondary mineralization, ash layers or baked contacts) were noted on the RIF. Any special instructions for slabbing were added to the form as well.

g) The core was put into plastic core boxes that were segmented into five 2-ft long rows. The boxes were marked with top and bottom labels and oriented with the top of the box at the upper left corner. Core was placed in the box beginning with the top in the upper left corner, and continuing down and to the right (see Figure 3.)

top

bottom

Figure 3. Core boxes are oriented with the top at the upper left corner so that box photographs can be “read” left to right like a book.

h) If necessary, the core was cut with a saw so that each 2-ft segment fit in the core box exactly. A Styrofoam block was placed at the end of each run, labeled with the core run number and the ending driller’s depth for that run and the core run number and driller’s starting depth for the next run. Additional unlabeled Styrofoam blocks were placed in boxes to minimize movement of the core during transport.

i) After each plastic core box was filled, it was labeled with a black waterproof felt-tipped pen. The project name (HSDP), the box number, the core run number (or run numbers if the box contains material from more than one core run) and the driller’s depth range of the core segment in the box were all noted on the box and its lid. Sticky labels printed with box, run and depth information were later applied to the boxes and box lids.   The box numbers in which each run was stored were recorded on the RIF.

4. Core slabbing

The core was cut lengthwise between the two sets of orientation lines to create “archive” and “working” splits of the core. The saw was set up so that the archive split was about one third of the core and the working split the other two thirds.   If the core contained special features, an attempt was made to preserve them in both splits of the core. Core was lightly rinsed after slabbing and placed into working and archive boxes.

5. Working boxes

a) After slabbing, the working split of the core was returned to its original plastic core box. The open core box was put in the drying shed and left for up to several days until dry. After drying, foot markers, run numbers and depths, and arrows pointing to the top of the core were marked on the cut faces of the core with a blue waterproof felt-tipped pen. Any markings on the back of the core that had become obscured or removed during slabbing were remarked.

b) Once marked, the open face of the working split in the core box was digitally photographed. A Kodak Color Separation Guide (No. Q-14) and scale were placed adjacent to the core box, along with the box number clearly written on an unlined index card. This digital image was adjusted (rotated, cropped, color corrected and lightened etc.), and given the box number as a file name. An entry was then made into the DIS database for each working box photo, which could be later pulled up and annotated by the logger.

c) Additionally, a high-resolution digital scan of each working core piece was made (see Figure 4 for examples of scanned images.) Individual scans generally corresponded to the 2-ft rows of the core box, however sections containing rubble were not scanned. Scanned images were entered into the DIS database along with information on depth interval of the scan, run number, and box number in which the core piece was stored. Core sections with remarkable structures or features that would be destroyed during slabbing were also scanned in “unrolled” scan mode before slabbing. A 360° image of the core was made by rotating the core on a set of rollers while the scanner moved down the length of the core. The result is a flat image of the outside surface of the core. All core scans can be viewed on the HSDP web site at http://icdp.gfz-potsdam.de/html/hawaii/news.html.

slab scan **unrolled scan**

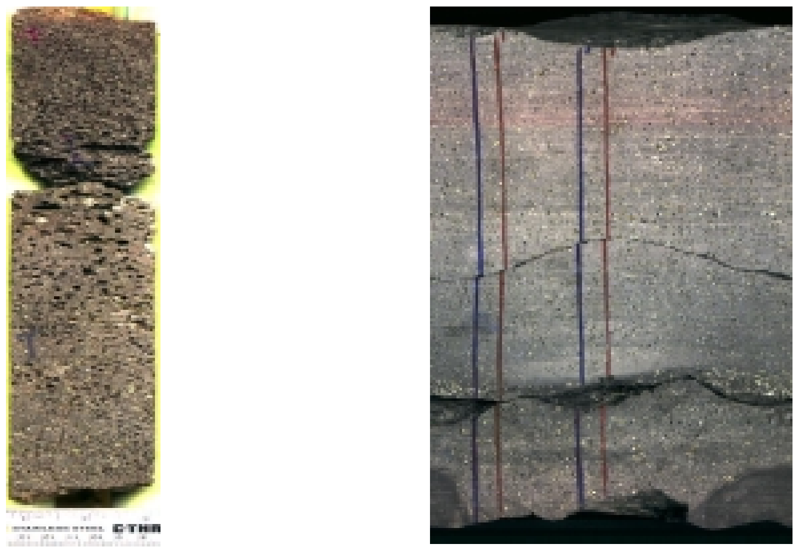


Figure 4. Slab scan images (left) were made of the working portion of the core after it had been split. Unrolled scans (right) were made only to record three-dimensional features that would have been destroyed by slabbing. Unrolled scans show a two-dimensional image of the entire outer surface of the core.

d) The core in each working core box was then ready for logging. Logging procedures are described in detail in the following section. After logging, each core box was covered with its lid and transferred to a storage trailer to await later on-site sampling.

6. Archive boxes

a) After slabbing, the archive split of the core was placed in plastic coated cardboard core boxes. Each box was labeled indicating the archive box number, the top and bottom driller’s depths, and the core run number(s) contained in the box. Styrofoam blocks labeled with the core run number and the ending driller’s depth for that core run and the core run number and the starting driller’s depth for the next core run were placed in the core box at the end of each run. Any empty space at either end of the box was filled with Styrofoam blocks to minimize movement of the core during transport. The box containing the archive split was then placed in the drying shed and left up to several days until dry.
b) After drying, foot markers, run numbers and depths, and up arrows were marked on the cut faces of the core with a blue waterproof felt-tipped pen. Any markings on the back of the core that had become obscured or removed during slabbing were remarked.
c) Once marked, the open face of the archive split in the core box was digitally photographed as for the working boxes (although adjustments to the camera height, etc. were made). The archive box photos were named and entries were made into the DIS database for each archive box.
d) Bubble wrap was laid over the core in the box, and the core box was closed and sealed with strapping tape. The boxes were loaded onto pallets and shipped to the DOSECC core storage facility in Salt Lake City, Utah.

CORE LOGGING PROCEDURES

General Statement

Logging, i.e., the hand-specimen scale description of the core, is critical to the success of the Hawaii Scientific Drilling Project since it provides the framework for all subsequent sampling and scientific study of the core. Logging was done only on the working split. To ensure the quality and consistency of the core logging, several steps were taken. First, all data was entered directly into the Drilling Information System (DIS) database, using standardized logging forms. Second, the chief logger, Mike Garcia, reviewed and edited the work of all other core loggers to ensure accuracy. Finally, Ed Stolper edited the logs for consistency, accuracy, and clarity.

Standardized logging forms for lava flows, tephra, and sedimentary units were based on protocols from Ocean Drilling Program (Shipboard Scientists Handbook, Ocean Drilling Program, Texas A&M University, ODP Tech, Note No. 3, 1990), the Creede Caldera Moat Scientific Drilling Project (USGS Open File Report 92-410), the State of Hawaii - Scientific Observation Hole coring project (USGS Open File Report 92-586), the HSDP pilot hole (Stolper et al. 1994, Core Logs) and Long Valley Drilling Project (USGS Open File Report 99-158). These forms were modified on-site to accommodate hyaloclastites, pillow lavas, and intrusive units in the submarine section.

Detailed Logging Procedures

Loggers were provided with a hand lens, ruler (metric and inches in tenths), references on rock and mineral classification, a clear plastic 100-point grid for point counting, dilute hydrochloric acid, a hardness test kit, a protractor, and a binocular microscope. The log for each box of core consists of two parts: an annotated digital photograph of the box and a written description of the core prepared using the standardized logging forms.

1. Identifying contacts and defining box units

The core in each working box was divided into box units (lettered from a to z, from the top of each box) based on the presence of contacts (e.g., the occurrence of glassy margins, baked contacts, or changes in lithology). Top and bottom depths of the box and the top depth for each unit in the box were recorded relative to the top depth of each run. All absolute depths were automatically calculated in the database from the relative depth information entered by the logger.

a) The type of top and bottom contact was identified, and the logger made a brief description of the criteria used in identifying the contact. Choices of contact type available in pull-down menus on the logging form were: **continuous with next/previous box, basalt over hyaloclastite, depositional, flow contact, flow over sediment**, **intrusive,** or **missing**[*].

b) For lavas, the groundmass texture was determined (**glassy, cryptocrystalline, microcrystalline, fine-grained** (<1 mm), **medium-grained** (1-2 mm), **coarse-grained** (>2 mm)). Comments on the groundmass (e.g., mineralogy and texture) were added when relevant. For hyaloclastites, the groundmass box was left blank and observations about the presence of fresh glass in the matrix and the degree of induration (poorly indurated if the material was loose, moderately indurated if it was coherent but could be disaggregated, and well indurated if it could not easily be disaggregated) were noted.

c) Vesicle abundance was noted from the point count or visually estimated in volume % (**sparse** (<5%), **moderate** (5-15%), **abundant** (15-30%), **very abundant** (>30%), and **variable**). Average vesicle size (small <1 mm, medium 1-5 mm, and large >5 mm), shape (round, sub-rounded, sub-angular, angular), and aspect ratio (equant, horizontally elongated, vertically elongated, inclined - if inclined, the dip relative to the axis of the core was included) were recorded. Comments were also made on the vesicle distribution within the unit.

d) The extent of alteration was estimated in volume % of the core as a whole (excluding alteration along fractures): **fresh** (<2% alteration), **slightly altered** (2-10% alteration), **moderately altered** (10-40% alteration), **highly altered** (>40% alteration). Where fresh glass and unaltered olivines were present but secondary minerals also occurred, the rock was classified as **slightly altered**. Secondary minerals were described (hardness, color, luster, crystal habit, etc.) and identified where possible (e.g., clays, zeolites,

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[*] Logging descriptions made by choosing from pull-down menus on the logging form are listed in bold type. Definitions of the descriptions are shown in parentheses following the menu item.

etc.). Comments on the mode of occurrence of the alteration minerals in the unit, (e.g., vein or fracture fillings, etc.) were made.

e) The extent of fracturing was estimated based on the number of fractures/foot (**none, weakly fractured**, (<4 fractures/ft), **moderately fractured** (4-10 fractures/ft), **highly fractured** (>10 fractures/ft), or **rubble**.) Loggers noted drilling induced fractures based on their lack of alteration and commonly horizontal orientation.

f) When appropriate, sedimentary features were described (e.g., grain size, sorting, and dip of bedding).

g) Any additional comments on the unit were added as appropriate. Features of interest were noted on the box photograph.

2. Point counts

If possible, a point count was made for each box unit. The total abundance of all phenocrysts (i.e., crystals >1 mm) and vesicles in volume % of the rock was determined based on a 100 point on a representative portion of the core. Point counts were done under a binocular microscope or with a 10x hand lens using a transparent sheet printed with 100 grid intersections. If a mineral was observed in a box unit, but was not abundant enough to appear in a point count, its abundance was recorded as 0.1%. If there was substantial variation in mineralogy, additional point counts were made. Point count locations were marked on the box photograph with a rectangle and labeled “pc.” Normalized phenocryst abundance (i.e., excluding vesicles) was also calculated for each point count. Classification of the volcanic rocks based on normalized phenocryst abundance used the following ranges: **aphyric** (<1%), **sparsely phyric** (1-2%), **moderately phyric** (3-10%), **highly phyric** (>10%). Comments on the overall phenocryst population, such as distribution (**even** or **uneven**), size (**small** (<1 mm), **medium** (1-5 mm) or **large** (>5 mm)), and crystal shape (equant, tabular, euhedral, subhedral, or anhedral) were added to each point count description. For hyaloclastites, point counts were only done on clasts that were larger than ~4 cm. If the hyaloclastite contained multiple clast types, a point count was usually done on each clast type. Point counts were commonly done on the back of the core, in which case this was noted in the comments to the point count. However, the point count location was still marked on the face of the core at the appropriate place on the digital image of the core box.

3. Internal boundaries

When internal boundaries were present within units (e.g., lobes of a pahoehoe flow; rubble in an aa flow; changes in sorting or grain size in hyaloclastites; glassy pillow margins; or the presence of interpillow breccia), their depths were recorded and their locations were marked with thin dashed lines on the digital image of the core box.

4. Hyaloclastites

For hyaloclastites, information was recorded about sedimentary features and the lithology of the clasts. Contacts between hyaloclastite units were defined based on changes in clast lithology or significant changes in sorting and grain size. A new unit was designated if the hyaloclastite changed from monolithologic (only one clast lithology) to polymict (multiple clast lithologies), or if there was a significant change in the dominant clast lithology of a polymict hyaloclastite. Fine-grained, well-sorted sections (sandstones) were designated as new lithologic units if they separated two distinct hyaloclastite units, but were generally not differentiated when they appeared within a continuous hyaloclastite sequence. If a basalt section thicker than 2 feet was present within a hyaloclastite, it was defined as a separate unit. This arbitrary rule was used when it could not be determined if the basalt was a clast, a flow or an intrusive. The top contact of the basalt unit within a hyaloclastite section was called **depositional** and the bottom contact **basalt over hyaloclastite**.

a) For each box unit, the maximum clast size (cm) and the average of the ten largest clasts (cm) were recorded.

b) The texture was classified as either **matrix-** or **clast-supported**.

c) Hyaloclastites were characterized as **well sorted**, **moderately sorted** or **poorly sorted** following Compton (1962).

d) Clast diversity was described as either **monolithologic** or **polymict**. The mineralogy of very highly vesicular clasts commonly could not be identified. Units that were otherwise monolithologic were sometimes called polymict if these scoriaceous clasts were distinct in size and shape from the other clast type.

e) Each clast lithology was given a rock name that included a description of vesicularity and mineralogy (e.g., a “sparsely vesicular, moderately olivine-phyric basalt”). For each clast lithology the following descriptions were made: relative abundance (**sparse** (only a few clasts), **moderate** (transitional), or

abundant (common clast type)); modal clast size (**small** (1-5 cm), **medium** (5-10 cm), **large** (10-15 cm) or **very large** (>15 cm)); size range (cm); and rounding (**subangular**, **angular**, **subrounded** or **rounded**).

f) Any general comments such as vesicle size and shape, phenocryst size and shape, the presence of alteration margins and whether a point count was done on the particular clast type were noted.

5. Lithologic units

Once a group of boxes had been logged, the chief logger reviewed the logs and assigned rock names to lithologic units. For flows and intrusives, rock names were based on the normalized (vesicle-free) abundance and identity of phenocryst phases; for example, a basalt with 3-10% total phenocryst content with both olivine and plagioclase phenocrysts (but olivine>plagioclase) was called a "moderately plagioclase-olivine-phyric basalt," following the style described by the IUGS Subcommission on the Systematics of Igneous Rocks (1989). If the variation in phenocryst abundance in a unit spanned the limits of pre-defined ranges, it was given a name that reflected the variation in abundance. For example, a unit with olivine content ranging from 7 to 13% would be called "moderately-to-highly olivine-phyric basalt." Basaltic hyaloclastites were given rock names that indicated the range of clast lithologies in the unit (e.g., basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)). However, if a hyaloclastite was polymict, yet was comprised mostly of one clast type, it was given a modified name such as "basaltic hyaloclastite (polymict, dominantly highly olivine-phyric basalt clasts)." In addition to assigning rock names, the chief logger proofread and edited all other logs to eliminate inconsistencies and ambiguities. Ed Stolper then checked all logs to further insure accuracy and consistency of the overall core descriptions.

SAMPLING

On-Site Sampling

Petrographic and geochemical characterization of the Mauna Loa and Mauna Kea sequences of lavas is one of the primary goals of the HSDP. A suite of reference samples was collected on-site for the preparation of polished thin sections and powders to be distributed for geochemical analyses. Reference samples for geochemical analysis were taken from the interior of the core, and altered fractures of areas with vesicle fillings were avoided. Sample size was typically about 800 g. Two thin section blank were usually cut from the same area as each powder sample, one from the top of the sampled section and one from the bottom. See Figure 5 for a schematic view of sample cuts. A notch was cut with a rock saw at the top of each thin section blank to indicate up direction. Samples were labeled by the run and relative depth of their tops as a unique identifier (e.g., R903-12.9) and recorded in the DIS database. Sample naming conventions follow those laid out in USGS Open File Report 92-410. Additional information such as name and affiliation of sampler, date of sample collection, sample purpose and core box were recorded along with run and depth information. If multiple samples were taken from the same depth, samples were given run and relative depth names followed by a letter (e.g., R712-4.3A and R712-4.3B). Reference samples were taken from lava flows, massive basalts and intrusive units at an average interval of about 100 ft. When thick hyaloclastite units were present, samples for the geochemical reference suite were taken from large clasts within the hyaloclastites. However, such samples may not be representative of flow units or eruptive events.

After samples for the reference suite were collected on-site, thin section blanks were shipped to Caltech where arrangements were made to have polished thin sections prepared. The interior sample section was shipped to Berkeley where whole rock samples were coarsely crushed. Following coarse crushing, approximately one half of the powder was reserved for investigators who require mineral separates. The remaining powder was finely crushed, and powders were distributed to investigators according to their proposed analytical procedure.

A reference suite of hyaloclastite samples was also collected at the drill site. Approximately 1-ft long sections of the working split were sampled. Poorly consolidated samples were shrink wrapped and shipped to Caltech and later impregnated with epoxy to make thin sections.

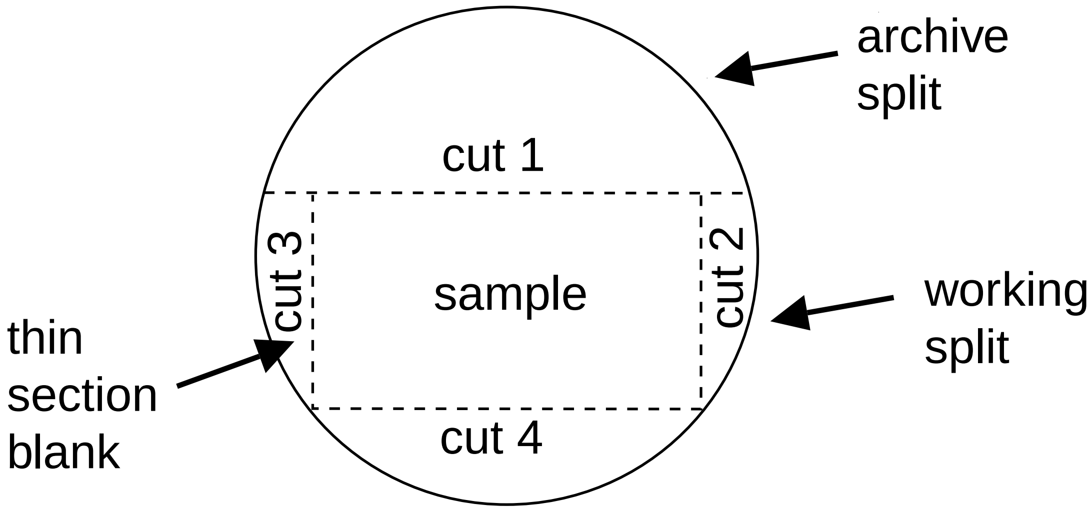

Figure 5. Schematic view of sample cuts.

Off-Site Sampling

After on-site sampling was complete, working core boxes were packed securely and shipped to Caltech where they will be available for sampling for approximately two years after the end of drilling activities. Investigators who wish to sample the core should request permission from the three project P.I.s. After obtaining permission, they may travel to Caltech and collect samples, following the same sampling procedures used for on-site sampling. Detailed information about the samples will be entered into the DIS database.

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Hawaii Scientific Drilling Project

DIS: Data-Report

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0001	-5.9	-1.9	4.0	3.6	90.00	B0001	B0001
R0002	-1.9	5.1	7.0	5.3	75.71	B0001	B0002
R0003	5.1	9.6	4.5	2.5	55.56	B0002	B0002
R0004	9.6	15.6	6.0	1.6	26.67	B0002	B0002
R0005	15.6	19.6	4.0	1.0	25.00	B0002	B0002
R0006	19.6	25.1	5.5	5.5	100.00	B0004	B0003
R0007	25.1	28.6	3.5	4.3	122.86	B0003	B0003
R0008	28.6	33.6	5.0	5.4	108.00	B0003	B0004
R0009	33.6	38.6	5.0	3.6	72.00	B0004	B0005
R0010	38.6	44.1	5.5	3.6	65.45	B0005	B0005
R0011	44.1	48.6	4.5	5.3	117.78	B0005	B0006
R0012	48.6	54.1	5.5	5.7	103.64	B0006	B0006
R0013	54.1	58.1	4.0	4.3	107.50	B0007	B0007
R0014	58.1	63.6	5.5	5.3	96.36	B0007	B0008
R0015	63.6	71.6	8.0	5.0	62.50	B0008	B0008
R0016	71.6	78.6	7.0	2.4	34.29	B0008	B0008
R0017	78.6	84.1	5.5	2.4	43.64	B0008	B0009
R0018	84.1	88.6	4.5	2.4	53.33	B0009	B0009
R0019	88.6	94.1	5.5	4.5	81.82	B0009	B0009
R0020	94.1	98.6	4.5	5.3	117.78	B0010	B0010
R0021	98.6	104.1	5.5	5.9	107.27	B0010	B0011
R0022	104.1	108.6	4.5	5.4	120.00	B0011	B0011
R0023	108.6	114.1	5.5	5.3	96.36	B0011	B0012
R0024	114.1	118.6	4.5	4.8	106.67	B0012	B0013
R0025	118.6	124.1	5.5	5.1	92.73	B0013	B0013
R0026	124.1	128.6	4.5	4.1	91.11	B0013	B0014
R0027	128.6	134.1	5.5	5.4	98.18	B0014	B0014
R0028	134.1	138.6	4.5	5.1	113.33	B0014	B0015
R0029	138.6	144.1	5.5	5.2	94.55	B0015	B0015
R0030	144.1	148.6	4.5	4.0	88.89	B0015	B0016
R0031	148.6	153.1	4.5	5.2	115.56	B0016	B0016
R0032	153.1	158.1	5.0	5.3	106.00	B0016	B0017
R0033	158.1	163.1	5.0	5.0	100.00	B0017	B0018
R0034	163.1	168.6	5.5	5.2	94.55	B0018	B0018
R0035	168.6	174.1	5.5	5.3	96.36	B0018	B0019
R0036	174.1	178.6	4.5	5.1	113.33	B0019	B0019
R0037	178.6	184.1	5.5	5.4	98.18	B0020	B0021
R0038	184.1	188.6	4.5	4.8	106.67	B0020	B0021
R0039	188.6	194.1	5.5	5.3	96.36	B0021	B0021
R0040	194.1	199.1	5.0	5.0	100.00	B0021	B0022

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0041	199.1	204.1	5.0	5.3	106.00	B0022	B0023
R0042	204.1	209.1	5.0	3.8	76.00	B0023	B0023
R0043	209.1	214.1	5.0	5.4	108.00	B0023	B0024
R0044	214.1	219.1	5.0	4.9	98.00	B0024	B0024
R0045	219.1	224.1	5.0	5.3	106.00	B0024	B0025
R0046	224.1	229.1	5.0	5.4	108.00	B0025	B0025
R0047	229.1	234.1	5.0	5.2	104.00	B0025	B0026
R0048	234.1	239.1	5.0	4.4	88.00	B0026	B0026
R0049	239.1	244.1	5.0	5.3	106.00	B0027	B0027
R0050	244.1	249.1	5.0	4.8	96.00	B0027	B0028
R0051	249.1	254.1	5.0	5.4	108.00	B0028	B0028
R0052	254.1	259.1	5.0	5.1	102.00	B0028	B0029
R0053	259.1	262.1	3.0	2.9	96.67	B0029	B0029
R0054	262.1	267.6	5.5	5.5	100.00	B0029	B0030
R0055	267.6	273.1	5.5	5.5	100.00	B0030	B0031
R0056	273.1	278.6	5.5	4.8	87.27	B0031	B0031
R0057	278.6	284.1	5.5	5.0	90.91	B0031	B0032
R0058	284.1	289.1	5.0	5.0	100.00	B0032	B0032
R0059	289.1	294.1	5.0	5.0	100.00	B0033	B0033
R0060	294.1	299.1	5.0	5.3	106.00	B0033	B0034
R0061	299.1	304.1	5.0	5.3	106.00	B0034	B0034
R0062	304.1	309.1	5.0	5.0	100.00	B0034	B0035
R0063	309.1	314.1	5.0	5.0	100.00	B0035	B0035
R0064	314.1	319.1	5.0	5.0	100.00	B0035	B0036
R0065	319.1	324.1	5.0	4.7	94.00	B0036	B0036
R0066	324.1	329.1	5.0	5.1	102.00	B0037	B0037
R0067	329.1	334.1	5.0	4.4	88.00	B0037	B0037
R0068	334.1	339.1	5.0	4.0	80.00	B0037	B0037
R0069	339.1	344.1	5.0	5.0	100.00	B0038	B0039
R0070	344.1	349.1	5.0	5.5	110.00	B0039	B0039
R0071	349.1	354.1	5.0	5.1	102.00	B0040	B0040
R0072	354.1	359.1	5.0	5.0	100.00	B0040	B0041
R0073	359.1	364.1	5.0	4.6	92.00	B0041	B0041
R0074	364.1	369.1	5.0	5.3	106.00	B0041	B0042
R0075	369.1	374.1	5.0	5.3	106.00	B0042	B0043
R0076	378.1	385.1	7.0	6.8	97.14	B0043	B0043
R0077	385.1	390.1	5.0	3.1	62.00	B0043	B0044
R0078	390.1	400.6	10.5	10.3	98.10	B0044	B0045
R0079	400.6	411.1	10.5	9.3	88.57	B0045	B0046
R0080	411.1	421.1	10.0	10.9	109.00	B0046	B0047
R0081	421.1	431.1	10.0	10.5	105.00	B0047	B0048
R0082	431.1	441.6	10.5	10.5	100.00	B0048	B0049
R0083	441.6	451.6	10.0	10.8	108.00	B0049	B0051
R0084	451.6	461.6	10.0	10.3	103.00	B0051	B0052

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0085	461.6	470.1	8.5	8.1	95.29	B0052	B0053
R0086	470.1	480.1	10.0	10.8	108.00	B0053	B0054
R0087	480.1	490.6	10.5	10.3	98.10	B0054	B0055
R0089	490.6	500.6	10.0	10.6	106.00	B0055	B0056
R0090	500.6	508.6	8.0	7.3	91.25	B0056	B0057
R0091	508.6	519.1	10.5	10.4	99.05	B0057	B0058
R0092	519.1	529.1	10.0	10.3	103.00	B0058	B0059
R0093	529.1	539.6	10.5	10.4	99.05	B0059	B0060
R0094	539.6	550.1	10.5	10.7	101.90	B0060	B0061
R0095	550.1	560.1	10.0	8.8	88.00	B0062	B0062
R0096	560.1	570.6	10.5	11.2	106.67	B0063	B0064
R0097	570.6	581.1	10.5	10.7	101.90	B0064	B0065
R0098	581.1	591.1	10.0	9.7	97.00	B0065	B0066
R0099	591.1	601.6	10.5	11.0	104.76	B0066	B0067
R0100	601.6	612.1	10.5	10.2	97.14	B0067	B0068
R0101	612.1	622.1	10.0	10.3	103.00	B0069	B0070
R0102	622.1	632.1	10.0	11.4	114.00	B0070	B0071
R0103	632.1	642.6	10.5	10.2	97.14	B0071	B0072
R0104	642.6	651.1	8.5	7.9	92.94	B0072	B0073
R0105	651.1	661.1	10.0	10.3	103.00	B0073	B0074
R0106	661.1	666.1	5.0	4.5	90.00	B0074	B0075
R0107	666.1	675.1	9.0	9.3	103.33	B0075	B0076
R0108	675.1	685.1	10.0	10.1	101.00	B0076	B0077
R0109	685.1	694.1	9.0	9.0	100.00	B0077	B0078
R0110	694.1	704.1	10.0	10.9	109.00	B0078	B0079
R0111	704.1	713.6	9.5	9.6	101.05	B0079	B0080
R0112	713.6	723.6	10.0	10.2	102.00	B0080	B0081
R0113	723.6	733.6	10.0	9.3	93.00	B0081	B0082
R0114	733.6	743.6	10.0	9.3	93.00	B0082	B0083
R0115	743.6	752.6	9.0	8.2	91.11	B0084	B0084
R0116	752.6	762.6	10.0	10.0	100.00	B0084	B0086
R0117	762.6	771.6	9.0	7.7	85.56	B0086	B0086
R0118	771.6	782.1	10.5	10.7	101.90	B0086	B0088
R0119	782.1	792.6	10.5	10.6	100.95	B0088	B0089
R0120	792.6	803.1	10.5	10.7	101.90	B0089	B0090
R0121	803.1	813.6	10.5	10.8	102.86	B0090	B0091
R0122	813.6	817.1	3.5	4.0	114.29	B0091	B0092
R0123	817.1	825.6	8.5	7.5	88.24	B0092	B0092
R0124	825.6	835.1	9.5	8.6	90.53	B0092	B0093
R0125	835.1	843.6	8.5	7.2	84.71	B0093	B0094
R0126	843.6	853.6	10.0	7.5	75.00	B0094	B0095
R0127	853.6	864.1	10.5	10.5	100.00	B0095	B0097
R0128	864.1	872.1	8.0	7.8	97.50	B0097	B0097
R0129	872.1	882.1	10.0	10.2	102.00	B0097	B0099

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0130	882.1	893.1	11.0	11.6	105.45	B0099	B0100
R0131	893.1	904.1	11.0	10.3	93.64	B0100	B0101
R0132	904.1	914.6	10.5	10.1	96.19	B0101	B0102
R0133	914.6	925.1	10.5	10.8	102.86	B0102	B0103
R0134	925.1	935.1	10.0	10.5	105.00	B0103	B0104
R0135	935.1	945.1	10.0	7.7	77.00	B0104	B0105
R0136	945.1	955.1	10.0	10.0	100.00	B0105	B0106
R0137	955.1	965.1	10.0	10.4	104.00	B0106	B0107
R0138	965.1	975.1	10.0	10.2	102.00	B0107	B0108
R0139	975.1	985.1	10.0	10.9	109.00	B0108	B0110
R0140	985.1	995.1	10.0	9.0	90.00	B0110	B0111
R0141	995.1	1,005.1	10.0	10.3	103.00	B0111	B0112
R0142	1,005.1	1,015.1	10.0	9.8	98.00	B0112	B0113
R0143	1,015.1	1,023.1	8.0	9.8	122.50	B0113	B0114
R0144	1,023.1	1,033.1	10.0	10.3	103.00	B0114	B0115
R0145	1,033.1	1,043.1	10.0	11.0	110.00	B0115	B0116
R0146	1,043.1	1,053.1	10.0	10.0	100.00	B0116	B0118
R0147	1,053.1	1,063.1	10.0	10.6	106.00	B0118	B0119
R0148	1,063.1	1,074.6	11.5	10.4	90.43	B0119	B0120
R0149	1,074.6	1,085.1	10.5	10.3	98.10	B0120	B0121
R0150	1,085.1	1,095.1	10.0	10.9	109.00	B0121	B0122
R0151	1,095.1	1,105.1	10.0	10.2	102.00	B0122	B0123
R0152	1,105.1	1,115.1	10.0	9.6	96.00	B0124	B0125
R0153	1,115.1	1,125.1	10.0	10.2	102.00	B0125	B0126
R0154	1,125.1	1,133.1	8.0	6.5	81.25	B0126	B0126
R0155	1,133.1	1,143.6	10.5	7.7	73.33	B0127	B0127
R0156	1,143.6	1,151.6	8.0	6.6	82.50	B0128	B0128
R0157	1,151.6	1,162.6	11.0	9.8	89.09	B0128	B0129
R0158	1,162.6	1,173.1	10.5	10.4	99.05	B0129	B0130
R0159	1,173.1	1,181.6	8.5	8.5	100.00	B0130	B0131
R0160	1,181.6	1,184.6	3.0	2.6	86.67	B0131	B0132
R0161	1,184.6	1,186.6	2.0	2.0	100.00	B0132	B0132
R0162	1,186.6	1,195.1	8.5	7.8	91.76	B0132	B0133
R0163	1,195.1	1,205.1	10.0	2.5	25.00	B0133	B0133
R0164	1,205.1	1,215.1	10.0	9.7	97.00	B0133	B0134
R0165	1,215.1	1,225.1	10.0	10.7	107.00	B0134	B0135
R0166	1,225.1	1,235.1	10.0	10.4	104.00	B0135	B0136
R0167	1,235.1	1,245.1	10.0	10.0	100.00	B0136	B0138
R0168	1,245.1	1,255.1	10.0	11.0	110.00	B0138	B0139
R0169	1,255.1	1,263.6	8.5	8.5	100.00	B0139	B0140
R0170	1,263.6	1,269.6	6.0	6.0	100.00	B0140	B0140
R0171	1,269.6	1,274.6	5.0	5.0	100.00	B0141	B0141
R0172	1,274.6	1,280.1	5.5	4.0	72.73	B0141	B0141
R0173	1,280.1	1,290.6	10.5	10.5	100.00	B0142	B0143

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0174	1,290.6	1,300.6	10.0	9.2	92.00	B0143	B0143
R0175	1,300.6	1,311.1	10.5	7.9	75.24	B0144	B0145
R0176	1,311.1	1,320.1	9.0	8.7	96.67	B0145	B0145
R0177	1,320.1	1,330.6	10.5	9.8	93.33	B0146	B0147
R0178	1,330.6	1,338.6	8.0	7.7	96.25	B0147	B0148
R0179	1,338.6	1,349.6	11.0	10.3	93.64	B0148	B0149
R0180	1,349.6	1,358.6	9.0	7.8	86.67	B0149	B0149
R0181	1,358.6	1,369.1	10.5	9.8	93.33	B0150	B0151
R0182	1,369.1	1,373.6	4.5	2.6	57.78	B0151	B0151
R0183	1,373.6	1,378.6	5.0	1.9	38.00	B0151	B0151
R0184	1,378.6	1,388.6	10.0	10.0	100.00	B0151	B0152
R0185	1,388.6	1,393.6	5.0	4.3	86.00	B0152	B0153
R0186	1,393.6	1,404.1	10.5	11.0	104.76	B0153	B0154
R0187	1,404.1	1,410.1	6.0	4.8	80.00	B0154	B0154
R0188	1,410.1	1,421.4	11.3	10.0	88.50	B0155	B0156
R0189	1,421.4	1,433.1	11.7	10.0	85.47	B0156	B0157
R0190	1,433.1	1,443.6	10.5	10.0	95.24	B0157	B0158
R0191	1,443.6	1,446.1	2.5	0.9	36.00	B0158	B0158
R0192	1,446.1	1,455.1	9.0	8.9	98.89	B0158	B0159
R0193	1,455.1	1,464.1	9.0	9.2	102.22	B0159	B0159
R0194	1,464.1	1,470.1	6.0	5.4	90.00	B0160	B0160
R0195	1,470.1	1,472.1	2.0	0.6	30.00	B0160	B0160
R0196	1,472.1	1,473.6	1.5	1.0	66.67	B0161	B0161
R0197	1,473.6	1,476.1	2.5	1.2	48.00	B0161	B0161
R0198	1,476.1	1,478.1	2.0	1.0	50.00	B0161	B0161
R0199	1,478.1	1,484.6	6.5	5.2	80.00	B0161	B0161
R0200	1,484.6	1,495.1	10.5	10.2	97.14	B0162	B0163
R0201	1,495.1	1,504.1	9.0	10.0	111.11	B0163	B0164
R0202	1,504.1	1,514.6	10.5	10.5	100.00	B0164	B0165
R0203	1,514.6	1,522.1	7.5	8.9	118.67	B0165	B0166
R0204	1,522.1	1,533.1	11.0	10.2	92.73	B0166	B0167
R0205	1,533.1	1,539.1	6.0	6.1	101.67	B0167	B0168
R0206	1,539.1	1,552.1	13.0	10.3	79.23	B0168	B0169
R0207	1,552.1	1,559.6	7.5	6.2	82.67	B0169	B0169
R0208	1,559.6	1,570.6	11.0	10.0	90.91	B0170	B0171
R0209	1,570.6	1,580.6	10.0	10.1	101.00	B0171	B0172
R0210	1,580.6	1,591.6	11.0	10.8	98.18	B0172	B0173
R0211	1,591.6	1,602.1	10.5	9.3	88.57	B0173	B0174
R0212	1,602.1	1,613.1	11.0	9.8	89.09	B0174	B0175
R0213	1,613.1	1,623.6	10.5	10.3	98.10	B0175	B0176
R0214	1,623.6	1,634.1	10.5	11.4	108.57	B0176	B0177
R0215	1,634.1	1,644.6	10.5	11.5	109.52	B0177	B0178
R0216	1,644.6	1,655.1	10.5	10.6	100.95	B0179	B0180
R0217	1,655.1	1,665.1	10.0	9.0	90.00	B0180	B0181

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0218	1,665.1	1,675.1	10.0	9.9	99.00	B0181	B0182
R0219	1,675.1	1,685.1	10.0	10.9	109.00	B0182	B0183
R0220	1,685.1	1,688.1	3.0	1.2	40.00	B0183	B0183
R0221	1,688.1	1,691.1	3.0	2.5	83.33	B0183	B0183
R0222	1,691.1	1,698.6	7.5	5.3	70.67	B0183	B0184
R0223	1,698.6	1,708.6	10.0	9.7	97.00	B0184	B0185
R0224	1,708.6	1,718.6	10.0	10.4	104.00	B0185	B0186
R0225	1,718.6	1,722.1	3.5	2.0	57.14	B0186	B0186
R0226	1,722.1	1,726.1	4.0	1.2	30.00	B0186	B0186
R0227	1,726.1	1,730.1	4.0	1.8	45.00	B0186	B0187
R0228	1,730.1	1,740.6	10.5	10.1	96.19	B0187	B0188
R0229	1,740.6	1,750.1	9.5	9.6	101.05	B0188	B0189
R0230	1,750.1	1,760.1	10.0	10.1	101.00	B0189	B0190
R0231	1,760.1	1,769.6	9.5	10.0	105.26	B0190	B0191
R0232	1,769.6	1,780.1	10.5	10.8	102.86	B0191	B0192
R0233	1,780.1	1,789.1	9.0	10.0	111.11	B0192	B0193
R0234	1,789.1	1,799.1	10.0	10.0	100.00	B0193	B0194
R0235	1,799.1	1,808.1	9.0	8.8	97.78	B0194	B0195
R0236	1,808.1	1,818.1	10.0	11.0	110.00	B0195	B0197
R0237	1,818.1	1,827.1	9.0	7.6	84.44	B0197	B0197
R0238	1,827.1	1,837.1	10.0	9.7	97.00	B0197	B0198
R0239	1,837.1	1,845.1	8.0	5.3	66.25	B0198	B0199
R0240	1,845.1	1,855.1	10.0	8.4	84.00	B0199	B0200
R0241	1,855.1	1,859.6	4.5	3.1	68.89	B0200	B0200
R0242	1,859.6	1,870.1	10.5	10.8	102.86	B0200	B0201
R0243	1,870.1	1,878.1	8.0	8.4	105.00	B0201	B0202
R0244	1,878.1	1,883.1	5.0	3.4	68.00	B0202	B0203
R0245	1,883.1	1,887.6	4.5	4.0	88.89	B0203	B0203
R0246	1,887.6	1,897.6	10.0	8.5	85.00	B0203	B0204
R0247	1,897.6	1,900.1	2.5	2.1	84.00	B0204	B0204
R0248	1,900.1	1,904.1	4.0	3.0	75.00	B0204	B0205
R0249	1,904.1	1,907.1	3.0	1.0	33.33	B0205	B0205
R0250	1,907.1	1,909.1	2.0	0.0	0.00	B0205	B0205
R0251	1,909.1	1,912.1	3.0	3.6	120.00	B0205	B0205
R0252	1,912.1	1,914.6	2.5	1.5	60.00	B0205	B0205
R0253	1,914.6	1,917.6	3.0	1.9	63.33	B0205	B0206
R0254	1,917.6	1,922.1	4.5	1.5	33.33	B0206	B0206
R0255	1,922.1	1,931.1	9.0	8.7	96.67	B0206	B0207
R0256	1,931.1	1,936.1	5.0	4.8	96.00	B0207	B0207
R0257	1,936.1	1,943.1	7.0	6.0	85.71	B0207	B0208
R0258	1,943.1	1,953.1	10.0	10.4	104.00	B0208	B0209
R0259	1,953.1	1,956.1	3.0	3.2	106.67	B0209	B0209
R0260	1,956.1	1,965.1	9.0	9.1	101.11	B0209	B0210
R0261	1,965.1	1,971.6	6.5	6.9	106.15	B0210	B0211

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0262	1,971.6	1,978.1	6.5	5.1	78.46	B0211	B0212
R0263	1,978.1	1,989.1	11.0	10.1	91.82	B0212	B0213
R0264	1,989.1	1,999.1	10.0	9.0	90.00	B0213	B0214
R0265	1,999.1	2,006.1	7.0	6.5	92.86	B0214	B0215
R0266	2,006.1	2,013.1	7.0	5.6	80.00	B0215	B0215
R0267	2,013.1	2,023.1	10.0	10.2	102.00	B0215	B0216
R0268	2,023.1	2,033.1	10.0	10.2	102.00	B0217	B0218
R0269	2,033.1	2,037.1	4.0	3.4	85.00	B0218	B0218
R0270	2,037.1	2,041.1	4.0	2.8	70.00	B0218	B0218
R0271	2,041.1	2,045.6	4.5	5.1	113.33	B0218	B0219
R0272	2,045.6	2,054.6	9.0	7.7	85.56	B0219	B0220
R0273	2,054.6	2,064.6	10.0	9.8	98.00	B0220	B0221
R0274	2,064.6	2,067.6	3.0	1.4	46.67	B0221	B0221
R0275	2,067.6	2,078.1	10.5	11.1	105.71	B0221	B0222
R0276	2,078.1	2,088.6	10.5	10.7	101.90	B0222	B0223
R0277	2,088.6	2,099.1	10.5	11.3	107.62	B0223	B0225
R0278	2,099.1	2,109.6	10.5	11.5	109.52	B0225	B0226
R0279	2,109.6	2,120.1	10.5	10.5	100.00	B0226	B0227
R0280	2,120.1	2,130.1	10.0	10.4	104.00	B0227	B0228
R0281	2,130.1	2,136.6	6.5	5.0	76.92	B0228	B0229
R0282	2,136.6	2,147.1	10.5	11.0	104.76	B0229	B0230
R0283	2,147.1	2,157.6	10.5	10.5	100.00	B0230	B0231
R0284	2,157.6	2,167.1	9.5	10.7	112.63	B0231	B0232
R0285	2,167.1	2,171.1	4.0	3.8	95.00	B0232	B0233
R0286	2,171.1	2,178.1	7.0	6.8	97.14	B0233	B0234
R0287	2,178.1	2,183.6	5.5	4.9	89.09	B0234	B0234
R0288	2,183.6	2,188.1	4.5	2.2	48.89	B0234	B0234
R0289	2,188.1	2,194.1	6.0	4.0	66.67	B0234	B0235
R0290	2,194.1	2,201.6	7.5	7.9	105.33	B0235	B0236
R0291	2,201.6	2,211.1	9.5	9.7	102.11	B0236	B0237
R0292	2,211.1	2,214.1	3.0	1.0	33.33	B0237	B0237
R0293	2,214.1	2,218.1	4.0	2.6	65.00	B0237	B0237
R0294	2,218.1	2,227.1	9.0	9.0	100.00	B0237	B0238
R0295	2,227.1	2,237.6	10.5	10.5	100.00	B0238	B0239
R0296	2,237.6	2,248.1	10.5	10.9	103.81	B0239	B0241
R0297	2,248.1	2,258.6	10.5	10.4	99.05	B0241	B0242
R0298	2,258.6	2,266.1	7.5	8.4	112.00	B0242	B0243
R0299	2,266.1	2,276.1	10.0	9.2	92.00	B0243	B0244
R0300	2,276.1	2,286.6	10.5	9.7	92.38	B0244	B0245
R0301	2,286.6	2,295.1	8.5	8.0	94.12	B0245	B0246
R0302	2,295.1	2,305.1	10.0	9.4	94.00	B0246	B0247
R0303	2,305.1	2,315.1	10.0	9.9	99.00	B0247	B0248
R0304	2,315.1	2,319.6	4.5	4.5	100.00	B0248	B0248
R0305	2,319.6	2,328.6	9.0	8.6	95.56	B0248	B0249

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0306	2,328.6	2,339.1	10.5	10.7	101.90	B0249	B0251
R0307	2,339.1	2,349.6	10.5	10.6	100.95	B0251	B0252
R0308	2,349.6	2,352.1	2.5	2.4	96.00	B0252	B0252
R0309	2,352.1	2,362.1	10.0	10.2	102.00	B0252	B0253
R0310	2,362.1	2,370.6	8.5	10.2	120.00	B0253	B0254
R0311	2,370.6	2,381.1	10.5	9.6	91.43	B0254	B0255
R0312	2,381.1	2,386.1	5.0	4.5	90.00	B0256	B0256
R0313	2,386.1	2,396.1	10.0	10.7	107.00	B0256	B0257
R0314	2,396.1	2,404.6	8.5	8.3	97.65	B0257	B0258
R0315	2,404.6	2,408.6	4.0	1.8	45.00	B0258	B0258
R0316	2,408.6	2,410.6	2.0	1.3	65.00	B0259	B0259
R0317	2,410.6	2,418.6	8.0	7.7	96.25	B0259	B0260
R0318	2,418.6	2,429.1	10.5	10.3	98.10	B0260	B0261
R0319	2,429.1	2,437.1	8.0	8.0	100.00	B0261	B0262
R0320	2,437.1	2,447.6	10.5	10.4	99.05	B0262	B0263
R0321	2,447.6	2,458.1	10.5	11.5	109.52	B0263	B0264
R0322	2,458.1	2,464.6	6.5	7.0	107.69	B0264	B0265
R0323	2,464.6	2,466.1	1.5	1.3	86.67	B0265	B0265
R0324	2,466.1	2,468.6	2.5	1.5	60.00	B0265	B0265
R0325	2,468.6	2,474.6	6.0	3.3	55.00	B0265	B0266
R0326	2,474.6	2,478.6	4.0	1.6	40.00	B0266	B0266
R0327	2,478.6	2,489.1	10.5	10.9	103.81	B0266	B0267
R0328	2,489.1	2,499.1	10.0	10.3	103.00	B0267	B0268
R0329	2,499.1	2,507.1	8.0	8.5	106.25	B0268	B0269
R0330	2,507.1	2,517.1	10.0	8.7	87.00	B0269	B0270
R0331	2,517.1	2,526.1	9.0	10.4	115.56	B0270	B0271
R0332	2,526.1	2,535.1	9.0	10.4	115.56	B0271	B0272
R0333	2,535.1	2,545.1	10.0	10.0	100.00	B0272	B0274
R0334	2,545.1	2,555.1	10.0	10.0	100.00	B0274	B0275
R0335	2,555.1	2,563.1	8.0	8.1	101.25	B0275	B0276
R0336	2,563.1	2,573.6	10.5	10.5	100.00	B0276	B0277
R0337	2,573.6	2,584.1	10.5	11.5	109.52	B0277	B0278
R0338	2,584.1	2,592.1	8.0	9.5	118.75	B0278	B0279
R0339	2,592.1	2,602.1	10.0	10.2	102.00	B0279	B0280
R0340	2,602.1	2,612.6	10.5	10.3	98.10	B0280	B0281
R0341	2,612.6	2,622.6	10.0	10.3	103.00	B0281	B0283
R0342	2,622.6	2,633.1	10.5	10.2	97.14	B0283	B0284
R0343	2,633.1	2,639.6	6.5	6.7	103.08	B0284	B0284
R0344	2,639.6	2,650.1	10.5	10.3	98.10	B0284	B0286
R0345	2,650.1	2,660.1	10.0	10.6	106.00	B0286	B0287
R0346	2,660.1	2,670.1	10.0	10.5	105.00	B0287	B0288
R0347	2,670.1	2,680.6	10.5	10.5	100.00	B0288	B0289
R0348	2,680.6	2,686.6	6.0	5.8	96.67	B0289	B0290
R0349	2,686.6	2,689.6	3.0	2.2	73.33	B0290	B0290

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0350	2,689.6	2,699.6	10.0	10.3	103.00	B0290	B0291
R0351	2,699.6	2,709.6	10.0	9.7	97.00	B0292	B0292
R0352	2,709.6	2,719.6	10.0	10.4	104.00	B0293	B0294
R0353	2,719.6	2,727.6	8.0	8.3	103.75	B0294	B0295
R0354	2,727.6	2,738.1	10.5	10.7	101.90	B0295	B0296
R0355	2,738.1	2,748.1	10.0	10.8	108.00	B0296	B0297
R0356	2,748.1	2,758.1	10.0	10.6	106.00	B0297	B0298
R0357	2,758.1	2,768.6	10.5	10.3	98.10	B0298	B0299
R0358	2,768.6	2,779.1	10.5	10.8	102.86	B0299	B0301
R0359	2,779.1	2,789.1	10.0	10.4	104.00	B0301	B0302
R0360	2,789.1	2,799.1	10.0	10.3	103.00	B0302	B0303
R0361	2,799.1	2,809.1	10.0	10.2	102.00	B0303	B0304
R0362	2,809.1	2,813.1	4.0	3.3	82.50	B0304	B0305
R0363	2,813.1	2,823.1	10.0	10.3	103.00	B0305	B0306
R0364	2,823.1	2,829.1	6.0	6.0	100.00	B0306	B0306
R0365	2,829.1	2,832.6	3.5	1.8	51.43	B0307	B0307
R0366	2,832.6	2,839.6	7.0	6.0	85.71	B0307	B0307
R0367	2,839.6	2,842.6	3.0	1.1	36.67	B0307	B0307
R0368	2,842.6	2,844.6	2.0	1.0	50.00	B0308	B0308
R0369	2,844.6	2,848.1	3.5	1.5	42.86	B0308	B0308
R0370	2,848.1	2,851.6	3.5	3.3	94.29	B0308	B0308
R0371	2,851.6	2,854.6	3.0	1.0	33.33	B0308	B0308
R0372	2,854.6	2,863.1	8.5	7.1	83.53	B0308	B0309
R0373	2,863.1	2,870.1	7.0	7.0	100.00	B0309	B0310
R0374	2,870.1	2,875.1	5.0	2.4	48.00	B0310	B0310
R0375	2,875.1	2,882.1	7.0	5.1	72.86	B0310	B0311
R0376	2,882.1	2,890.6	8.5	6.8	80.00	B0311	B0312
R0377	2,890.6	2,901.1	10.5	10.6	100.95	B0312	B0313
R0378	2,901.1	2,911.1	10.0	11.1	111.00	B0313	B0314
R0379	2,911.1	2,921.6	10.5	10.6	100.95	B0314	B0315
R0380	2,921.6	2,932.1	10.5	10.7	101.90	B0316	B0317
R0381	2,932.1	2,942.1	10.0	10.4	104.00	B0317	B0318
R0382	2,942.1	2,952.6	10.5	10.3	98.10	B0318	B0319
R0383	2,952.6	2,963.1	10.5	7.2	68.57	B0319	B0320
R0384	2,963.1	2,972.1	9.0	7.5	83.33	B0320	B0321
R0385	2,972.1	2,982.6	10.5	9.5	90.48	B0321	B0322
R0386	2,982.6	2,989.1	6.5	7.2	110.77	B0322	B0323
R0387	2,989.1	2,993.1	4.0	2.3	57.50	B0323	B0323
R0388	2,993.1	3,002.1	9.0	8.0	88.89	B0323	B0324
R0389	3,002.1	3,006.6	4.5	3.9	86.67	B0324	B0324
R0390	3,006.6	3,010.1	3.5	2.5	71.43	B0324	B0325
R0391	3,010.1	3,019.1	9.0	4.0	44.44	B0325	B0325
R0392	3,019.1	3,029.1	10.0	8.9	89.00	B0325	B0326
R0393	3,029.1	3,038.1	9.0	10.2	113.33	B0326	B0327

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0394	3,038.1	3,048.1	10.0	10.7	107.00	B0327	B0328
R0395	3,048.1	3,058.6	10.5	10.8	102.86	B0328	B0330
R0396	3,058.6	3,068.6	10.0	10.4	104.00	B0330	B0331
R0397	3,068.6	3,079.1	10.5	10.3	98.10	B0331	B0332
R0398	3,079.1	3,089.1	10.0	10.5	105.00	B0332	B0333
R0399	3,089.1	3,099.1	10.0	10.5	105.00	B0333	B0334
R0400	3,099.1	3,109.6	10.5	10.9	103.81	B0334	B0335
R0401	3,109.6	3,120.1	10.5	9.5	90.48	B0335	B0337
R0402	3,120.1	3,130.6	10.5	10.7	101.90	B0337	B0338
R0403	3,130.6	3,139.1	8.5	8.5	100.00	B0338	B0339
R0404	3,139.1	3,149.1	10.0	9.7	97.00	B0339	B0340
R0405	3,149.1	3,155.1	6.0	5.0	83.33	B0340	B0340
R0406	3,155.1	3,165.1	10.0	9.8	98.00	B0340	B0341
R0407	3,165.1	3,175.1	10.0	10.2	102.00	B0342	B0343
R0408	3,175.1	3,185.1	10.0	10.0	100.00	B0343	B0344
R0409	3,185.1	3,195.1	10.0	9.9	99.00	B0344	B0345
R0410	3,195.1	3,205.1	10.0	10.4	104.00	B0345	B0346
R0411	3,205.1	3,215.1	10.0	11.0	110.00	B0346	B0347
R0412	3,215.1	3,225.1	10.0	10.5	105.00	B0347	B0348
R0413	3,225.1	3,235.1	10.0	10.5	105.00	B0348	B0349
R0414	3,235.1	3,245.1	10.0	10.6	106.00	B0350	B0351
R0415	3,245.1	3,255.1	10.0	10.6	106.00	B0351	B0352
R0416	3,255.1	3,257.6	2.5	2.6	104.00	B0352	B0352
R0417	3,257.6	3,268.1	10.5	10.6	100.95	B0352	B0353
R0418	3,268.1	3,278.6	10.5	9.7	92.38	B0354	B0355
R0419	3,278.6	3,287.6	9.0	6.9	76.67	B0355	B0355
R0420	3,287.6	3,298.1	10.5	10.2	97.14	B0356	B0357
R0421	3,298.1	3,306.6	8.5	5.2	61.18	B0357	B0357
R0422	3,306.6	3,317.1	10.5	10.5	100.00	B0357	B0358
R0423	3,317.1	3,325.1	8.0	8.1	101.25	B0359	B0359
R0424	3,325.1	3,335.1	10.0	10.2	102.00	B0359	B0360
R0425	3,335.1	3,345.1	10.0	10.3	103.00	B0361	B0362
R0426	3,345.1	3,355.1	10.0	10.0	100.00	B0362	B0363
R0427	3,355.1	3,365.1	10.0	10.4	104.00	B0363	B0364
R0428	3,365.1	3,375.1	10.0	10.7	107.00	B0364	B0365
R0429	3,375.1	3,385.1	10.0	10.2	102.00	B0365	B0366
R0430	3,385.1	3,395.1	10.0	9.8	98.00	B0366	B0367
R0431	3,395.1	3,405.1	10.0	10.6	106.00	B0367	B0368
R0432	3,405.1	3,410.1	5.0	4.5	90.00	B0368	B0369
R0433	3,410.1	3,420.1	10.0	10.1	101.00	B0369	B0370
R0434	3,420.1	3,430.1	10.0	10.5	105.00	B0370	B0371
R0435	3,430.1	3,440.6	10.5	10.5	100.00	B0371	B0372
R0436	3,440.6	3,451.1	10.5	10.0	95.24	B0372	B0373
R0437	3,451.1	3,454.1	3.0	1.9	63.33	B0373	B0374

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0438	3,454.1	3,464.6	10.5	10.8	102.86	B0374	B0375
R0439	3,464.6	3,467.1	2.5	1.4	56.00	B0375	B0375
R0440	3,467.1	3,471.6	4.5	4.0	88.89	B0375	B0375
R0441	3,471.6	3,482.1	10.5	10.5	100.00	B0376	B0377
R0442	3,482.1	3,492.1	10.0	10.3	103.00	B0377	B0378
R0443	3,492.1	3,500.1	8.0	8.6	107.50	B0378	B0379
R0444	3,500.1	3,510.1	10.0	11.0	110.00	B0379	B0380
R0445	3,510.1	3,520.1	10.0	11.0	110.00	B0380	B0381
R0446	3,520.1	3,531.1	11.0	11.0	100.00	B0382	B0383
R0447	3,531.1	3,541.1	10.0	10.0	100.00	B0383	B0384
R0448	3,541.1	3,549.6	8.5	8.4	98.82	B0384	B0385
R0449	3,549.6	3,551.1	1.5	1.0	66.67	B0385	B0385
R0450	3,551.1	3,561.6	10.5	10.7	101.90	B0385	B0386
R0451	3,561.6	3,571.1	9.5	10.2	107.37	B0386	B0387
R0452	3,571.1	3,581.6	10.5	10.7	101.90	B0387	B0389
R0453	3,581.6	3,590.1	8.5	9.5	111.76	B0389	B0390
R0454	3,590.1	3,594.6	4.5	5.1	113.33	B0390	B0390
R0455	3,594.6	3,605.1	10.5	10.4	99.05	B0391	B0392
R0456	3,605.1	3,615.1	10.0	10.8	108.00	B0392	B0393
R0457	3,615.1	3,617.6	2.5	2.3	92.00	B0393	B0393
R0458	3,617.6	3,628.1	10.5	1.5	14.29	B0393	B0393
R0459	3,628.1	3,634.1	6.0	4.5	75.00	B0393	B0393
R0461	3,634.1	3,635.1	1.0	1.0	100.00	B0394	B0394
R0462	3,635.1	3,640.1	5.0	3.7	74.00	B0394	B0395
R0463	3,640.1	3,641.1	1.0	0.7	70.00	B0395	B0395
R0464	3,641.1	3,642.1	1.0	1.0	100.00	B0395	B0395
R0465	3,642.1	3,646.1	4.0	3.0	75.00	B0395	B0395
R0466	3,646.1	3,658.1	12.0	9.5	79.17	B0395	B0396
R0467	3,658.1	3,660.6	2.5	1.0	40.00	B0396	B0396
R0468	3,660.6	3,665.1	4.5	0.0	0.00	B0396	B0396
R0469	3,665.1	3,669.1	4.0	1.7	42.50	B0396	B0396
R0470	3,669.1	3,673.1	4.0	3.8	95.00	B0397	B0397
R0471	3,673.1	3,683.1	10.0	5.2	52.00	B0397	B0398
R0472	3,683.1	3,688.1	5.0	1.4	28.00	B0398	B0398
R0473	3,688.1	3,693.1	5.0	1.0	20.00	B0398	B0398
R0474	3,693.1	3,695.1	2.0	1.8	90.00	B0398	B0398
R0475	3,695.1	3,698.1	3.0	1.7	56.67	B0398	B0398
R0476	3,698.1	3,703.1	5.0	4.0	80.00	B0398	B0399
R0477	3,703.1	3,704.1	1.0	0.7	70.00	B0399	B0399
R0478	3,704.1	3,707.6	3.5	1.5	42.86	B0399	B0399
R0479	3,707.6	3,709.1	1.5	0.0	0.00	B0399	B0399
R0480	3,709.1	3,713.1	4.0	0.7	17.50	B0399	B0399
R0481	3,713.1	3,717.1	4.0	2.4	60.00	B0399	B0399
R0482	3,717.1	3,725.1	8.0	0.7	8.75	B0400	B0400

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0483	3,725.1	3,731.1	6.0	1.2	20.00	B0400	B0400
R0484	3,731.1	3,735.1	4.0	3.6	90.00	B0400	B0400
R0485	3,735.1	3,739.1	4.0	1.9	47.50	B0400	B0400
R0486	4,012.1	4,014.6	2.5	1.0	40.00	B0400	B0401
R0487	4,014.6	4,021.1	6.5	1.3	20.00	B0401	B0401
R0488	4,021.1	4,025.6	4.5	4.0	88.89	B0401	B0401
R0489	4,025.6	4,031.6	6.0	2.6	43.33	B0401	B0402
R0490	4,031.6	4,036.6	5.0	4.8	96.00	B0402	B0402
R0491	4,037.1	4,041.1	4.0	0.5	12.50	B0402	B0402
R0492	4,041.1	4,043.1	2.0	0.5	25.00	B0402	B0402
R0493	4,043.1	4,048.1	5.0	1.0	20.00	B0402	B0402
R0494	4,048.1	4,049.6	1.5	1.3	86.67	B0403	B0403
R0495	4,049.6	4,053.1	3.5	2.0	57.14	B0403	B0403
R0496	4,053.1	4,059.1	6.0	2.6	43.33	B0403	B0403
R0497	4,059.1	4,064.6	5.5	3.1	56.36	B0403	B0404
R0498	4,064.6	4,075.1	10.5	0.0	0.00	B0404	B0404
R0499	4,075.1	4,077.1	2.0	0.0	0.00	B0404	B0404
R0500	4,077.1	4,078.1	1.0	1.0	100.00	B0404	B0404
R0501	4,135.1	4,145.1	10.0	8.9	89.00	B0404	B0405
R0502	4,145.1	4,155.1	10.0	10.1	101.00	B0405	B0406
R0503	4,155.1	4,165.1	10.0	9.5	95.00	B0406	B0407
R0504	4,165.1	4,175.1	10.0	7.5	75.00	B0407	B0408
R0505	4,175.1	4,183.1	8.0	10.3	128.75	B0408	B0409
R0506	4,183.1	4,193.1	10.0	10.4	104.00	B0409	B0410
R0507	4,193.1	4,203.1	10.0	10.3	103.00	B0410	B0411
R0508	4,203.1	4,213.6	10.5	10.5	100.00	B0411	B0412
R0509	4,213.6	4,224.1	10.5	10.8	102.86	B0412	B0413
R0510	4,224.1	4,232.1	8.0	8.6	107.50	B0413	B0414
R0511	4,232.1	4,242.1	10.0	11.0	110.00	B0414	B0415
R0512	4,242.1	4,252.1	10.0	10.5	105.00	B0416	B0417
R0513	4,252.1	4,262.1	10.0	10.6	106.00	B0417	B0418
R0514	4,262.1	4,272.1	10.0	11.1	111.00	B0418	B0419
R0515	4,272.1	4,282.1	10.0	10.7	107.00	B0419	B0420
R0516	4,282.1	4,292.1	10.0	10.5	105.00	B0420	B0421
R0517	4,292.1	4,302.1	10.0	10.8	108.00	B0421	B0422
R0518	4,302.1	4,312.1	10.0	10.4	104.00	B0423	B0424
R0519	4,312.1	4,322.6	10.5	10.4	99.05	B0424	B0425
R0520	4,322.6	4,333.1	10.5	10.8	102.86	B0425	B0426
R0521	4,333.1	4,343.1	10.0	10.5	105.00	B0426	B0427
R0522	4,343.1	4,353.1	10.0	10.4	104.00	B0427	B0428
R0523	4,353.1	4,363.1	10.0	10.8	108.00	B0428	B0430
R0524	4,363.1	4,371.1	8.0	7.9	98.75	B0430	B0430
R0525	4,371.1	4,381.1	10.0	10.6	106.00	B0430	B0432
R0526	4,381.1	4,391.1	10.0	10.5	105.00	B0432	B0433

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0527	4,391.1	4,401.1	10.0	11.5	115.00	B0433	B0434
R0528	4,401.1	4,411.1	10.0	11.0	110.00	B0434	B0435
R0529	4,411.1	4,421.6	10.5	10.5	100.00	B0435	B0436
R0530	4,421.6	4,432.1	10.5	10.4	99.05	B0437	B0438
R0531	4,432.1	4,442.1	10.0	10.6	106.00	B0438	B0439
R0532	4,442.1	4,452.1	10.0	10.6	106.00	B0439	B0440
R0533	4,452.1	4,461.1	9.0	8.8	97.78	B0440	B0441
R0534	4,461.1	4,471.6	10.5	11.7	111.43	B0441	B0442
R0535	4,471.6	4,482.1	10.5	10.8	102.86	B0443	B0444
R0536	4,482.1	4,492.1	10.0	4.7	47.00	B0444	B0444
R0537	4,492.1	4,502.1	10.0	3.0	30.00	B0444	B0445
R0538	4,502.1	4,512.6	10.5	4.1	39.05	B0445	B0445
R0539	4,512.6	4,518.1	5.5	8.6	156.36	B0445	B0446
R0540	4,518.1	4,528.1	10.0	10.4	104.00	B0446	B0447
R0541	4,528.1	4,538.1	10.0	10.4	104.00	B0447	B0448
R0542	4,538.1	4,548.6	10.5	10.5	100.00	B0448	B0449
R0543	4,548.6	4,559.1	10.5	11.0	104.76	B0449	B0450
R0544	4,559.1	4,567.1	8.0	8.1	101.25	B0451	B0451
R0545	4,567.1	4,577.1	10.0	10.2	102.00	B0451	B0452
R0546	4,577.1	4,587.1	10.0	11.0	110.00	B0453	B0454
R0547	4,587.1	4,597.6	10.5	10.8	102.86	B0454	B0455
R0548	4,597.6	4,608.1	10.5	10.6	100.95	B0455	B0456
R0549	4,608.1	4,613.1	5.0	6.0	120.00	B0456	B0457
R0550	4,613.1	4,616.1	3.0	1.6	53.33	B0457	B0457
R0551	4,616.1	4,619.6	3.5	3.0	85.71	B0457	B0458
R0552	4,619.6	4,629.6	10.0	11.5	115.00	B0458	B0459
R0553	4,629.6	4,640.1	10.5	11.7	111.43	B0459	B0460
R0554	4,640.1	4,650.1	10.0	10.3	103.00	B0460	B0461
R0555	4,650.1	4,660.1	10.0	10.3	103.00	B0462	B0463
R0556	4,660.1	4,670.1	10.0	10.2	102.00	B0463	B0464
R0557	4,670.1	4,680.1	10.0	10.4	104.00	B0464	B0465
R0558	4,680.1	4,690.6	10.5	10.2	97.14	B0465	B0466
R0559	4,690.6	4,700.6	10.0	10.3	103.00	B0466	B0467
R0560	4,700.6	4,711.1	10.5	10.5	100.00	B0467	B0468
R0561	4,711.1	4,721.1	10.0	10.4	104.00	B0468	B0469
R0562	4,721.1	4,727.1	6.0	6.2	103.33	B0469	B0470
R0563	4,727.1	4,737.1	10.0	10.2	102.00	B0470	B0471
R0564	4,737.1	4,747.1	10.0	10.3	103.00	B0471	B0472
R0565	4,747.1	4,755.1	8.0	7.8	97.50	B0472	B0473
R0566	4,755.1	4,765.1	10.0	10.1	101.00	B0473	B0474
R0567	4,765.1	4,775.1	10.0	10.1	101.00	B0474	B0475
R0568	4,775.1	4,785.1	10.0	10.1	101.00	B0475	B0476
R0569	4,785.1	4,795.1	10.0	10.3	103.00	B0476	B0477
R0570	4,795.1	4,805.1	10.0	10.2	102.00	B0477	B0478

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0571	4,805.1	4,815.1	10.0	9.9	99.00	B0478	B0479
R0572	4,815.1	4,825.1	10.0	10.1	101.00	B0480	B0481
R0573	4,825.1	4,835.1	10.0	10.3	103.00	B0481	B0482
R0574	4,835.1	4,845.1	10.0	10.2	102.00	B0482	B0483
R0575	4,845.1	4,855.1	10.0	11.5	115.00	B0483	B0484
R0576	4,855.1	4,859.6	4.5	4.2	93.33	B0484	B0485
R0577	4,859.6	4,866.1	6.5	6.9	106.15	B0485	B0486
R0578	4,866.1	4,876.1	10.0	10.9	109.00	B0486	B0487
R0579	4,876.1	4,883.1	7.0	6.8	97.14	B0487	B0488
R0580	4,883.1	4,892.6	9.5	11.3	118.95	B0488	B0489
R0581	4,892.6	4,902.6	10.0	11.2	112.00	B0489	B0491
R0582	4,902.6	4,912.6	10.0	10.8	108.00	B0491	B0492
R0583	4,912.6	4,916.1	3.5	2.9	82.86	B0492	B0492
R0584	4,916.1	4,925.6	9.5	10.0	105.26	B0492	B0493
R0585	4,925.6	4,936.1	10.5	10.7	101.90	B0493	B0495
R0586	4,936.1	4,944.1	8.0	6.9	86.25	B0495	B0495
R0587	4,944.1	4,947.1	3.0	2.8	93.33	B0495	B0496
R0588	4,947.1	4,950.1	3.0	3.7	123.33	B0496	B0496
R0589	4,950.1	4,960.1	10.0	10.2	102.00	B0496	B0497
R0591	4,960.1	4,968.1	8.0	8.3	103.75	B0497	B0498
R0592	4,968.1	4,976.1	8.0	8.8	110.00	B0498	B0499
R0593	4,976.1	4,981.6	5.5	5.7	103.64	B0499	B0500
R0594	4,981.6	4,992.1	10.5	11.0	104.76	B0500	B0501
R0595	4,992.1	5,002.1	10.0	11.2	112.00	B0501	B0502
R0596	5,002.1	5,012.1	10.0	11.2	112.00	B0503	B0504
R0597	5,012.1	5,019.6	7.5	7.2	96.00	B0504	B0505
R0598	5,019.6	5,030.1	10.5	11.7	111.43	B0505	B0506
R0599	5,030.1	5,040.6	10.5	10.7	101.90	B0506	B0507
R0600	5,040.6	5,051.1	10.5	10.9	103.81	B0507	B0508
R0601	5,051.1	5,059.1	8.0	9.6	120.00	B0509	B0510
R0602	5,059.1	5,069.1	10.0	11.1	111.00	B0510	B0511
R0603	5,069.1	5,079.1	10.0	11.9	119.00	B0511	B0512
R0604	5,079.1	5,084.1	5.0	4.8	96.00	B0512	B0513
R0605	5,084.1	5,087.1	3.0	0.0	0.00	B0513	B0513
R0606	5,087.1	5,091.1	4.0	1.9	47.50	B0513	B0513
R0607	5,091.1	5,099.1	8.0	4.4	55.00	B0513	B0514
R0608	5,099.1	5,103.6	4.5	1.7	37.78	B0514	B0514
R0609	5,103.6	5,106.1	2.5	1.0	40.00	B0514	B0514
R0610	5,106.1	5,112.1	6.0	2.0	33.33	B0514	B0514
R0611	5,112.1	5,113.6	1.5	1.5	100.00	B0514	B0514
R0612	5,113.6	5,120.6	7.0	7.7	110.00	B0514	B0515
R0613	5,120.6	5,128.6	8.0	6.6	82.50	B0515	B0516
R0614	5,128.6	5,130.1	1.5	1.0	66.67	B0516	B0516
R0615	5,130.1	5,133.1	3.0	1.4	46.67	B0516	B0516

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0616	5,133.1	5,135.1	2.0	1.4	70.00	B0516	B0516
R0617	5,135.1	5,138.6	3.5	3.6	102.86	B0517	B0517
R0618	5,138.6	5,149.1	10.5	10.4	99.05	B0517	B0518
R0619	5,149.1	5,159.1	10.0	10.1	101.00	B0518	B0519
R0620	5,159.1	5,169.1	10.0	10.8	108.00	B0519	B0520
R0621	5,169.1	5,179.1	10.0	10.7	107.00	B0521	B0522
R0622	5,179.1	5,189.1	10.0	10.9	109.00	B0522	B0523
R0623	5,189.1	5,199.1	10.0	11.1	111.00	B0523	B0524
R0624	5,199.1	5,209.6	10.5	10.0	95.24	B0524	B0525
R0625	5,209.6	5,220.1	10.5	11.7	111.43	B0525	B0527
R0626	5,220.1	5,230.1	10.0	11.2	112.00	B0527	B0528
R0627	5,230.1	5,238.1	8.0	8.5	106.25	B0528	B0529
R0628	5,238.1	5,248.1	10.0	10.9	109.00	B0529	B0530
R0629	5,248.1	5,258.1	10.0	10.4	104.00	B0530	B0531
R0630	5,258.1	5,268.1	10.0	10.8	108.00	B0531	B0533
R0631	5,268.1	5,278.1	10.0	10.9	109.00	B0533	B0534
R0632	5,278.1	5,288.1	10.0	9.7	97.00	B0534	B0535
R0633	5,288.1	5,298.1	10.0	10.5	105.00	B0535	B0536
R0634	5,298.1	5,308.1	10.0	10.1	101.00	B0536	B0537
R0635	5,308.1	5,318.1	10.0	10.9	109.00	B0538	B0539
R0636	5,318.1	5,326.1	8.0	8.2	102.50	B0539	B0540
R0637	5,326.1	5,336.1	10.0	11.7	117.00	B0540	B0541
R0638	5,336.1	5,346.1	10.0	10.7	107.00	B0541	B0542
R0639	5,346.1	5,356.1	10.0	11.4	114.00	B0542	B0544
R0640	5,356.1	5,366.1	10.0	10.6	106.00	B0544	B0545
R0641	5,366.1	5,376.1	10.0	10.7	107.00	B0545	B0546
R0642	5,376.1	5,386.1	10.0	10.5	105.00	B0546	B0547
R0643	5,386.1	5,396.1	10.0	11.6	116.00	B0547	B0549
R0644	5,396.1	5,406.1	10.0	10.9	109.00	B0549	B0550
R0645	5,406.1	5,414.1	8.0	8.3	103.75	B0550	B0551
R0646	5,414.1	5,424.1	10.0	10.3	103.00	B0551	B0552
R0647	5,424.1	5,434.1	10.0	11.2	112.00	B0552	B0553
R0648	5,434.1	5,444.1	10.0	10.7	107.00	B0553	B0555
R0649	5,444.1	5,452.1	8.0	8.8	110.00	B0555	B0556
R0650	5,452.1	5,462.1	10.0	11.2	112.00	B0556	B0557
R0651	5,462.1	5,472.1	10.0	10.7	107.00	B0557	B0558
R0652	5,472.1	5,482.1	10.0	10.4	104.00	B0558	B0559
R0653	5,482.1	5,492.1	10.0	10.2	102.00	B0559	B0560
R0654	5,492.1	5,502.1	10.0	10.4	104.00	B0560	B0561
R0655	5,502.1	5,510.1	8.0	7.9	98.75	B0562	B0562
R0656	5,510.1	5,520.1	10.0	10.1	101.00	B0562	B0563
R0657	5,520.1	5,530.1	10.0	10.1	101.00	B0563	B0565
R0658	5,530.1	5,540.1	10.0	10.5	105.00	B0565	B0566
R0659	5,540.1	5,550.1	10.0	10.3	103.00	B0566	B0567

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0660	5,550.1	5,560.1	10.0	10.2	102.00	B0567	B0568
R0661	5,560.1	5,568.1	8.0	8.2	102.50	B0568	B0569
R0662	5,568.1	5,578.1	10.0	1.5	15.00	B0569	B0569
R0663	5,578.1	5,589.1	11.0	10.4	94.55	B0569	B0570
R0664	5,589.1	5,599.1	10.0	10.3	103.00	B0570	B0571
R0665	5,599.1	5,609.1	10.0	10.4	104.00	B0571	B0572
R0666	5,609.1	5,617.1	8.0	8.1	101.25	B0573	B0573
R0667	5,617.1	5,627.1	10.0	10.2	102.00	B0573	B0574
R0668	5,627.1	5,637.1	10.0	10.4	104.00	B0574	B0575
R0669	5,637.1	5,647.1	10.0	10.5	105.00	B0576	B0577
R0670	5,647.1	5,657.6	10.5	10.7	101.90	B0577	B0578
R0671	5,657.6	5,667.6	10.0	10.6	106.00	B0578	B0579
R0672	5,667.6	5,678.1	10.5	10.3	98.10	B0579	B0580
R0673	5,678.1	5,688.1	10.0	10.3	103.00	B0580	B0581
R0674	5,688.1	5,698.1	10.0	10.2	102.00	B0581	B0582
R0675	5,698.1	5,708.1	10.0	10.6	106.00	B0582	B0583
R0676	5,708.1	5,718.1	10.0	10.5	105.00	B0584	B0585
R0677	5,718.1	5,726.1	8.0	8.3	103.75	B0585	B0586
R0678	5,726.1	5,736.6	10.5	10.2	97.14	B0586	B0587
R0679	5,736.6	5,747.1	10.5	10.2	97.14	B0587	B0588
R0680	5,747.1	5,757.1	10.0	10.5	105.00	B0588	B0589
R0681	5,757.1	5,767.1	10.0	10.1	101.00	B0589	B0590
R0682	5,767.1	5,777.6	10.5	10.5	100.00	B0590	B0591
R0683	5,777.6	5,787.1	9.5	9.5	100.00	B0591	B0592
R0684	5,787.1	5,797.1	10.0	10.6	106.00	B0592	B0594
R0685	5,797.1	5,807.1	10.0	10.3	103.00	B0594	B0595
R0686	5,807.1	5,817.1	10.0	10.4	104.00	B0595	B0596
R0687	5,817.1	5,827.6	10.5	10.2	97.14	B0596	B0597
R0688	5,827.6	5,836.1	8.5	8.2	96.47	B0597	B0598
R0689	5,836.1	5,846.1	10.0	10.0	100.00	B0598	B0599
R0690	5,846.1	5,856.1	10.0	11.0	110.00	B0599	B0600
R0691	5,856.1	5,866.1	10.0	10.9	109.00	B0600	B0601
R0692	5,866.1	5,872.1	6.0	7.0	116.67	B0601	B0602
R0693	5,872.1	5,878.1	6.0	6.9	115.00	B0602	B0603
R0694	5,878.1	5,888.1	10.0	10.9	109.00	B0603	B0604
R0695	5,888.1	5,888.6	0.5	0.5	100.00	B0604	B0604
R0696	5,888.6	5,898.1	9.5	10.2	107.37	B0604	B0605
R0697	5,898.1	5,908.1	10.0	10.3	103.00	B0605	B0607
R0698	5,908.1	5,918.6	10.5	10.3	98.10	B0607	B0608
R0699	5,918.6	5,929.1	10.5	10.2	97.14	B0608	B0609
R0700	5,929.1	5,939.1	10.0	10.4	104.00	B0609	B0610
R0701	5,939.1	5,949.1	10.0	10.3	103.00	B0610	B0611
R0702	5,949.1	5,959.1	10.0	10.3	103.00	B0611	B0612
R0703	5,959.1	5,969.1	10.0	10.4	104.00	B0612	B0613

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0704	5,969.1	5,980.1	11.0	3.0	27.27	B0613	B0614
R0705	5,980.1	6,001.6	21.5	21.4	99.53	B0614	B0616
R0706	6,001.6	6,018.1	16.5	17.2	104.24	B0616	B0618
R0707	6,018.1	6,039.6	21.5	21.6	100.47	B0618	B0620
R0708	6,039.6	6,061.1	21.5	21.5	100.00	B0620	B0622
R0709	6,061.1	6,082.6	21.5	21.2	98.60	B0622	B0625
R0710	6,082.6	6,104.1	21.5	21.7	100.93	B0625	B0627
R0711	6,104.1	6,123.6	19.5	20.3	104.10	B0627	B0629
R0712	6,123.6	6,145.1	21.5	21.7	100.93	B0629	B0631
R0713	6,145.1	6,166.6	21.5	21.8	101.40	B0631	B0634
R0714	6,166.6	6,185.6	19.0	20.0	105.26	B0634	B0636
R0715	6,185.6	6,200.6	15.0	17.0	113.33	B0636	B0638
R0716	6,200.6	6,220.1	19.5	19.3	98.97	B0638	B0640
R0717	6,220.1	6,241.6	21.5	21.4	99.53	B0640	B0642
R0718	6,241.6	6,263.1	21.5	21.5	100.00	B0642	B0644
R0719	6,263.1	6,284.6	21.5	22.7	105.58	B0644	B0647
R0720	6,284.6	6,305.6	21.0	20.9	99.52	B0647	B0649
R0721	6,305.6	6,309.6	4.0	4.2	105.00	B0649	B0649
R0722	6,309.6	6,329.1	19.5	20.0	102.56	B0650	B0652
R0723	6,329.1	6,350.1	21.0	21.8	103.81	B0652	B0654
R0724	6,350.1	6,371.1	21.0	21.9	104.29	B0654	B0656
R0725	6,371.1	6,392.6	21.5	21.7	100.93	B0656	B0658
R0726	6,392.6	6,414.1	21.5	21.7	100.93	B0659	B0661
R0727	6,414.1	6,435.6	21.5	21.7	100.93	B0661	B0663
R0728	6,435.6	6,455.1	19.5	19.8	101.54	B0663	B0665
R0729	6,455.1	6,470.1	15.0	15.5	103.33	B0665	B0667
R0731	6,470.1	6,473.1	3.0	3.0	100.00	B0667	B0667
R0732	6,473.1	6,494.1	21.0	21.5	102.38	B0667	B0669
R0733	6,494.1	6,515.6	21.5	21.9	101.86	B0669	B0671
R0734	6,515.6	6,525.6	10.0	10.3	103.00	B0672	B0673
R0735	6,525.6	6,536.6	11.0	11.9	108.18	B0673	B0674
R0736	6,536.6	6,543.6	7.0	7.1	101.43	B0674	B0675
R0737	6,543.6	6,550.1	6.5	7.1	109.23	B0675	B0676
R0738	6,550.1	6,557.1	7.0	8.6	122.86	B0676	B0677
R0739	6,557.1	6,563.1	6.0	7.0	116.67	B0677	B0677
R0740	6,563.1	6,584.1	21.0	22.3	106.19	B0678	B0680
R0741	6,584.1	6,605.6	21.5	22.5	104.65	B0680	B0683
R0742	6,605.6	6,614.6	9.0	9.7	107.78	B0683	B0684
R0743	6,614.6	6,636.1	21.5	21.5	100.00	B0683	B0686
R0744	6,636.1	6,657.6	21.5	21.9	101.86	B0686	B0688
R0745	6,657.6	6,678.6	21.0	21.9	104.29	B0688	B0691
R0746	6,678.6	6,697.6	19.0	19.9	104.74	B0691	B0693
R0747	6,697.6	6,716.1	18.5	20.5	110.81	B0693	B0695
R0748	6,716.1	6,737.6	21.5	23.2	107.91	B0695	B0698

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0749	6,737.6	6,753.1	15.5	13.5	87.10	B0698	B0699
R0750	6,753.1	6,774.6	21.5	22.9	106.51	B0699	B0702
R0751	6,774.6	6,794.1	19.5	18.3	93.85	B0702	B0704
R0752	6,794.1	6,816.1	22.0	22.6	102.73	B0704	B0707
R0753	6,816.1	6,837.6	21.5	21.9	101.86	B0707	B0709
R0754	6,837.6	6,859.1	21.5	22.0	102.33	B0709	B0711
R0755	6,859.1	6,870.1	11.0	10.8	98.18	B0711	B0713
R0756	6,870.1	6,885.1	15.0	16.3	108.67	B0713	B0714
R0757	6,885.1	6,906.6	21.5	22.0	102.33	B0714	B0717
R0758	6,906.6	6,921.1	14.5	15.7	108.28	B0717	B0718
R0759	6,921.1	6,940.6	19.5	20.8	106.67	B0719	B0721
R0760	6,940.6	6,953.6	13.0	13.9	106.92	B0721	B0722
R0761	6,953.6	6,961.1	7.5	6.8	90.67	B0722	B0723
R0762	6,961.1	6,978.1	17.0	17.6	103.53	B0723	B0724
R0763	6,978.1	6,995.6	17.5	17.1	97.71	B0725	B0727
R0764	6,995.6	7,012.1	16.5	15.8	95.76	B0727	B0729
R0765	7,012.1	7,032.6	20.5	21.5	104.88	B0729	B0731
R0766	7,032.6	7,043.6	11.0	11.2	101.82	B0731	B0732
R0767	7,043.6	7,065.1	21.5	21.3	99.07	B0732	B0734
R0768	7,065.1	7,086.6	21.5	21.5	100.00	B0734	B0737
R0769	7,086.6	7,108.1	21.5	21.8	101.40	B0737	B0739
R0770	7,108.1	7,129.6	21.5	21.8	101.40	B0739	B0741
R0771	7,129.6	7,151.1	21.5	21.7	100.93	B0741	B0744
R0772	7,151.1	7,172.1	21.0	21.7	103.33	B0744	B0746
R0773	7,172.1	7,186.6	14.5	14.3	98.62	B0746	B0747
R0774	7,186.6	7,208.1	21.5	21.5	100.00	B0748	B0750
R0775	7,208.1	7,229.6	21.5	21.6	100.47	B0750	B0752
R0776	7,229.6	7,251.1	21.5	21.7	100.93	B0752	B0754
R0777	7,251.1	7,272.6	21.5	21.7	100.93	B0754	B0756
R0778	7,272.6	7,294.1	21.5	21.5	100.00	B0757	B0759
R0779	7,294.1	7,315.6	21.5	21.7	100.93	B0759	B0761
R0780	7,315.6	7,336.6	21.0	21.7	103.33	B0761	B0763
R0781	7,336.6	7,358.1	21.5	21.7	100.93	B0763	B0766
R0782	7,358.1	7,366.1	8.0	8.2	102.50	B0766	B0766
R0783	7,366.1	7,385.1	19.0	18.7	98.42	B0766	B0768
R0784	7,385.1	7,398.1	13.0	12.8	98.46	B0768	B0770
R0785	7,398.1	7,400.6	2.5	3.0	120.00	B0770	B0770
R0786	7,400.6	7,417.6	17.0	18.0	105.88	B0770	B0772
R0787	7,417.6	7,436.6	19.0	18.7	98.42	B0772	B0774
R0788	7,436.6	7,440.1	3.5	4.2	120.00	B0774	B0775
R0789	7,440.1	7,448.1	8.0	6.8	85.00	B0775	B0776
R0790	7,448.1	7,469.6	21.5	21.9	101.86	B0776	B0778
R0791	7,469.6	7,491.1	21.5	21.4	99.53	B0778	B0780
R0792	7,491.1	7,506.1	15.0	16.0	106.67	B0780	B0782

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0793	7,506.1	7,517.6	11.5	13.7	119.13	B0782	B0783
R0794	7,517.6	7,525.1	7.5	7.5	100.00	B0783	B0784
R0795	7,525.1	7,538.1	13.0	9.9	76.15	B0784	B0785
R0796	7,538.1	7,549.1	11.0	10.7	97.27	B0785	B0786
R0797	7,549.1	7,561.1	12.0	11.7	97.50	B0786	B0788
R0798	7,561.1	7,580.1	19.0	19.3	101.58	B0788	B0790
R0799	7,580.1	7,601.6	21.5	21.9	101.86	B0790	B0792
R0800	7,601.6	7,623.1	21.5	21.7	100.93	B0792	B0794
R0801	7,623.1	7,642.6	19.5	18.0	92.31	B0794	B0796
R0802	7,642.6	7,649.1	6.5	6.0	92.31	B0796	B0797
R0803	7,649.1	7,654.1	5.0	5.1	102.00	B0797	B0798
R0804	7,654.1	7,658.1	4.0	4.0	100.00	B0798	B0798
R0805	7,658.1	7,667.1	9.0	9.4	104.44	B0798	B0799
R0806	7,667.1	7,675.6	8.5	8.3	97.65	B0799	B0800
R0807	7,675.6	7,686.1	10.5	11.9	113.33	B0800	B0801
R0808	7,686.1	7,697.6	11.5	10.7	93.04	B0801	B0802
R0809	7,697.6	7,710.1	12.5	12.6	100.80	B0803	B0804
R0810	7,710.1	7,711.1	1.0	1.3	130.00	B0804	B0804
R0811	7,711.1	7,711.6	0.5	0.6	120.00	B0804	B0804
R0813	7,712.1	7,716.6	4.5	3.6	80.00	B0804	B0804
R0814	7,716.6	7,736.6	20.0	21.1	105.50	B0805	B0807
R0815	7,736.6	7,742.6	6.0	6.0	100.00	B0807	B0807
R0816	7,742.6	7,754.1	11.5	12.3	106.96	B0808	B0809
R0817	7,754.1	7,760.1	6.0	5.5	91.67	B0808	B0809
R0818	7,760.1	7,766.1	6.0	5.7	95.00	B0810	B0810
R0819	7,766.1	7,787.6	21.5	20.8	96.74	B0810	B0812
R0820	7,787.6	7,801.1	13.5	12.9	95.56	B0812	B0814
R0821	7,801.1	7,813.6	12.5	12.9	103.20	B0814	B0815
R0822	7,813.6	7,835.1	21.5	21.9	101.86	B0815	B0817
R0823	7,835.1	7,857.1	22.0	22.0	100.00	B0817	B0820
R0824	7,857.1	7,876.1	19.0	19.2	101.05	B0820	B0822
R0825	7,876.1	7,897.6	21.5	22.3	103.72	B0822	B0824
R0826	7,897.6	7,919.1	21.5	22.0	102.33	B0824	B0826
R0827	7,919.1	7,937.1	18.0	17.3	96.11	B0827	B0828
R0828	7,937.1	7,958.1	21.0	21.8	103.81	B0828	B0831
R0829	7,958.1	7,976.6	18.5	18.5	100.00	B0831	B0833
R0830	7,976.6	7,998.1	21.5	21.5	100.00	B0833	B0835
R0831	7,998.1	8,015.1	17.0	19.7	115.88	B0835	B0837
R0832	8,015.1	8,026.1	11.0	11.4	103.64	B0837	B0839
R0833	8,026.1	8,047.6	21.5	23.0	106.98	B0839	B0841
R0834	8,047.6	8,067.1	19.5	19.3	98.97	B0841	B0843
R0835	8,067.1	8,087.1	20.0	21.6	108.00	B0843	B0845
R0836	8,087.1	8,108.6	21.5	21.8	101.40	B0845	B0847
R0837	8,108.6	8,130.1	21.5	21.5	100.00	B0847	B0850

CORE RUN DEPTH LOG

run	depth (ft bsl)		interval	core recovery		core box	
	top	bottom		(ft)	(%)	top	bottom
R0838	8,130.1	8,151.6	21.5	21.7	100.93	B0850	B0852
R0839	8,151.6	8,173.1	21.5	20.9	97.21	B0852	B0854
R0840	8,173.1	8,187.1	14.0	14.8	105.71	B0854	B0856
R0841	8,187.1	8,209.1	22.0	21.6	98.18	B0856	B0858
R0842	8,209.1	8,231.1	22.0	22.4	101.82	B0858	B0860
R0843	8,231.1	8,246.1	15.0	15.9	106.00	B0860	B0862
R0844	8,246.1	8,268.1	22.0	22.6	102.73	B0862	B0865
R0845	8,268.1	8,280.6	12.5	12.3	98.40	B0865	B0866
R0846	8,280.6	8,302.6	22.0	20.2	91.82	B0866	B0868
R0847	8,302.6	8,323.1	20.5	21.9	106.83	B0868	B0870
R0848	8,323.1	8,339.1	16.0	16.5	103.13	B0870	B0872
R0849	8,339.1	8,361.1	22.0	22.2	100.91	B0872	B0874
R0850	8,361.1	8,383.1	22.0	22.1	100.45	B0874	B0876
R0851	8,383.1	8,405.1	22.0	21.8	99.09	B0877	B0879
R0852	8,405.1	8,425.1	20.0	20.0	100.00	B0879	B0881
R0853	8,425.1	8,447.1	22.0	22.0	100.00	B0881	B0883
R0854	8,447.1	8,468.1	21.0	22.0	104.76	B0883	B0885
R0855	8,468.1	8,490.1	22.0	22.1	100.45	B0885	B0888
R0856	8,490.1	8,506.1	16.0	16.2	101.25	B0888	B0890
R0857	8,506.1	8,528.1	22.0	22.3	101.36	B0890	B0892
R0858	8,528.1	8,547.1	19.0	19.2	101.05	B0892	B0894
R0859	8,547.1	8,569.1	22.0	21.8	99.09	B0894	B0896
R0860	8,569.1	8,591.1	22.0	22.7	103.18	B0896	B0899
R0861	8,591.1	8,593.1	2.0	2.1	105.00	B0899	B0899
R0862	8,593.1	8,602.1	9.0	8.5	94.44	B0899	B0900
R0863	8,602.1	8,624.1	22.0	22.3	101.36	B0900	B0902
R0864	8,624.1	8,644.1	20.0	20.3	101.50	B0903	B0904
R0865	8,644.1	8,655.1	11.0	12.2	110.91	B0905	B0906
R0866	8,655.1	8,663.1	8.0	8.8	110.00	B0906	B0907
R0867	8,663.1	8,674.1	11.0	11.8	107.27	B0907	B0908
R0868	8,674.1	8,682.1	8.0	8.3	103.75	B0908	B0909
R0869	8,682.1	8,688.1	6.0	7.2	120.00	B0909	B0910
R0870	8,688.1	8,692.6	4.5	4.0	88.89	B0910	B0911
R0871	8,692.6	8,713.1	20.5	22.9	111.71	B0911	B0913
R0872	8,713.1	8,717.1	4.0	4.8	120.00	B0913	B0914
R0873	8,717.1	8,727.1	10.0	11.7	117.00	B0914	B0915
R0874	8,727.1	8,728.1	1.0	0.9	90.00	B0915	B0915
R0875	8,728.1	8,750.1	22.0	23.6	107.27	B0915	B0918
R0876	8,750.1	8,761.1	11.0	10.9	99.09	B0918	B0919
R0877	8,761.1	8,768.1	7.0	7.9	112.86	B0919	B0920
R0878	8,768.1	8,777.1	9.0	10.3	114.44	B0920	B0921
R0879	8,777.1	8,789.1	12.0	13.0	108.33	B0921	B0922
R0880	8,789.1	8,794.1	5.0	3.5	70.00	B0923	B0923
R0881	8,794.1	8,799.1	5.0	4.5	90.00	B0923	B0923

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0882	8,799.1	8,810.6	11.5	12.8	111.30	B0923	B0925
R0883	8,810.6	8,816.1	5.5	5.8	105.45	B0925	B0925
R0884	8,816.1	8,820.6	4.5	5.4	120.00	B0925	B0926
R0885	8,820.6	8,842.6	22.0	22.3	101.36	B0926	B0928
R0886	8,842.6	8,864.6	22.0	22.0	100.00	B0928	B0931
R0887	8,864.6	8,887.1	22.5	21.7	96.44	B0931	B0933
R0888	8,887.1	8,907.1	20.0	21.4	107.00	B0933	B0935
R0889	8,907.1	8,922.1	15.0	16.5	110.00	B0936	B0937
R0890	8,922.1	8,940.1	18.0	19.1	106.11	B0937	B0939
R0891	8,940.1	8,962.1	22.0	22.2	100.91	B0939	B0942
R0892	8,962.1	8,982.1	20.0	20.6	103.00	B0942	B0944
R0893	8,982.1	9,004.1	22.0	22.0	100.00	B0944	B0946
R0894	9,004.1	9,026.1	22.0	22.0	100.00	B0946	B0949
R0895	9,026.1	9,048.1	22.0	22.2	100.91	B0949	B0951
R0896	9,048.1	9,070.1	22.0	23.8	108.18	B0951	B0954
R0897	9,070.1	9,077.1	7.0	7.0	100.00	B0954	B0954
R0898	9,077.1	9,086.1	9.0	9.5	105.56	B0955	B0956
R0899	9,086.1	9,098.1	12.0	13.1	109.17	B0956	B0957
R0900	9,098.1	9,102.1	4.0	2.6	65.00	B0957	B0958
R0901	9,102.1	9,111.1	9.0	10.9	121.11	B0958	B0959
R0902	9,111.1	9,117.1	6.0	5.8	96.67	B0595	B0959
R0903	9,117.1	9,128.6	11.5	12.8	111.30	B0959	B0961
R0904	9,128.6	9,129.1	0.5	0.5	100.00	B0961	B0961
R0905	9,129.1	9,141.1	12.0	12.9	107.50	B0961	B0962
R0906	9,141.1	9,149.1	8.0	12.9	161.25	B0961	B0962
R0907	9,149.1	9,158.1	9.0	8.7	96.67	B0963	B0964
R0908	9,158.1	9,179.1	21.0	21.0	100.00	B0964	B0967
R0909	9,179.1	9,201.1	22.0	22.8	103.64	B0967	B0969
R0910	9,201.1	9,223.1	22.0	22.4	101.82	B0969	B0971
R0911	9,223.1	9,244.1	21.0	22.2	105.71	B0971	B0974
R0912	9,244.1	9,266.1	22.0	22.9	104.09	B0974	B0976
R0913	9,266.1	9,280.1	14.0	14.6	104.29	B0976	B0978
R0914	9,280.1	9,292.1	12.0	14.5	120.83	B0978	B0979
R0915	9,292.1	9,306.1	14.0	16.3	116.43	B0980	B0981
R0916	9,306.1	9,324.1	18.0	19.5	108.33	B0981	B0983
R0917	9,324.1	9,346.1	22.0	22.4	101.82	B0984	B0986
R0918	9,346.1	9,368.1	22.0	12.2	55.45	B0986	B0988
R0919	9,368.1	9,372.1	4.0	4.4	110.00	B0988	B0989
R0921	9,372.1	9,392.1	20.0	19.4	97.00	B0989	B0991
R0922	9,392.1	9,414.1	22.0	22.2	100.91	B0991	B0993
R0923	9,414.1	9,430.1	16.0	16.8	105.00	B0993	B0995
R0924	9,430.1	9,452.1	22.0	22.2	100.91	B0995	B0997
R0925	9,452.1	9,474.1	22.0	22.2	100.91	B0997	B0999
R0926	9,474.1	9,494.1	20.0	19.9	99.50	B0999	B1001

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0927	9,494.1	9,516.1	22.0	22.5	102.27	B1001	B1004
R0928	9,516.1	9,538.1	22.0	22.4	101.82	B1004	B1006
R0929	9,538.1	9,560.1	22.0	22.7	103.18	B1006	B1008
R0930	9,560.1	9,582.1	22.0	22.7	103.18	B1009	B1011
R0931	9,582.1	9,603.1	21.0	23.7	112.86	B1011	B1014
R0932	9,603.1	9,610.1	7.0	8.8	125.71	B1014	B1015
R0933	9,610.1	9,623.1	13.0	14.1	108.46	B1015	B1017
R0934	9,623.1	9,634.1	11.0	11.1	100.91	B1017	B1018
R0935	9,634.1	9,656.1	22.0	23.2	105.45	B1018	B1020
R0936	9,656.1	9,675.1	19.0	21.3	112.11	B1020	B1023
R0937	9,675.1	9,683.1	8.0	10.5	131.25	B1023	B1024
R0938	9,683.1	9,694.1	11.0	11.8	107.27	B1024	B1025
R0939	9,694.1	9,716.1	22.0	23.0	104.55	B1025	B1028
R0940	9,716.1	9,736.1	20.0	22.9	114.50	B1028	B1030
R0941	9,736.1	9,750.1	14.0	16.0	114.29	B1030	B1032
R0942	9,750.1	9,761.1	11.0	14.2	129.09	B1032	B1034
R0943	9,761.1	9,765.1	4.0	3.4	85.00	B1034	B1034
R0944	9,765.1	9,776.1	11.0	11.7	106.36	B1034	B1036
R0945	9,776.1	9,790.1	14.0	15.7	112.14	B1036	B1037
R0946	9,790.1	9,795.1	5.0	6.4	128.00	B1037	B1038
R0947	9,795.1	9,808.1	13.0	14.0	107.69	B1038	B1040
R0948	9,808.1	9,814.1	6.0	7.5	125.00	B1040	B1041
R0949	9,814.1	9,824.1	10.0	13.6	136.00	B1041	B1042
R0950	9,824.1	9,830.1	6.0	8.5	141.67	B1042	B1043
R0951	9,830.1	9,846.1	16.0	17.6	110.00	B1043	B1045
R0952	9,846.1	9,849.1	3.0	4.0	133.33	B1045	B1046
R0953	9,849.1	9,862.1	13.0	13.2	101.54	B1046	B1047
R0954	9,862.1	9,874.1	12.0	12.7	105.83	B1047	B1049
R0955	9,874.1	9,884.1	10.0	12.5	125.00	B1049	B1050
R0956	9,884.1	9,905.1	21.0	21.6	102.86	B1050	B1053
R0957	9,905.1	9,916.1	11.0	14.1	128.18	B1053	B1054
R0958	9,916.1	9,930.1	14.0	11.0	78.57	B1054	B1056
R0959	9,930.1	9,952.1	22.0	22.0	100.00	B1056	B1058
R0960	9,952.1	9,962.1	10.0	9.8	98.00	B1058	B1059
R0961	9,962.1	9,984.1	22.0	20.7	94.09	B1060	B1062
R0962	9,984.1	10,004.1	20.0	20.5	102.50	B1062	B1064
R0963	10,004.1	10,026.1	22.0	22.3	101.36	B1064	B1066
R0964	10,026.1	10,048.1	22.0	22.3	101.36	B1066	B1069
R0965	10,048.1	10,053.1	5.0	6.0	120.00	B1069	B1069
R0966	10,053.1	10,063.1	10.0	10.0	100.00	B1069	B1071
R0967	10,063.1	10,075.1	12.0	13.0	108.33	B1071	B1072
R0968	10,075.1	10,085.1	10.0	10.8	108.00	B1072	B1073
R0969	10,085.1	10,096.1	11.0	12.0	109.09	B1073	B1075
R0970	10,096.1	10,103.1	7.0	7.3	104.29	B1075	B1075

CORE RUN DEPTH LOG

run	depth (ft bsl) top	depth (ft bsl) bottom	interval	core recovery (ft)	core recovery (%)	core box top	core box bottom
R0971	10,103.1	10,110.1	7.0	7.5	107.14	B1075	B1076
R0972	10,110.1	10,126.1	16.0	17.7	110.63	B1076	B1078
R0973	10,126.1	10,126.6	0.5	0.5	100.00	B1079	B1079
R0974	10,126.6	10,132.1	5.5	5.5	100.00	B1079	B1079
R0975	10,132.1	10,142.1	10.0	10.9	109.00	B1079	B1081
R0976	10,142.1	10,142.6	0.5	0.5	100.00	B1081	B1081
R0978	10,142.6	10,154.1	11.5	11.0	95.65	B1081	B1082
R0979	10,154.1	10,163.1	9.0	10.0	111.11	B1082	B1083
R0980	10,163.1	10,163.6	0.5	0.5	100.00	B1083	B1083

TOTAL CORE RECOVERY: 95.40 %

Hawaii Scientific Drilling Project

DIS: Data-Report WORKING CORE BOX RECORD FORM

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0001	-5.9	5.1	11.0	R0001	0.0	R0002	7.0
B0002	5.1	22.1	17.0	R0003	0.0	R0006	2.5
B0003	22.1	29.7	7.6	R0006	2.5	R0008	1.1
B0004	29.7	38.4	8.7	R0008	1.1	R0009	4.8
B0005	38.4	47.4	9.0	R0009	4.8	R0011	3.3
B0006	47.4	54.1	6.7	R0011	3.3	R0012	5.5
B0007	54.1	63.1	9.0	R0013	0.0	R0014	5.0
B0008	63.1	80.9	17.8	R0014	5.0	R0017	2.3
B0009	80.9	94.1	13.2	R0017	2.3	R0019	5.5
B0010	94.1	102.6	8.5	R0020	0.0	R0021	4.0
B0011	102.6	109.4	6.8	R0021	4.0	R0023	0.8
B0012	109.4	118.0	8.6	R0023	0.8	R0024	3.9
B0013	118.0	126.8	8.8	R0024	3.9	R0026	2.7
B0014	126.8	135.8	9.0	R0026	2.7	R0028	1.7
B0015	135.8	144.4	8.6	R0028	1.7	R0030	0.3
B0016	144.4	153.7	9.3	R0030	0.3	R0032	0.6
B0017	153.7	161.9	8.2	R0032	0.6	R0033	3.8
B0018	161.9	170.0	8.1	R0033	3.8	R0035	1.4
B0019	170.0	178.6	8.6	R0035	1.4	R0036	4.5
B0020	178.6	187.1	8.5	R0037	0.0	R0038	3.0
B0021	187.1	195.2	8.1	R0038	3.0	R0040	1.1
B0022	195.2	204.0	8.8	R0040	1.1	R0041	4.9
B0023	204.0	213.6	9.6	R0041	4.9	R0043	4.5
B0024	213.6	222.1	8.5	R0043	4.5	R0045	3.0
B0025	222.1	230.1	8.0	R0045	3.0	R0047	1.0
B0026	230.1	239.1	9.0	R0047	1.0	R0048	5.0
B0027	239.1	247.1	8.0	R0049	0.0	R0050	3.0
B0028	247.1	254.6	7.5	R0050	3.0	R0052	0.5
B0029	254.6	262.9	8.3	R0052	0.5	R0054	0.8
B0030	262.9	271.6	8.7	R0054	0.8	R0055	4.0
B0031	271.6	280.4	8.8	R0055	4.0	R0057	1.8
B0032	280.4	289.1	8.7	R0057	1.8	R0058	5.0
B0033	289.1	297.6	8.5	R0059	0.0	R0060	3.5
B0034	297.6	307.8	10.2	R0060	3.5	R0062	3.7
B0035	307.8	316.1	8.3	R0062	3.7	R0064	2.0
B0036	316.1	324.1	8.0	R0064	2.0	R0065	5.0
B0037	324.1	332.7	8.6	R0066	0.0	R0067	3.6
B0038	332.7	341.6	8.9	R0067	3.6	R0069	2.5
B0039	341.6	349.1	7.5	R0069	2.5	R0070	5.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0040	349.1	357.3	8.2	R0071	0.0	R0072	3.2
B0041	357.3	365.4	8.1	R0072	3.2	R0074	1.3
B0042	365.4	373.6	8.2	R0074	1.3	R0075	4.5
B0043	373.6	385.6	12.0	R0075	4.5	R0077	0.5
B0044	385.6	396.9	11.3	R0077	0.5	R0078	6.8
B0045	396.9	406.6	9.7	R0078	6.8	R0079	6.0
B0046	406.6	417.2	10.6	R0079	6.0	R0080	6.1
B0047	417.2	425.6	8.4	R0080	6.1	R0081	4.5
B0048	425.6	433.6	8.0	R0081	4.5	R0082	2.5
B0049	433.6	442.9	9.3	R0082	2.5	R0083	1.3
B0050	442.9	451.3	8.4	R0083	1.3	R0083	9.7
B0051	451.3	460.2	8.9	R0083	9.7	R0084	8.6
B0052	460.2	468.3	8.1	R0084	8.6	R0085	6.7
B0053	468.3	477.0	8.7	R0085	6.7	R0086	6.9
B0054	477.0	485.8	8.8	R0086	6.9	R0087	5.7
B0055	485.8	495.8	10.0	R0087	5.7	R0089	5.2
B0056	495.8	504.1	8.3	R0089	5.2	R0090	3.5
B0057	504.1	513.8	9.7	R0090	3.5	R0091	5.2
B0058	513.8	523.3	9.5	R0091	5.2	R0092	4.2
B0059	523.3	531.8	8.5	R0092	4.2	R0093	2.7
B0060	531.8	541.2	9.4	R0093	2.7	R0094	1.6
B0061	541.2	550.1	8.9	R0094	1.6	R0094	10.5
B0062	550.1	560.1	10.0	R0095	0.0	R0095	10.0
B0063	560.1	568.9	8.8	R0096	0.0	R0096	8.8
B0064	568.9	576.7	7.8	R0096	8.8	R0097	6.1
B0065	576.7	585.1	8.4	R0097	6.1	R0098	4.0
B0066	585.1	593.7	8.6	R0098	4.0	R0099	2.6
B0067	593.7	602.4	8.7	R0099	2.6	R0100	0.8
B0068	602.4	612.1	9.7	R0100	0.8	R0100	10.5
B0069	612.1	621.6	9.5	R0101	0.0	R0101	9.5
B0070	621.6	628.2	6.6	R0101	9.5	R0102	6.1
B0071	628.2	636.3	8.1	R0102	6.1	R0103	4.2
B0072	636.3	645.6	9.3	R0103	4.2	R0104	3.0
B0073	645.6	655.3	9.7	R0104	3.0	R0105	4.2
B0074	655.3	663.3	8.0	R0105	4.2	R0106	2.2
B0075	663.3	672.6	9.3	R0106	2.2	R0107	6.5
B0076	672.6	681.1	8.5	R0107	6.5	R0108	6.0
B0077	681.1	689.5	8.4	R0108	6.0	R0109	4.4
B0078	689.5	698.8	9.3	R0109	4.4	R0110	4.7
B0079	698.8	705.5	6.7	R0110	4.7	R0111	1.4
B0080	705.5	715.1	9.6	R0111	1.4	R0112	1.5
B0081	715.1	723.9	8.8	R0112	1.5	R0113	0.3
B0082	723.9	734.1	10.2	R0113	0.3	R0114	0.5

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0083	734.1	743.6	9.5	R0114	0.5	R0114	10.0
B0084	743.6	752.9	9.3	R0115	0.0	R0116	0.3
B0085	752.9	762.3	9.4	R0116	0.3	R0116	9.7
B0086	762.3	772.3	10.0	R0116	9.7	R0118	0.7
B0087	772.3	781.3	9.0	R0118	0.7	R0118	9.7
B0088	781.3	790.5	9.2	R0118	9.7	R0119	8.4
B0089	790.5	799.3	8.8	R0119	8.4	R0120	6.7
B0090	799.3	807.5	8.2	R0120	6.7	R0121	4.4
B0091	807.5	815.4	7.9	R0121	4.4	R0122	1.8
B0092	815.4	826.5	11.1	R0122	1.8	R0124	0.9
B0093	826.5	836.3	9.8	R0124	0.9	R0125	1.2
B0094	836.3	846.1	9.8	R0125	1.2	R0126	2.5
B0095	846.1	854.1	8.0	R0126	2.5	R0127	0.5
B0096	854.1	863.4	9.3	R0127	0.5	R0127	9.8
B0097	863.4	873.0	9.6	R0127	9.8	R0129	0.9
B0098	873.0	882.1	9.1	R0129	0.9	R0129	10.0
B0099	882.1	891.4	9.3	R0129	10.0	R0130	9.3
B0100	891.4	900.0	8.6	R0130	9.3	R0131	6.9
B0101	900.0	910.3	10.3	R0131	6.9	R0132	6.2
B0102	910.3	920.4	10.1	R0132	6.2	R0133	5.8
B0103	920.4	928.5	8.1	R0133	5.8	R0134	3.4
B0104	928.5	936.5	8.0	R0134	3.4	R0135	1.4
B0105	936.5	948.0	11.5	R0135	1.4	R0136	2.9
B0106	948.0	956.9	8.9	R0136	2.9	R0137	1.8
B0107	956.9	965.8	8.9	R0137	1.8	R0138	0.7
B0108	965.8	975.1	9.3	R0138	0.7	R0138	10.0
B0109	975.1	984.1	9.0	R0139	0.0	R0139	9.0
B0110	984.1	992.1	8.0	R0139	9.0	R0140	7.0
B0111	992.1	1,002.3	10.2	R0140	7.0	R0141	7.2
B0112	1,002.3	1,011.3	9.0	R0141	7.2	R0142	6.2
B0113	1,011.3	1,020.2	8.9	R0142	6.2	R0143	5.1
B0114	1,020.2	1,029.2	9.0	R0143	5.1	R0144	6.1
B0115	1,029.2	1,037.5	8.3	R0144	6.1	R0145	4.4
B0116	1,037.5	1,044.0	6.5	R0145	4.4	R0146	0.9
B0117	1,044.0	1,052.8	8.8	R0146	0.9	R0146	9.7
B0118	1,052.8	1,061.1	8.3	R0146	9.7	R0147	8.0
B0119	1,061.1	1,069.7	8.6	R0147	8.0	R0148	6.6
B0120	1,069.7	1,080.3	10.6	R0148	6.6	R0149	5.7
B0121	1,080.3	1,089.5	9.2	R0149	5.7	R0150	4.4
B0122	1,089.5	1,097.0	7.5	R0150	4.4	R0151	1.9
B0123	1,097.0	1,105.1	8.1	R0151	1.9	R0151	10.0
B0124	1,105.1	1,113.5	8.4	R0152	0.0	R0152	8.4
B0125	1,113.5	1,123.1	9.6	R0152	8.4	R0153	8.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0126	1,123.1	1,133.1	10.0	R0153	8.0	R0154	8.0
B0127	1,133.1	1,143.6	10.5	R0155	0.0	R0155	10.5
B0128	1,143.6	1,153.9	10.3	R0156	0.0	R0157	2.3
B0129	1,153.9	1,164.5	10.6	R0157	2.3	R0158	1.9
B0130	1,164.5	1,173.6	9.1	R0158	1.9	R0159	0.5
B0131	1,173.6	1,183.3	9.7	R0159	0.5	R0160	1.7
B0132	1,183.3	1,192.5	9.2	R0160	1.7	R0162	5.9
B0133	1,192.5	1,209.6	17.1	R0162	5.9	R0164	4.5
B0134	1,209.6	1,218.7	9.1	R0164	4.5	R0165	3.6
B0135	1,218.7	1,227.2	8.5	R0165	3.6	R0166	2.1
B0136	1,227.2	1,236.1	8.9	R0166	2.1	R0167	1.0
B0137	1,236.1	1,244.9	8.8	R0167	1.0	R0167	9.8
B0138	1,244.9	1,253.5	8.6	R0167	9.8	R0168	8.4
B0139	1,253.5	1,261.1	7.6	R0168	8.4	R0169	6.0
B0140	1,261.1	1,269.6	8.5	R0169	6.0	R0170	6.0
B0141	1,269.6	1,280.1	10.5	R0171	0.0	R0172	5.5
B0142	1,280.1	1,288.9	8.8	R0173	0.0	R0173	8.8
B0143	1,288.9	1,298.1	9.2	R0173	8.8	R0174	7.5
B0144	1,298.1	1,307.8	9.7	R0174	7.5	R0175	7.2
B0145	1,307.8	1,320.1	12.3	R0175	7.2	R0176	9.0
B0146	1,320.1	1,329.4	9.3	R0177	0.0	R0177	9.3
B0147	1,329.4	1,338.6	9.2	R0177	9.3	R0178	8.0
B0148	1,338.6	1,348.0	9.4	R0179	0.0	R0179	9.4
B0149	1,348.0	1,358.6	10.6	R0179	9.4	R0180	9.0
B0150	1,358.6	1,368.0	9.4	R0181	0.0	R0181	9.4
B0151	1,368.0	1,381.0	13.0	R0181	9.4	R0184	2.4
B0152	1,381.0	1,390.6	9.6	R0184	2.4	R0185	2.0
B0153	1,390.6	1,400.3	9.7	R0185	2.0	R0186	6.7
B0154	1,400.3	1,410.1	9.8	R0186	6.7	R0187	6.0
B0155	1,410.1	1,419.0	8.9	R0188	0.0	R0188	8.9
B0156	1,419.0	1,429.3	10.3	R0188	8.9	R0189	7.9
B0157	1,429.3	1,441.6	12.3	R0189	7.9	R0190	8.5
B0158	1,441.6	1,451.7	10.1	R0190	8.5	R0192	5.6
B0159	1,451.7	1,460.7	9.0	R0192	5.6	R0193	5.6
B0160	1,460.7	1,472.1	11.4	R0193	5.6	R0195	2.0
B0161	1,472.1	1,484.6	12.5	R0196	0.0	R0199	6.5
B0162	1,484.6	1,493.2	8.6	R0200	0.0	R0200	8.6
B0163	1,493.2	1,502.5	9.3	R0200	8.6	R0201	7.4
B0164	1,502.5	1,509.5	7.0	R0201	7.4	R0202	5.4
B0165	1,509.5	1,519.6	10.1	R0202	5.4	R0203	5.0
B0166	1,519.6	1,527.6	8.0	R0203	5.0	R0204	5.5
B0167	1,527.6	1,537.7	10.1	R0204	5.5	R0205	4.6
B0168	1,537.7	1,546.5	8.8	R0205	4.6	R0206	7.4

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0169	1,546.5	1,559.6	13.1	R0206	7.4	R0207	7.5
B0170	1,559.6	1,569.2	9.6	R0208	0.0	R0208	9.6
B0171	1,569.2	1,579.2	10.0	R0208	9.6	R0209	8.6
B0172	1,579.2	1,588.5	9.3	R0209	8.6	R0210	7.9
B0173	1,588.5	1,597.8	9.3	R0210	7.9	R0211	6.2
B0174	1,597.8	1,608.6	10.8	R0211	6.2	R0212	6.5
B0175	1,608.6	1,618.9	10.3	R0212	6.5	R0213	5.8
B0176	1,618.9	1,628.6	9.7	R0213	5.8	R0214	5.0
B0177	1,628.6	1,636.2	7.6	R0214	5.0	R0215	2.1
B0178	1,636.2	1,644.6	8.4	R0215	2.1	R0215	10.5
B0179	1,644.6	1,653.8	9.2	R0216	0.0	R0216	9.2
B0180	1,653.8	1,663.6	9.8	R0216	9.2	R0217	8.5
B0181	1,663.6	1,673.8	10.2	R0217	8.5	R0218	8.7
B0182	1,673.8	1,682.1	8.3	R0218	8.7	R0219	7.0
B0183	1,682.1	1,692.8	10.7	R0219	7.0	R0222	1.7
B0184	1,692.8	1,704.4	11.6	R0222	1.7	R0223	5.8
B0185	1,704.4	1,714.3	9.9	R0223	5.8	R0224	5.7
B0186	1,714.3	1,727.1	12.8	R0224	5.7	R0227	1.0
B0187	1,727.1	1,738.4	11.3	R0227	1.0	R0228	8.3
B0188	1,738.4	1,747.7	9.3	R0228	8.3	R0229	7.1
B0189	1,747.7	1,756.7	9.0	R0229	7.1	R0230	6.6
B0190	1,756.7	1,765.6	8.9	R0230	6.6	R0231	5.5
B0191	1,765.6	1,774.1	8.5	R0231	5.5	R0232	4.5
B0192	1,774.1	1,783.3	9.2	R0232	4.5	R0233	3.2
B0193	1,783.3	1,790.8	7.5	R0233	3.2	R0234	1.7
B0194	1,790.8	1,799.7	8.9	R0234	1.7	R0235	0.6
B0195	1,799.7	1,809.3	9.6	R0235	0.6	R0236	1.2
B0196	1,809.3	1,818.1	8.8	R0236	1.2	R0236	10.0
B0197	1,818.1	1,828.3	10.2	R0237	0.0	R0238	1.2
B0198	1,828.3	1,837.7	9.4	R0238	1.2	R0239	0.6
B0199	1,837.7	1,849.7	12.0	R0239	0.6	R0240	4.6
B0200	1,849.7	1,862.1	12.4	R0240	4.6	R0242	2.5
B0201	1,862.1	1,870.8	8.7	R0242	2.5	R0243	0.7
B0202	1,870.8	1,879.6	8.8	R0243	0.7	R0244	1.5
B0203	1,879.6	1,890.3	10.7	R0244	1.5	R0246	2.7
B0204	1,890.3	1,901.9	11.6	R0246	2.7	R0248	1.8
B0205	1,901.9	1,915.4	13.5	R0248	1.8	R0253	0.8
B0206	1,915.4	1,928.8	13.4	R0253	0.8	R0255	6.7
B0207	1,928.8	1,938.6	9.8	R0255	6.7	R0257	2.5
B0208	1,938.6	1,949.1	10.5	R0257	2.5	R0258	6.0
B0209	1,949.1	1,956.8	7.7	R0258	6.0	R0260	0.7
B0210	1,956.8	1,965.8	9.0	R0260	0.7	R0261	0.7
B0211	1,965.8	1,974.1	8.3	R0261	0.7	R0262	2.5

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0212	1,974.1	1,984.5	10.4	R0262	2.5	R0263	6.4
B0213	1,984.5	1,994.5	10.0	R0263	6.4	R0264	5.4
B0214	1,994.5	2,004.1	9.6	R0264	5.4	R0265	5.0
B0215	2,004.1	2,014.0	9.9	R0265	5.0	R0267	0.9
B0216	2,014.0	2,023.1	9.1	R0267	0.9	R0267	10.0
B0217	2,023.1	2,032.6	9.5	R0268	0.0	R0268	9.5
B0218	2,032.6	2,042.6	10.0	R0268	9.5	R0271	1.5
B0219	2,042.6	2,050.0	7.4	R0271	1.5	R0272	4.4
B0220	2,050.0	2,060.3	10.3	R0272	4.4	R0273	5.7
B0221	2,060.3	2,071.3	11.0	R0273	5.7	R0275	3.7
B0222	2,071.3	2,080.1	8.8	R0275	3.7	R0276	2.0
B0223	2,080.1	2,089.2	9.1	R0276	2.0	R0277	0.6
B0224	2,089.2	2,098.7	9.5	R0277	0.6	R0277	10.1
B0225	2,098.7	2,107.0	8.3	R0277	10.1	R0278	7.9
B0226	2,107.0	2,115.3	8.3	R0278	7.9	R0279	5.7
B0227	2,115.3	2,124.6	9.3	R0279	5.7	R0280	4.5
B0228	2,124.6	2,133.6	9.0	R0280	4.5	R0281	3.5
B0229	2,133.6	2,143.4	9.8	R0281	3.5	R0282	6.8
B0230	2,143.4	2,151.4	8.0	R0282	6.8	R0283	4.3
B0231	2,151.4	2,160.7	9.3	R0283	4.3	R0284	3.1
B0232	2,160.7	2,169.1	8.4	R0284	3.1	R0285	2.0
B0233	2,169.1	2,177.1	8.0	R0285	2.0	R0286	6.0
B0234	2,177.1	2,188.6	11.5	R0286	6.0	R0289	0.5
B0235	2,188.6	2,199.5	10.9	R0289	0.5	R0290	5.4
B0236	2,199.5	2,207.8	8.3	R0290	5.4	R0291	6.2
B0237	2,207.8	2,219.8	12.0	R0291	6.2	R0294	1.7
B0238	2,219.8	2,229.4	9.6	R0294	1.7	R0295	2.3
B0239	2,229.4	2,238.6	9.2	R0295	2.3	R0296	1.0
B0240	2,238.6	2,248.1	9.5	R0296	1.0	R0296	10.5
B0241	2,248.1	2,257.5	9.4	R0296	10.5	R0297	9.4
B0242	2,257.5	2,266.1	8.6	R0297	9.4	R0298	7.5
B0243	2,266.1	2,274.7	8.6	R0298	7.5	R0299	8.6
B0244	2,274.7	2,284.2	9.5	R0299	8.6	R0300	8.1
B0245	2,284.2	2,293.6	9.4	R0300	8.1	R0301	7.0
B0246	2,293.6	2,303.1	9.5	R0301	7.0	R0302	8.0
B0247	2,303.1	2,313.1	10.0	R0302	8.0	R0303	8.0
B0248	2,313.1	2,321.6	8.5	R0303	8.0	R0305	2.0
B0249	2,321.6	2,330.6	9.0	R0305	2.0	R0306	2.0
B0250	2,330.6	2,339.1	8.5	R0306	2.0	R0306	10.5
B0251	2,339.1	2,347.8	8.7	R0306	10.5	R0307	8.7
B0252	2,347.8	2,356.9	9.1	R0307	8.7	R0309	4.8
B0253	2,356.9	2,365.1	8.2	R0309	4.8	R0310	3.0
B0254	2,365.1	2,371.9	6.8	R0310	3.0	R0311	1.3

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0255	2,371.9	2,381.1	9.2	R0311	1.3	R0311	10.5
B0256	2,381.1	2,390.1	9.0	R0312	0.0	R0313	4.0
B0257	2,390.1	2,398.1	8.0	R0313	4.0	R0314	2.0
B0258	2,398.1	2,408.6	10.5	R0314	2.0	R0315	4.0
B0259	2,408.6	2,417.8	9.2	R0315	4.0	R0317	7.2
B0260	2,417.8	2,427.3	9.5	R0317	7.2	R0318	8.7
B0261	2,427.3	2,436.8	9.5	R0318	8.7	R0319	7.7
B0262	2,436.8	2,445.1	8.3	R0319	7.7	R0320	8.0
B0263	2,445.1	2,453.6	8.5	R0320	8.0	R0321	6.0
B0264	2,453.6	2,462.1	8.5	R0321	6.0	R0322	4.0
B0265	2,462.1	2,470.3	8.2	R0322	4.0	R0325	1.7
B0266	2,470.3	2,485.0	14.7	R0325	1.7	R0327	6.4
B0267	2,485.0	2,494.0	9.0	R0327	6.4	R0328	4.9
B0268	2,494.0	2,502.1	8.1	R0328	4.9	R0329	3.0
B0269	2,502.1	2,509.9	7.8	R0329	3.0	R0330	2.8
B0270	2,509.9	2,520.7	10.8	R0330	2.8	R0331	3.6
B0271	2,520.7	2,528.8	8.1	R0331	3.6	R0332	2.7
B0272	2,528.8	2,535.4	6.6	R0332	2.7	R0333	0.3
B0273	2,535.4	2,544.8	9.4	R0333	0.3	R0333	9.7
B0274	2,544.8	2,553.6	8.8	R0333	9.7	R0334	8.5
B0275	2,553.6	2,562.4	8.8	R0334	8.5	R0335	7.3
B0276	2,562.4	2,571.7	9.3	R0335	7.3	R0336	8.6
B0277	2,571.7	2,581.1	9.4	R0336	8.6	R0337	7.5
B0278	2,581.1	2,589.1	8.0	R0337	7.5	R0338	5.0
B0279	2,589.1	2,596.5	7.4	R0338	5.0	R0339	4.4
B0280	2,596.5	2,604.6	8.1	R0339	4.4	R0340	2.5
B0281	2,604.6	2,613.1	8.5	R0340	2.5	R0341	0.5
B0282	2,613.1	2,621.9	8.8	R0341	0.5	R0341	9.3
B0283	2,621.9	2,631.1	9.2	R0341	9.3	R0342	8.5
B0284	2,631.1	2,640.2	9.1	R0342	8.5	R0344	0.6
B0285	2,640.2	2,649.1	8.9	R0344	0.6	R0344	9.5
B0286	2,649.1	2,657.8	8.7	R0344	9.5	R0345	7.7
B0287	2,657.8	2,665.6	7.8	R0345	7.7	R0346	5.5
B0288	2,665.6	2,674.1	8.5	R0346	5.5	R0347	4.0
B0289	2,674.1	2,682.0	7.9	R0347	4.0	R0348	1.4
B0290	2,682.0	2,690.6	8.6	R0348	1.4	R0350	1.0
B0291	2,690.6	2,699.6	9.0	R0350	1.0	R0350	10.0
B0292	2,699.6	2,709.6	10.0	R0351	0.0	R0351	10.0
B0293	2,709.6	2,719.1	9.5	R0352	0.0	R0352	9.5
B0294	2,719.1	2,727.6	8.5	R0352	9.5	R0353	8.0
B0295	2,727.6	2,735.1	7.5	R0353	8.0	R0354	7.5
B0296	2,735.1	2,743.6	8.5	R0354	7.5	R0355	5.5
B0297	2,743.6	2,751.5	7.9	R0355	5.5	R0356	3.4

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0298	2,751.5	2,759.6	8.1	R0356	3.4	R0357	1.5
B0299	2,759.6	2,768.8	9.2	R0357	1.5	R0358	0.2
B0300	2,768.8	2,778.6	9.8	R0358	0.2	R0358	10.0
B0301	2,778.6	2,786.1	7.5	R0358	10.0	R0359	7.0
B0302	2,786.1	2,794.5	8.4	R0359	7.0	R0360	5.4
B0303	2,794.5	2,803.7	9.2	R0360	5.4	R0361	4.6
B0304	2,803.7	2,812.4	8.7	R0361	4.6	R0362	3.3
B0305	2,812.4	2,821.8	9.4	R0362	3.3	R0363	8.7
B0306	2,821.8	2,829.1	7.3	R0363	8.7	R0364	6.0
B0307	2,829.1	2,842.6	13.5	R0365	0.0	R0367	3.0
B0308	2,842.6	2,855.3	12.7	R0368	0.0	R0372	0.7
B0309	2,855.3	2,866.0	10.7	R0372	0.7	R0373	2.9
B0310	2,866.0	2,876.8	10.8	R0373	2.9	R0375	1.7
B0311	2,876.8	2,887.7	10.9	R0375	1.7	R0376	5.6
B0312	2,887.7	2,898.0	10.3	R0376	5.6	R0377	7.4
B0313	2,898.0	2,906.4	8.4	R0377	7.4	R0378	5.3
B0314	2,906.4	2,913.3	6.9	R0378	5.3	R0379	2.2
B0315	2,913.3	2,921.6	8.3	R0379	2.2	R0379	10.5
B0316	2,921.6	2,931.1	9.5	R0380	0.0	R0380	9.5
B0317	2,931.1	2,940.2	9.1	R0380	9.5	R0381	8.1
B0318	2,940.2	2,948.4	8.2	R0381	8.1	R0382	6.3
B0319	2,948.4	2,956.1	7.7	R0382	6.3	R0383	3.5
B0320	2,956.1	2,968.1	12.0	R0383	3.5	R0384	5.0
B0321	2,968.1	2,978.1	10.0	R0384	5.0	R0385	6.0
B0322	2,978.1	2,987.9	9.8	R0385	6.0	R0386	5.3
B0323	2,987.9	2,997.3	9.4	R0386	5.3	R0388	4.2
B0324	2,997.3	3,008.6	11.3	R0388	4.2	R0390	2.0
B0325	3,008.6	3,023.2	14.6	R0390	2.0	R0392	4.1
B0326	3,023.2	3,033.7	10.5	R0392	4.1	R0393	4.6
B0327	3,033.7	3,042.0	8.3	R0393	4.6	R0394	3.9
B0328	3,042.0	3,049.9	7.9	R0394	3.9	R0395	1.8
B0329	3,049.9	3,058.3	8.4	R0395	1.8	R0395	10.2
B0330	3,058.3	3,066.1	7.8	R0395	10.2	R0396	7.5
B0331	3,066.1	3,075.2	9.1	R0396	7.5	R0397	6.6
B0332	3,075.2	3,084.6	9.4	R0397	6.6	R0398	5.5
B0333	3,084.6	3,092.1	7.5	R0398	5.5	R0399	3.0
B0334	3,092.1	3,101.1	9.0	R0399	3.0	R0400	2.0
B0335	3,101.1	3,110.0	8.9	R0400	2.0	R0401	0.4
B0336	3,110.0	3,118.8	8.8	R0401	0.4	R0401	9.2
B0337	3,118.8	3,127.8	9.0	R0401	9.2	R0402	7.7
B0338	3,127.8	3,137.1	9.3	R0402	7.7	R0403	6.5
B0339	3,137.1	3,145.1	8.0	R0403	6.5	R0404	6.0
B0340	3,145.1	3,155.6	10.5	R0404	6.0	R0406	0.5

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0341	3,155.6	3,165.1	9.5	R0406	0.5	R0406	10.0
B0342	3,165.1	3,174.1	9.0	R0407	0.0	R0407	9.0
B0343	3,174.1	3,182.5	8.4	R0407	9.0	R0408	7.4
B0344	3,182.5	3,191.7	9.2	R0408	7.4	R0409	6.6
B0345	3,191.7	3,200.2	8.5	R0409	6.6	R0410	5.1
B0346	3,200.2	3,209.1	8.9	R0410	5.1	R0411	4.0
B0347	3,209.1	3,217.5	8.4	R0411	4.0	R0412	2.4
B0348	3,217.5	3,226.3	8.8	R0412	2.4	R0413	1.2
B0349	3,226.3	3,235.1	8.8	R0413	1.2	R0413	10.0
B0350	3,235.1	3,244.6	9.5	R0414	0.0	R0414	9.5
B0351	3,244.6	3,252.7	8.1	R0414	9.5	R0415	7.6
B0352	3,252.7	3,259.7	7.0	R0415	7.6	R0417	2.1
B0353	3,259.7	3,268.1	8.4	R0417	2.1	R0417	10.5
B0354	3,268.1	3,277.3	9.2	R0418	0.0	R0418	9.2
B0355	3,277.3	3,287.6	10.3	R0418	9.2	R0419	9.0
B0356	3,287.6	3,296.8	9.2	R0420	0.0	R0420	9.2
B0357	3,296.8	3,308.6	11.8	R0420	9.2	R0422	2.0
B0358	3,308.6	3,317.1	8.5	R0422	2.0	R0422	10.5
B0359	3,317.1	3,325.9	8.8	R0423	0.0	R0424	0.8
B0360	3,325.9	3,335.1	9.2	R0424	0.8	R0424	10.0
B0361	3,335.1	3,344.7	9.6	R0425	0.0	R0425	9.6
B0362	3,344.7	3,353.6	8.9	R0425	9.6	R0426	8.5
B0363	3,353.6	3,363.5	9.9	R0426	8.5	R0427	8.4
B0364	3,363.5	3,372.5	9.0	R0427	8.4	R0428	7.4
B0365	3,372.5	3,380.9	8.4	R0428	7.4	R0429	5.8
B0366	3,380.9	3,388.9	8.0	R0429	5.8	R0430	3.8
B0367	3,388.9	3,398.0	9.1	R0430	3.8	R0431	2.9
B0368	3,398.0	3,406.1	8.1	R0431	2.9	R0432	1.0
B0369	3,406.1	3,415.6	9.5	R0432	1.0	R0433	5.5
B0370	3,415.6	3,424.6	9.0	R0433	5.5	R0434	4.5
B0371	3,424.6	3,433.4	8.8	R0434	4.5	R0435	3.3
B0372	3,433.4	3,442.5	9.1	R0435	3.3	R0436	1.9
B0373	3,442.5	3,451.6	9.1	R0436	1.9	R0437	0.5
B0374	3,451.6	3,461.1	9.5	R0437	0.5	R0438	7.0
B0375	3,461.1	3,471.6	10.5	R0438	7.0	R0440	4.5
B0376	3,471.6	3,480.6	9.0	R0441	0.0	R0441	9.0
B0377	3,480.6	3,489.3	8.7	R0441	9.0	R0442	7.2
B0378	3,489.3	3,497.3	8.0	R0442	7.2	R0443	5.2
B0379	3,497.3	3,504.1	6.8	R0443	5.2	R0444	4.0
B0380	3,504.1	3,512.1	8.0	R0444	4.0	R0445	2.0
B0381	3,512.1	3,520.1	8.0	R0445	2.0	R0445	10.0
B0382	3,520.1	3,527.8	7.7	R0445	10.0	R0446	7.7
B0383	3,527.8	3,537.4	9.6	R0446	7.7	R0447	6.3

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0384	3,537.4	3,546.2	8.8	R0447	6.3	R0448	5.1
B0385	3,546.2	3,554.6	8.4	R0448	5.1	R0450	3.5
B0386	3,554.6	3,563.4	8.8	R0450	3.5	R0451	1.8
B0387	3,563.4	3,571.5	8.1	R0451	1.8	R0452	0.4
B0388	3,571.5	3,579.7	8.2	R0452	0.4	R0452	8.6
B0389	3,579.7	3,587.7	8.0	R0452	8.6	R0453	6.1
B0390	3,587.7	3,594.6	6.9	R0453	6.1	R0454	4.5
B0391	3,594.6	3,603.9	9.3	R0455	0.0	R0455	9.3
B0392	3,603.9	3,612.5	8.6	R0455	9.3	R0456	7.4
B0393	3,612.5	3,629.0	16.5	R0456	7.4	R0459	0.9
B0394	3,629.0	3,637.9	8.9	R0459	0.9	R0462	2.8
B0395	3,637.9	3,649.5	11.6	R0462	2.8	R0466	3.4
B0396	3,649.5	3,669.1	19.6	R0466	3.4	R0469	4.0
B0397	3,669.1	3,677.1	8.0	R0470	0.0	R0471	4.0
B0398	3,677.1	3,699.5	22.4	R0471	4.0	R0476	1.4
B0399	3,699.5	3,717.1	17.6	R0476	1.4	R0481	4.0
B0400	3,717.1	4,012.7	295.6	R0482	0.0	R0486	0.6
B0401	4,012.7	4,027.3	14.6	R0486	0.6	R0489	1.7
B0402	4,027.3	4,048.1	20.8	R0489	1.7	R0493	5.0
B0403	4,048.1	4,062.0	13.9	R0494	0.0	R0497	2.9
B0404	4,062.0	4,141.2	79.2	R0497	2.9	R0501	6.1
B0405	4,141.2	4,151.9	10.7	R0501	6.1	R0502	6.8
B0406	4,151.9	4,161.3	9.4	R0502	6.8	R0503	6.2
B0407	4,161.3	4,171.1	9.8	R0503	6.2	R0504	6.0
B0408	4,171.1	4,182.8	11.7	R0504	6.0	R0505	7.7
B0409	4,182.8	4,189.6	6.8	R0505	7.7	R0506	6.5
B0410	4,189.6	4,198.8	9.2	R0506	6.5	R0507	5.7
B0411	4,198.8	4,208.1	9.3	R0507	5.7	R0508	5.0
B0412	4,208.1	4,217.0	8.9	R0508	5.0	R0509	3.4
B0413	4,217.0	4,225.5	8.5	R0509	3.4	R0510	1.4
B0414	4,225.5	4,234.1	8.6	R0510	1.4	R0511	2.0
B0415	4,234.1	4,242.1	8.0	R0511	2.0	R0511	10.0
B0416	4,242.1	4,251.3	9.2	R0512	0.0	R0512	9.2
B0417	4,251.3	4,259.7	8.4	R0512	9.2	R0513	7.6
B0418	4,259.7	4,268.3	8.6	R0513	7.6	R0514	6.2
B0419	4,268.3	4,276.2	7.9	R0514	6.2	R0515	4.1
B0420	4,276.2	4,284.3	8.1	R0515	4.1	R0516	2.2
B0421	4,284.3	4,293.3	9.0	R0516	2.2	R0517	1.2
B0422	4,293.3	4,302.1	8.8	R0517	1.2	R0517	10.0
B0423	4,302.1	4,311.1	9.0	R0518	0.0	R0518	9.0
B0424	4,311.1	4,319.7	8.6	R0518	9.0	R0519	7.6
B0425	4,319.7	4,329.3	9.6	R0519	7.6	R0520	6.7
B0426	4,329.3	4,338.1	8.8	R0520	6.7	R0521	5.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0427	4,338.1	4,346.0	7.9	R0521	5.0	R0522	2.9
B0428	4,346.0	4,354.7	8.7	R0522	2.9	R0523	1.6
B0429	4,354.7	4,363.1	8.4	R0523	1.6	R0523	10.0
B0430	4,363.1	4,371.5	8.4	R0523	10.0	R0525	0.4
B0431	4,371.5	4,380.7	9.2	R0525	0.4	R0525	9.6
B0432	4,380.7	4,389.4	8.7	R0525	9.6	R0526	8.3
B0433	4,389.4	4,397.9	8.5	R0526	8.3	R0527	6.8
B0434	4,397.9	4,405.1	7.2	R0527	6.8	R0528	4.0
B0435	4,405.1	4,412.9	7.8	R0528	4.0	R0529	1.8
B0436	4,412.9	4,421.6	8.7	R0529	1.8	R0529	10.5
B0437	4,421.6	4,430.4	8.8	R0530	0.0	R0530	8.8
B0438	4,430.4	4,439.0	8.6	R0530	8.8	R0531	6.9
B0439	4,439.0	4,447.8	8.8	R0531	6.9	R0532	5.7
B0440	4,447.8	4,455.9	8.1	R0532	5.7	R0533	3.8
B0441	4,455.9	4,464.5	8.6	R0533	3.8	R0534	3.4
B0442	4,464.5	4,471.6	7.1	R0534	3.4	R0534	10.5
B0443	4,471.6	4,480.2	8.6	R0535	0.0	R0535	8.6
B0444	4,480.2	4,494.0	13.8	R0535	8.6	R0537	1.9
B0445	4,494.0	4,516.8	22.8	R0537	1.9	R0539	4.2
B0446	4,516.8	4,523.2	6.4	R0539	4.2	R0540	5.1
B0447	4,523.2	4,532.0	8.8	R0540	5.1	R0541	3.9
B0448	4,532.0	4,540.6	8.6	R0541	3.9	R0542	2.5
B0449	4,540.6	4,549.9	9.3	R0542	2.5	R0543	1.3
B0450	4,549.9	4,559.1	9.2	R0543	1.3	R0543	10.5
B0451	4,559.1	4,567.6	8.5	R0543	10.5	R0545	0.5
B0452	4,567.6	4,577.1	9.5	R0545	0.5	R0545	10.0
B0453	4,577.1	4,586.2	9.1	R0546	0.0	R0546	9.1
B0454	4,586.2	4,593.9	7.7	R0546	9.1	R0547	6.8
B0455	4,593.9	4,602.8	8.9	R0547	6.8	R0548	5.2
B0456	4,602.8	4,611.1	8.3	R0548	5.2	R0549	3.0
B0457	4,611.1	4,618.1	7.0	R0549	3.0	R0551	2.0
B0458	4,618.1	4,627.1	9.0	R0551	2.0	R0552	7.5
B0459	4,627.1	4,633.7	6.6	R0552	7.5	R0553	4.1
B0460	4,633.7	4,641.0	7.3	R0553	4.1	R0554	0.9
B0461	4,641.0	4,650.1	9.1	R0554	0.9	R0554	10.0
B0462	4,650.1	4,659.7	9.6	R0555	0.0	R0555	9.6
B0463	4,659.7	4,668.5	8.8	R0555	9.6	R0556	8.4
B0464	4,668.5	4,677.7	9.2	R0556	8.4	R0557	7.6
B0465	4,677.7	4,686.6	8.9	R0557	7.6	R0558	6.5
B0466	4,686.6	4,696.2	9.6	R0558	6.5	R0559	5.6
B0467	4,696.2	4,705.2	9.0	R0559	5.6	R0560	4.6
B0468	4,705.2	4,714.3	9.1	R0560	4.6	R0561	3.2
B0469	4,714.3	4,723.0	8.7	R0561	3.2	R0562	1.9

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0470	4,723.0	4,731.7	8.7	R0562	1.9	R0563	4.6
B0471	4,731.7	4,740.8	9.1	R0563	4.6	R0564	3.7
B0472	4,740.8	4,749.7	8.9	R0564	3.7	R0565	2.6
B0473	4,749.7	4,759.5	9.8	R0565	2.6	R0566	4.4
B0474	4,759.5	4,768.9	9.4	R0566	4.4	R0567	3.8
B0475	4,768.9	4,777.9	9.0	R0567	3.8	R0568	2.8
B0476	4,777.9	4,787.1	9.2	R0568	2.8	R0569	2.0
B0477	4,787.1	4,796.3	9.2	R0569	2.0	R0570	1.2
B0478	4,796.3	4,805.6	9.3	R0570	1.2	R0571	0.5
B0479	4,805.6	4,815.1	9.5	R0571	0.5	R0571	10.0
B0480	4,815.1	4,824.5	9.4	R0572	0.0	R0572	9.4
B0481	4,824.5	4,833.5	9.0	R0572	9.4	R0573	8.4
B0482	4,833.5	4,842.4	8.9	R0573	8.4	R0574	7.3
B0483	4,842.4	4,849.3	6.9	R0574	7.3	R0575	4.2
B0484	4,849.3	4,856.1	6.8	R0575	4.2	R0576	1.0
B0485	4,856.1	4,864.6	8.5	R0576	1.0	R0577	5.0
B0486	4,864.6	4,872.3	7.7	R0577	5.0	R0578	6.2
B0487	4,872.3	4,879.6	7.3	R0578	6.2	R0579	3.5
B0488	4,879.6	4,887.6	8.0	R0579	3.5	R0580	4.5
B0489	4,887.6	4,894.0	6.4	R0580	4.5	R0581	1.4
B0490	4,894.0	4,902.3	8.3	R0581	1.4	R0581	9.7
B0491	4,902.3	4,910.3	8.0	R0581	9.7	R0582	7.7
B0492	4,910.3	4,918.5	8.2	R0582	7.7	R0584	2.4
B0493	4,918.5	4,926.7	8.2	R0584	2.4	R0585	1.1
B0494	4,926.7	4,935.6	8.9	R0585	1.1	R0585	10.0
B0495	4,935.6	4,945.9	10.3	R0585	10.0	R0587	1.8
B0496	4,945.9	4,954.3	8.4	R0587	1.8	R0589	4.2
B0497	4,954.3	4,962.1	7.8	R0589	4.2	R0591	2.0
B0498	4,962.1	4,971.1	9.0	R0591	2.0	R0592	3.0
B0499	4,971.1	4,979.1	8.0	R0592	3.0	R0593	3.0
B0500	4,979.1	4,987.3	8.2	R0593	3.0	R0594	5.7
B0501	4,987.3	4,995.4	8.1	R0594	5.7	R0595	3.3
B0502	4,995.4	5,002.1	6.7	R0595	3.3	R0595	10.0
B0503	5,002.1	5,010.2	8.1	R0596	0.0	R0596	8.1
B0504	5,010.2	5,017.4	7.2	R0596	8.1	R0597	5.3
B0505	5,017.4	5,027.6	10.2	R0597	5.3	R0598	8.0
B0506	5,027.6	5,034.6	7.0	R0598	8.0	R0599	4.5
B0507	5,034.6	5,043.2	8.6	R0599	4.5	R0600	2.6
B0508	5,043.2	5,051.1	7.9	R0600	2.6	R0600	10.5
B0509	5,051.1	5,059.1	8.0	R0601	0.0	R0601	8.0
B0510	5,059.1	5,066.7	7.6	R0601	8.0	R0602	7.6
B0511	5,066.7	5,074.5	7.8	R0602	7.6	R0603	5.4
B0512	5,074.5	5,081.1	6.6	R0603	5.4	R0604	2.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0513	5,081.1	5,095.1	14.0	R0604	2.0	R0607	4.0
B0514	5,095.1	5,115.6	20.5	R0607	4.0	R0612	2.0
B0515	5,115.6	5,123.4	7.8	R0612	2.0	R0613	2.8
B0516	5,123.4	5,135.1	11.7	R0613	2.8	R0616	2.0
B0517	5,135.1	5,142.6	7.5	R0617	0.0	R0618	4.0
B0518	5,142.6	5,150.8	8.2	R0618	4.0	R0619	1.7
B0519	5,150.8	5,160.5	9.7	R0619	1.7	R0620	1.4
B0520	5,160.5	5,169.1	8.6	R0620	1.4	R0620	10.0
B0521	5,169.1	5,178.1	9.0	R0621	0.0	R0621	9.0
B0522	5,178.1	5,185.7	7.6	R0621	9.0	R0622	6.6
B0523	5,185.7	5,193.5	7.8	R0622	6.6	R0623	4.4
B0524	5,193.5	5,201.3	7.8	R0623	4.4	R0624	2.2
B0525	5,201.3	5,210.7	9.4	R0624	2.2	R0625	1.1
B0526	5,210.7	5,219.3	8.6	R0625	1.1	R0625	9.7
B0527	5,219.3	5,226.5	7.2	R0625	9.7	R0626	6.4
B0528	5,226.5	5,234.7	8.2	R0626	6.4	R0627	4.6
B0529	5,234.7	5,243.1	8.4	R0627	4.6	R0628	5.0
B0530	5,243.1	5,251.0	7.9	R0628	5.0	R0629	2.9
B0531	5,251.0	5,259.1	8.1	R0629	2.9	R0630	1.0
B0532	5,259.1	5,267.6	8.5	R0630	1.0	R0630	9.5
B0533	5,267.6	5,275.0	7.4	R0630	9.5	R0631	6.9
B0534	5,275.0	5,282.7	7.7	R0631	6.9	R0632	4.6
B0535	5,282.7	5,291.9	9.2	R0632	4.6	R0633	3.8
B0536	5,291.9	5,299.9	8.0	R0633	3.8	R0634	1.8
B0537	5,299.9	5,308.1	8.2	R0634	1.8	R0634	10.0
B0538	5,308.1	5,317.1	9.0	R0635	0.0	R0635	9.0
B0539	5,317.1	5,325.4	8.3	R0635	9.0	R0636	7.3
B0540	5,325.4	5,333.1	7.7	R0636	7.3	R0637	7.0
B0541	5,333.1	5,339.7	6.6	R0637	7.0	R0638	3.6
B0542	5,339.7	5,347.1	7.4	R0638	3.6	R0639	1.0
B0543	5,347.1	5,356.1	9.0	R0639	1.0	R0639	10.0
B0544	5,356.1	5,363.8	7.7	R0639	10.0	R0640	7.7
B0545	5,363.8	5,371.5	7.7	R0640	7.7	R0641	5.4
B0546	5,371.5	5,379.2	7.7	R0641	5.4	R0642	3.1
B0547	5,379.2	5,387.1	7.9	R0642	3.1	R0643	1.0
B0548	5,387.1	5,395.1	8.0	R0643	1.0	R0643	9.0
B0549	5,395.1	5,402.5	7.4	R0643	9.0	R0644	6.4
B0550	5,402.5	5,409.6	7.1	R0644	6.4	R0645	3.5
B0551	5,409.6	5,418.2	8.6	R0645	3.5	R0646	4.1
B0552	5,418.2	5,427.5	9.3	R0646	4.1	R0647	3.4
B0553	5,427.5	5,434.8	7.3	R0647	3.4	R0648	0.7
B0554	5,434.8	5,443.9	9.1	R0648	0.7	R0648	9.8
B0555	5,443.9	5,452.1	8.2	R0648	9.8	R0649	8.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0556	5,452.1	5,460.0	7.9	R0649	8.0	R0650	7.9
B0557	5,460.0	5,467.6	7.6	R0650	7.9	R0651	5.5
B0558	5,467.6	5,475.8	8.2	R0651	5.5	R0652	3.7
B0559	5,475.8	5,484.3	8.5	R0652	3.7	R0653	2.2
B0560	5,484.3	5,493.2	8.9	R0653	2.2	R0654	1.1
B0561	5,493.2	5,502.1	8.9	R0654	1.1	R0654	10.0
B0562	5,502.1	5,511.5	9.4	R0655	0.0	R0656	1.4
B0563	5,511.5	5,520.9	9.4	R0656	1.4	R0657	0.8
B0564	5,520.9	5,529.4	8.5	R0657	0.8	R0657	9.3
B0565	5,529.4	5,538.1	8.7	R0657	9.3	R0658	8.0
B0566	5,538.1	5,546.2	8.1	R0658	8.0	R0659	6.1
B0567	5,546.2	5,554.9	8.7	R0659	6.1	R0660	4.8
B0568	5,554.9	5,563.9	9.0	R0660	4.8	R0661	3.8
B0569	5,563.9	5,581.4	17.5	R0661	3.8	R0663	3.3
B0570	5,581.4	5,591.1	9.7	R0663	3.3	R0664	2.0
B0571	5,591.1	5,600.0	8.9	R0664	2.0	R0665	0.9
B0572	5,600.0	5,609.1	9.1	R0665	0.9	R0665	10.0
B0573	5,609.1	5,618.5	9.4	R0666	0.0	R0667	1.4
B0574	5,618.5	5,627.7	9.2	R0667	1.4	R0668	0.6
B0575	5,627.7	5,637.1	9.4	R0668	0.6	R0668	10.0
B0576	5,637.1	5,646.4	9.3	R0669	0.0	R0669	9.3
B0577	5,646.4	5,654.7	8.3	R0669	9.3	R0670	7.6
B0578	5,654.7	5,663.8	9.1	R0670	7.6	R0671	6.2
B0579	5,663.8	5,672.5	8.7	R0671	6.2	R0672	4.9
B0580	5,672.5	5,681.4	8.9	R0672	4.9	R0673	3.3
B0581	5,681.4	5,690.7	9.3	R0673	3.3	R0674	2.6
B0582	5,690.7	5,699.7	9.0	R0674	2.6	R0675	1.6
B0583	5,699.7	5,708.1	8.4	R0675	1.6	R0675	10.0
B0584	5,708.1	5,716.4	8.3	R0675	10.0	R0676	8.3
B0585	5,716.4	5,725.1	8.7	R0676	8.3	R0677	7.0
B0586	5,725.1	5,733.9	8.8	R0677	7.0	R0678	7.8
B0587	5,733.9	5,743.4	9.5	R0678	7.8	R0679	6.8
B0588	5,743.4	5,752.9	9.5	R0679	6.8	R0680	5.8
B0589	5,752.9	5,761.8	8.9	R0680	5.8	R0681	4.7
B0590	5,761.8	5,770.8	9.0	R0681	4.7	R0682	3.7
B0591	5,770.8	5,779.7	8.9	R0682	3.7	R0683	2.1
B0592	5,779.7	5,788.5	8.8	R0683	2.1	R0684	1.4
B0593	5,788.5	5,797.1	8.6	R0684	1.4	R0684	10.0
B0594	5,797.1	5,806.0	8.9	R0684	10.0	R0685	8.9
B0595	5,806.0	5,815.1	9.1	R0685	8.9	R0686	8.0
B0596	5,815.1	5,824.0	8.9	R0686	8.0	R0687	6.9
B0597	5,824.0	5,833.7	9.7	R0687	6.9	R0688	6.1
B0598	5,833.7	5,843.3	9.6	R0688	6.1	R0689	7.2

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0599	5,843.3	5,852.2	8.9	R0689	7.2	R0690	6.1
B0600	5,852.2	5,860.1	7.9	R0690	6.1	R0691	4.0
B0601	5,860.1	5,868.8	8.7	R0691	4.0	R0692	2.7
B0602	5,868.8	5,875.1	6.3	R0692	2.7	R0693	3.0
B0603	5,875.1	5,883.1	8.0	R0693	3.0	R0694	5.0
B0604	5,883.1	5,890.0	6.9	R0694	5.0	R0696	1.4
B0605	5,890.0	5,898.8	8.8	R0696	1.4	R0697	0.7
B0606	5,898.8	5,908.1	9.3	R0697	0.7	R0697	10.0
B0607	5,908.1	5,917.0	8.9	R0697	10.0	R0698	8.9
B0608	5,917.0	5,926.3	9.3	R0698	8.9	R0699	7.7
B0609	5,926.3	5,936.2	9.9	R0699	7.7	R0700	7.1
B0610	5,936.2	5,945.0	8.8	R0700	7.1	R0701	5.9
B0611	5,945.0	5,954.0	9.0	R0701	5.9	R0702	4.9
B0612	5,954.0	5,962.7	8.7	R0702	4.9	R0703	3.6
B0613	5,962.7	5,971.6	8.9	R0703	3.6	R0704	2.5
B0614	5,971.6	5,989.0	17.4	R0704	2.5	R0705	8.9
B0615	5,989.0	5,998.6	9.6	R0705	8.9	R0705	18.5
B0616	5,998.6	6,007.3	8.7	R0705	18.5	R0706	5.7
B0617	6,007.3	6,016.8	9.5	R0706	5.7	R0706	15.2
B0618	6,016.8	6,025.1	8.3	R0706	15.2	R0707	7.0
B0619	6,025.1	6,034.8	9.7	R0707	7.0	R0707	16.7
B0620	6,034.8	6,044.1	9.3	R0707	16.7	R0708	4.5
B0621	6,044.1	6,053.4	9.3	R0708	4.5	R0708	13.8
B0622	6,053.4	6,062.1	8.7	R0708	13.8	R0709	1.0
B0623	6,062.1	6,071.2	9.1	R0709	1.0	R0709	10.1
B0624	6,071.2	6,080.5	9.3	R0709	10.1	R0709	19.4
B0625	6,080.5	6,089.9	9.4	R0709	19.4	R0710	7.3
B0626	6,089.9	6,099.3	9.4	R0710	7.3	R0710	16.7
B0627	6,099.3	6,108.4	9.1	R0710	16.7	R0711	4.3
B0628	6,108.4	6,118.1	9.7	R0711	4.3	R0711	14.0
B0629	6,118.1	6,126.8	8.7	R0711	14.0	R0712	3.2
B0630	6,126.8	6,136.4	9.6	R0712	3.2	R0712	12.8
B0631	6,136.4	6,145.7	9.3	R0712	12.8	R0713	0.6
B0632	6,145.7	6,155.2	9.5	R0713	0.6	R0713	10.1
B0633	6,155.2	6,164.6	9.4	R0713	10.1	R0713	19.5
B0634	6,164.6	6,173.8	9.2	R0713	19.5	R0714	7.2
B0635	6,173.8	6,182.8	9.0	R0714	7.2	R0714	16.2
B0636	6,182.8	6,190.6	7.8	R0714	16.2	R0715	5.0
B0637	6,190.6	6,199.9	9.3	R0715	5.0	R0715	14.3
B0638	6,199.9	6,207.5	7.6	R0715	14.3	R0716	6.9
B0639	6,207.5	6,217.1	9.6	R0716	6.9	R0716	16.5
B0640	6,217.1	6,226.8	9.7	R0716	16.5	R0717	6.7
B0641	6,226.8	6,236.0	9.2	R0717	6.7	R0717	15.9

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0642	6,236.0	6,245.3	9.3	R0717	15.9	R0718	3.7
B0643	6,245.3	6,254.7	9.4	R0718	3.7	R0718	13.1
B0644	6,254.7	6,264.5	9.8	R0718	13.1	R0719	1.4
B0645	6,264.5	6,274.2	9.7	R0719	1.4	R0719	11.1
B0646	6,274.2	6,283.4	9.2	R0719	11.1	R0719	20.3
B0647	6,283.4	6,291.4	8.0	R0719	20.3	R0720	6.8
B0648	6,291.4	6,300.8	9.4	R0720	6.8	R0720	16.2
B0649	6,300.8	6,309.6	8.8	R0720	16.2	R0721	4.0
B0650	6,309.6	6,318.8	9.2	R0722	0.0	R0722	9.2
B0651	6,318.8	6,328.7	9.9	R0722	9.2	R0722	19.1
B0652	6,328.7	6,337.8	9.1	R0722	19.1	R0723	8.7
B0653	6,337.8	6,347.4	9.6	R0723	8.7	R0723	18.3
B0654	6,347.4	6,356.0	8.6	R0723	18.3	R0724	5.9
B0655	6,356.0	6,365.7	9.7	R0724	5.9	R0724	15.6
B0656	6,365.7	6,374.3	8.6	R0724	15.6	R0725	3.2
B0657	6,374.3	6,383.8	9.5	R0725	3.2	R0725	12.7
B0658	6,383.8	6,392.6	8.8	R0725	12.7	R0725	21.5
B0659	6,392.6	6,402.2	9.6	R0726	0.0	R0726	9.6
B0660	6,402.2	6,412.1	9.9	R0726	9.6	R0726	19.5
B0661	6,412.1	6,421.3	9.2	R0726	19.5	R0727	7.2
B0662	6,421.3	6,431.0	9.7	R0727	7.2	R0727	16.9
B0663	6,431.0	6,440.0	9.0	R0727	16.9	R0728	4.4
B0664	6,440.0	6,449.7	9.7	R0728	4.4	R0728	14.1
B0665	6,449.7	6,458.5	8.8	R0728	14.1	R0729	3.4
B0666	6,458.5	6,468.3	9.8	R0729	3.4	R0729	13.2
B0667	6,468.3	6,475.9	7.6	R0729	13.2	R0732	2.8
B0668	6,475.9	6,485.8	9.9	R0732	2.8	R0732	12.7
B0669	6,485.8	6,495.0	9.2	R0732	12.7	R0733	0.9
B0670	6,495.0	6,504.7	9.7	R0733	0.9	R0733	10.6
B0671	6,504.7	6,514.2	9.5	R0733	10.6	R0733	20.1
B0672	6,514.2	6,522.6	8.4	R0733	20.1	R0734	7.0
B0673	6,522.6	6,530.7	8.1	R0734	7.0	R0735	5.1
B0674	6,530.7	6,539.3	8.6	R0735	5.1	R0736	2.7
B0675	6,539.3	6,548.6	9.3	R0736	2.7	R0737	5.0
B0676	6,548.6	6,557.1	8.5	R0737	5.0	R0738	7.0
B0677	6,557.1	6,563.1	6.0	R0738	7.0	R0739	6.0
B0678	6,563.1	6,571.6	8.5	R0740	0.0	R0740	8.5
B0679	6,571.6	6,580.6	9.0	R0740	8.5	R0740	17.5
B0680	6,580.6	6,588.1	7.5	R0740	17.5	R0741	4.0
B0681	6,588.1	6,596.7	8.6	R0741	4.0	R0741	12.6
B0682	6,596.7	6,605.6	8.9	R0741	12.6	R0741	21.5
B0683	6,605.6	6,613.3	7.7	R0741	21.5	R0742	7.7
B0684	6,613.3	6,621.7	8.4	R0742	7.7	R0743	7.1

	depth (ft bsl)						
box	top	bottom	interval	top run	depth	bottom run	depth
B0685	6,621.7	6,631.2	9.5	R0743	7.1	R0743	16.6
B0686	6,631.2	6,639.7	8.5	R0743	16.6	R0744	3.6
B0687	6,639.7	6,649.4	9.7	R0744	3.6	R0744	13.3
B0688	6,649.4	6,658.4	9.0	R0744	13.3	R0745	0.8
B0689	6,658.4	6,668.1	9.7	R0745	0.8	R0745	10.5
B0690	6,668.1	6,677.5	9.4	R0745	10.5	R0745	19.9
B0691	6,677.5	6,685.9	8.4	R0745	19.9	R0746	7.3
B0692	6,685.9	6,695.0	9.1	R0746	7.3	R0746	16.4
B0693	6,695.0	6,703.5	8.5	R0746	16.4	R0747	5.9
B0694	6,703.5	6,712.6	9.1	R0747	5.9	R0747	15.0
B0695	6,712.6	6,718.4	5.8	R0747	15.0	R0748	2.3
B0696	6,718.4	6,728.1	9.7	R0748	2.3	R0748	12.0
B0697	6,728.1	6,737.0	8.9	R0748	12.0	R0748	20.9
B0698	6,737.0	6,743.9	6.9	R0748	20.9	R0749	6.3
B0699	6,743.9	6,754.9	11.0	R0749	6.3	R0750	1.8
B0700	6,754.9	6,763.4	8.5	R0750	1.8	R0750	10.3
B0701	6,763.4	6,772.2	8.8	R0750	10.3	R0750	19.1
B0702	6,772.2	6,779.1	6.9	R0750	19.1	R0751	4.5
B0703	6,779.1	6,788.4	9.3	R0751	4.5	R0751	13.8
B0704	6,788.4	6,798.2	9.8	R0751	13.8	R0752	4.1
B0705	6,798.2	6,807.1	8.9	R0752	4.1	R0752	13.0
B0706	6,807.1	6,816.1	9.0	R0752	13.0	R0752	22.0
B0707	6,816.1	6,824.4	8.3	R0752	22.0	R0753	8.3
B0708	6,824.4	6,833.7	9.3	R0753	8.3	R0753	17.6
B0709	6,833.7	6,842.0	8.3	R0753	17.6	R0754	4.4
B0710	6,842.0	6,851.5	9.5	R0754	4.4	R0754	13.9
B0711	6,851.5	6,860.3	8.8	R0754	13.9	R0755	1.2
B0712	6,860.3	6,869.5	9.2	R0755	1.2	R0755	10.4
B0713	6,869.5	6,878.9	9.4	R0755	10.4	R0756	8.8
B0714	6,878.9	6,887.3	8.4	R0756	8.8	R0757	2.2
B0715	6,887.3	6,896.7	9.4	R0757	2.2	R0757	11.6
B0716	6,896.7	6,905.8	9.1	R0757	11.6	R0757	20.7
B0717	6,905.8	6,913.6	7.8	R0757	20.7	R0758	7.0
B0718	6,913.6	6,921.1	7.5	R0758	7.0	R0758	14.5
B0719	6,921.1	6,929.5	8.4	R0759	0.0	R0759	8.4
B0720	6,929.5	6,939.0	9.5	R0759	8.4	R0759	17.9
B0721	6,939.0	6,946.5	7.5	R0759	17.9	R0760	5.9
B0722	6,946.5	6,954.6	8.1	R0760	5.9	R0761	1.0
B0723	6,954.6	6,964.7	10.1	R0761	1.0	R0762	3.6
B0724	6,964.7	6,974.6	9.9	R0762	3.6	R0762	13.5
B0725	6,974.6	6,982.8	8.2	R0762	13.5	R0763	4.7
B0726	6,982.8	6,991.6	8.8	R0763	4.7	R0763	13.5
B0727	6,991.6	7,000.8	9.2	R0763	13.5	R0764	5.2

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0728	7,000.8	7,010.3	9.5	R0764	5.2	R0764	14.7
B0729	7,010.3	7,020.4	10.1	R0764	14.7	R0765	8.3
B0730	7,020.4	7,030.0	9.6	R0765	8.3	R0765	17.9
B0731	7,030.0	7,038.1	8.1	R0765	17.9	R0766	5.5
B0732	7,038.1	7,047.1	9.0	R0766	5.5	R0767	3.5
B0733	7,047.1	7,056.7	9.6	R0767	3.5	R0767	13.1
B0734	7,056.7	7,066.3	9.6	R0767	13.1	R0768	1.2
B0735	7,066.3	7,075.9	9.6	R0768	1.2	R0768	10.8
B0736	7,075.9	7,085.4	9.5	R0768	10.8	R0768	20.3
B0737	7,085.4	7,094.6	9.2	R0768	20.3	R0769	8.0
B0738	7,094.6	7,103.8	9.2	R0769	8.0	R0769	17.2
B0739	7,103.8	7,112.8	9.0	R0769	17.2	R0770	4.7
B0740	7,112.8	7,122.1	9.3	R0770	4.7	R0770	14.0
B0741	7,122.1	7,131.4	9.3	R0770	14.0	R0771	1.8
B0742	7,131.4	7,140.5	9.1	R0771	1.8	R0771	10.9
B0743	7,140.5	7,150.0	9.5	R0771	10.9	R0771	20.4
B0744	7,150.0	7,159.1	9.1	R0771	20.4	R0772	8.0
B0745	7,159.1	7,168.5	9.4	R0772	8.0	R0772	17.4
B0746	7,168.5	7,177.0	8.5	R0772	17.4	R0773	4.9
B0747	7,177.0	7,186.6	9.6	R0773	4.9	R0773	14.5
B0748	7,186.6	7,196.2	9.6	R0774	0.0	R0774	9.6
B0749	7,196.2	7,206.1	9.9	R0774	9.6	R0774	19.5
B0750	7,206.1	7,215.4	9.3	R0774	19.5	R0775	7.3
B0751	7,215.4	7,224.9	9.5	R0775	7.3	R0775	16.8
B0752	7,224.9	7,234.4	9.5	R0775	16.8	R0776	4.8
B0753	7,234.4	7,244.2	9.8	R0776	4.8	R0776	14.6
B0754	7,244.2	7,253.6	9.4	R0776	14.6	R0777	2.5
B0755	7,253.6	7,263.3	9.7	R0777	2.5	R0777	12.2
B0756	7,263.3	7,272.6	9.3	R0777	12.2	R0777	21.5
B0757	7,272.6	7,282.3	9.7	R0778	0.0	R0778	9.7
B0758	7,282.3	7,291.5	9.2	R0778	9.7	R0778	18.9
B0759	7,291.5	7,300.7	9.2	R0778	18.9	R0779	6.6
B0760	7,300.7	7,310.3	9.6	R0779	6.6	R0779	16.2
B0761	7,310.3	7,319.8	9.5	R0779	16.2	R0780	4.2
B0762	7,319.8	7,329.6	9.8	R0780	4.2	R0780	14.0
B0763	7,329.6	7,338.4	8.8	R0780	14.0	R0781	1.8
B0764	7,338.4	7,348.1	9.7	R0781	1.8	R0781	11.5
B0765	7,348.1	7,358.1	10.0	R0781	11.5	R0781	21.5
B0766	7,358.1	7,367.1	9.0	R0781	21.5	R0783	1.0
B0767	7,367.1	7,376.3	9.2	R0783	1.0	R0783	10.2
B0768	7,376.3	7,385.6	9.3	R0783	10.2	R0784	0.5
B0769	7,385.6	7,394.5	8.9	R0784	0.5	R0784	9.4
B0770	7,394.5	7,402.8	8.3	R0784	9.4	R0786	2.2

	depth (ft bsl)						
box	top	bottom	interval	top run	depth	bottom run	depth
B0771	7,402.8	7,412.0	9.2	R0786	2.2	R0786	11.4
B0772	7,412.0	7,420.1	8.1	R0786	11.4	R0787	2.5
B0773	7,420.1	7,429.3	9.2	R0787	2.5	R0787	11.7
B0774	7,429.3	7,438.3	9.0	R0787	11.7	R0788	1.7
B0775	7,438.3	7,448.1	9.8	R0788	1.7	R0790	0.0
B0776	7,448.1	7,457.5	9.4	R0790	0.0	R0790	9.4
B0777	7,457.5	7,466.7	9.2	R0790	9.4	R0790	18.6
B0778	7,466.7	7,475.6	8.9	R0790	18.6	R0791	6.0
B0779	7,475.6	7,485.0	9.4	R0791	6.0	R0791	15.4
B0780	7,485.0	7,494.5	9.5	R0791	15.4	R0792	3.4
B0781	7,494.5	7,503.6	9.1	R0792	3.4	R0792	12.5
B0782	7,503.6	7,511.7	8.1	R0792	12.5	R0793	5.6
B0783	7,511.7	7,519.5	7.8	R0793	5.6	R0794	1.9
B0784	7,519.5	7,528.0	8.5	R0794	1.9	R0795	2.9
B0785	7,528.0	7,540.8	12.8	R0795	2.9	R0796	2.7
B0786	7,540.8	7,550.2	9.4	R0796	2.7	R0797	1.1
B0787	7,550.2	7,559.4	9.2	R0797	1.1	R0797	10.3
B0788	7,559.4	7,569.2	9.8	R0797	10.3	R0798	8.1
B0789	7,569.2	7,578.6	9.4	R0798	8.1	R0798	17.5
B0790	7,578.6	7,586.5	7.9	R0798	17.5	R0799	6.4
B0791	7,586.5	7,595.4	8.9	R0799	6.4	R0799	15.3
B0792	7,595.4	7,604.2	8.8	R0799	15.3	R0800	2.6
B0793	7,604.2	7,613.9	9.7	R0800	2.6	R0800	12.3
B0794	7,613.9	7,623.2	9.3	R0800	12.3	R0801	0.1
B0795	7,623.2	7,632.9	9.7	R0801	0.1	R0801	9.8
B0796	7,632.9	7,643.7	10.8	R0801	9.8	R0802	1.1
B0797	7,643.7	7,653.4	9.7	R0802	1.1	R0803	4.3
B0798	7,653.4	7,661.9	8.5	R0803	4.3	R0805	3.8
B0799	7,661.9	7,670.6	8.7	R0805	3.8	R0806	3.5
B0800	7,670.6	7,679.7	9.1	R0806	3.5	R0807	4.1
B0801	7,679.7	7,687.5	7.8	R0807	4.1	R0808	1.4
B0802	7,687.5	7,697.6	10.1	R0808	1.4	R0808	11.5
B0803	7,697.6	7,707.0	9.4	R0809	0.0	R0809	9.4
B0804	7,707.0	7,716.6	9.6	R0809	9.4	R0813	4.5
B0805	7,716.6	7,725.3	8.7	R0814	0.0	R0814	8.7
B0806	7,725.3	7,734.9	9.6	R0814	8.7	R0814	18.3
B0807	7,734.9	7,742.6	7.7	R0814	18.3	R0815	6.0
B0808	7,742.6	7,751.4	8.8	R0816	0.0	R0816	8.8
B0809	7,751.4	7,760.1	8.7	R0816	8.8	R0817	6.0
B0810	7,760.1	7,769.5	9.4	R0818	0.0	R0819	3.4
B0811	7,769.5	7,778.9	9.4	R0819	3.4	R0819	12.8
B0812	7,778.9	7,788.8	9.9	R0819	12.8	R0820	1.2
B0813	7,788.8	7,798.0	9.2	R0820	1.2	R0820	10.4

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0814	7,798.0	7,808.3	10.3	R0820	10.4	R0821	7.2
B0815	7,808.3	7,817.5	9.2	R0821	7.2	R0822	3.9
B0816	7,817.5	7,826.9	9.4	R0822	3.9	R0822	13.3
B0817	7,826.9	7,836.0	9.1	R0822	13.3	R0823	0.9
B0818	7,836.0	7,846.0	10.0	R0823	0.9	R0823	10.9
B0819	7,846.0	7,855.4	9.4	R0823	10.9	R0823	20.3
B0820	7,855.4	7,865.3	9.9	R0823	20.3	R0824	8.2
B0821	7,865.3	7,874.8	9.5	R0824	8.2	R0824	17.7
B0822	7,874.8	7,883.7	8.9	R0824	17.7	R0825	7.6
B0823	7,883.7	7,892.8	9.1	R0825	7.6	R0825	16.7
B0824	7,892.8	7,901.3	8.5	R0825	16.7	R0826	3.7
B0825	7,901.3	7,911.0	9.7	R0826	3.7	R0826	13.4
B0826	7,911.0	7,919.1	8.1	R0826	13.4	R0826	21.5
B0827	7,919.1	7,927.9	8.8	R0827	0.0	R0827	8.8
B0828	7,927.9	7,938.5	10.6	R0827	8.8	R0828	1.4
B0829	7,938.5	7,947.7	9.2	R0828	1.4	R0828	10.6
B0830	7,947.7	7,957.1	9.4	R0828	10.6	R0828	20.0
B0831	7,957.1	7,965.6	8.5	R0828	20.0	R0829	7.5
B0832	7,965.6	7,974.9	9.3	R0829	7.5	R0829	16.8
B0833	7,974.9	7,984.1	9.2	R0829	16.8	R0830	7.5
B0834	7,984.1	7,994.1	10.0	R0830	7.5	R0830	17.5
B0835	7,994.1	8,002.8	8.7	R0830	17.5	R0831	4.7
B0836	8,002.8	8,011.6	8.8	R0831	4.7	R0831	13.5
B0837	8,011.6	8,016.9	5.3	R0831	13.5	R0832	1.8
B0838	8,016.9	8,025.4	8.5	R0832	1.8	R0832	10.3
B0839	8,025.4	8,033.8	8.4	R0832	10.3	R0833	7.7
B0840	8,033.8	8,043.3	9.5	R0833	7.7	R0833	17.2
B0841	8,043.3	8,051.2	7.9	R0833	17.2	R0834	3.6
B0842	8,051.2	8,061.0	9.8	R0834	3.6	R0834	13.4
B0843	8,061.0	8,072.1	11.1	R0834	13.4	R0835	5.0
B0844	8,072.1	8,081.8	9.7	R0835	5.0	R0835	14.7
B0845	8,081.8	8,089.8	8.0	R0835	14.7	R0836	2.7
B0846	8,089.8	8,099.6	9.8	R0836	2.7	R0836	12.5
B0847	8,099.6	8,108.9	9.3	R0836	12.5	R0837	0.3
B0848	8,108.9	8,118.7	9.8	R0837	0.3	R0837	10.1
B0849	8,118.7	8,128.3	9.6	R0837	10.1	R0837	19.7
B0850	8,128.3	8,137.9	9.6	R0837	19.7	R0838	7.8
B0851	8,137.9	8,147.7	9.8	R0838	7.8	R0838	17.6
B0852	8,147.7	8,156.9	9.2	R0838	17.6	R0839	5.3
B0853	8,156.9	8,166.4	9.5	R0839	5.3	R0839	14.8
B0854	8,166.4	8,176.2	9.8	R0839	14.8	R0840	3.1
B0855	8,176.2	8,185.6	9.4	R0840	3.1	R0840	12.5
B0856	8,185.6	8,194.5	8.9	R0840	12.5	R0841	7.4

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0857	8,194.5	8,204.0	9.5	R0841	7.4	R0841	16.9
B0858	8,204.0	8,213.7	9.7	R0841	16.9	R0842	4.6
B0859	8,213.7	8,223.5	9.8	R0842	4.6	R0842	14.4
B0860	8,223.5	8,232.2	8.7	R0842	14.4	R0843	1.1
B0861	8,232.2	8,241.7	9.5	R0843	1.1	R0843	10.6
B0862	8,241.7	8,249.6	7.9	R0843	10.6	R0844	3.5
B0863	8,249.6	8,258.7	9.1	R0844	3.5	R0844	12.6
B0864	8,258.7	8,268.1	9.4	R0844	12.6	R0844	22.0
B0865	8,268.1	8,277.7	9.6	R0844	22.0	R0845	9.6
B0866	8,277.7	8,287.4	9.7	R0845	9.6	R0846	6.8
B0867	8,287.4	8,297.3	9.9	R0846	6.8	R0846	16.7
B0868	8,297.3	8,308.4	11.1	R0846	16.7	R0847	5.8
B0869	8,308.4	8,318.3	9.9	R0847	5.8	R0847	15.7
B0870	8,318.3	8,326.4	8.1	R0847	15.7	R0848	3.3
B0871	8,326.4	8,336.0	9.6	R0848	3.3	R0848	12.9
B0872	8,336.0	8,344.7	8.7	R0848	12.9	R0849	5.6
B0873	8,344.7	8,354.1	9.4	R0849	5.6	R0849	15.0
B0874	8,354.1	8,363.5	9.4	R0849	15.0	R0850	2.4
B0875	8,363.5	8,373.3	9.8	R0850	2.4	R0850	12.2
B0876	8,373.3	8,383.1	9.8	R0850	12.2	R0850	22.0
B0877	8,383.1	8,392.3	9.2	R0851	0.0	R0851	9.2
B0878	8,392.3	8,402.0	9.7	R0851	9.2	R0851	18.9
B0879	8,402.0	8,411.9	9.9	R0851	18.9	R0852	6.8
B0880	8,411.9	8,421.7	9.8	R0852	6.8	R0852	16.6
B0881	8,421.7	8,431.0	9.3	R0852	16.6	R0853	5.9
B0882	8,431.0	8,440.9	9.9	R0853	5.9	R0853	15.8
B0883	8,440.9	8,450.6	9.7	R0853	15.8	R0854	3.5
B0884	8,450.6	8,460.0	9.4	R0854	3.5	R0854	12.9
B0885	8,460.0	8,468.6	8.6	R0854	12.9	R0855	0.5
B0886	8,468.6	8,477.4	8.8	R0855	0.5	R0855	9.3
B0887	8,477.4	8,487.0	9.6	R0855	9.3	R0855	18.9
B0888	8,487.0	8,496.0	9.0	R0855	18.9	R0856	5.9
B0889	8,496.0	8,506.0	10.0	R0856	5.9	R0856	15.9
B0890	8,506.0	8,515.6	9.6	R0856	15.9	R0857	9.5
B0891	8,515.6	8,524.5	8.9	R0857	9.5	R0857	18.4
B0892	8,524.5	8,533.3	8.8	R0857	18.4	R0858	5.2
B0893	8,533.3	8,542.7	9.4	R0858	5.2	R0858	14.6
B0894	8,542.7	8,550.9	8.2	R0858	14.6	R0859	3.8
B0895	8,550.9	8,560.2	9.3	R0859	3.8	R0859	13.1
B0896	8,560.2	8,569.5	9.3	R0859	13.1	R0860	0.4
B0897	8,569.5	8,578.9	9.4	R0860	0.4	R0860	9.8
B0898	8,578.9	8,588.3	9.4	R0860	9.8	R0860	19.2
B0899	8,588.3	8,596.7	8.4	R0860	19.2	R0862	3.6

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0900	8,596.7	8,606.7	10.0	R0862	3.6	R0863	4.6
B0901	8,606.7	8,615.1	8.4	R0863	4.6	R0863	13.0
B0902	8,615.1	8,624.1	9.0	R0863	13.0	R0863	22.0
B0903	8,624.1	8,632.9	8.8	R0864	0.0	R0864	8.8
B0904	8,632.9	8,641.8	8.9	R0864	8.8	R0864	17.7
B0905	8,641.8	8,650.7	8.9	R0864	17.7	R0865	6.6
B0906	8,650.7	8,658.1	7.4	R0865	6.6	R0866	3.0
B0907	8,658.1	8,666.6	8.5	R0866	3.0	R0867	3.5
B0908	8,666.6	8,674.9	8.3	R0867	3.5	R0868	0.8
B0909	8,674.9	8,683.1	8.2	R0868	0.8	R0869	1.0
B0910	8,683.1	8,690.4	7.3	R0869	1.0	R0870	2.3
B0911	8,690.4	8,699.6	9.2	R0870	2.3	R0871	7.0
B0912	8,699.6	8,708.8	9.2	R0871	7.0	R0871	16.2
B0913	8,708.8	8,715.6	6.8	R0871	16.2	R0872	2.5
B0914	8,715.6	8,723.4	7.8	R0872	2.5	R0873	6.3
B0915	8,723.4	8,730.0	6.6	R0873	6.3	R0875	1.9
B0916	8,730.0	8,739.0	9.0	R0875	1.9	R0875	10.9
B0917	8,739.0	8,748.5	9.5	R0875	10.9	R0875	20.4
B0918	8,748.5	8,755.2	6.7	R0875	20.4	R0876	5.1
B0919	8,755.2	8,764.2	9.0	R0876	5.1	R0877	3.1
B0920	8,764.2	8,772.9	8.7	R0877	3.1	R0878	4.8
B0921	8,772.9	8,780.6	7.7	R0878	4.8	R0879	3.5
B0922	8,780.6	8,789.1	8.5	R0879	3.5	R0879	12.0
B0923	8,789.1	8,799.5	10.4	R0880	0.0	R0882	0.4
B0924	8,799.5	8,808.8	9.3	R0882	0.4	R0882	9.7
B0925	8,808.8	8,816.4	7.6	R0882	9.7	R0884	0.3
B0926	8,816.4	8,824.5	8.1	R0884	0.3	R0885	3.9
B0927	8,824.5	8,834.2	9.7	R0885	3.9	R0885	13.6
B0928	8,834.2	8,843.1	8.9	R0885	13.6	R0886	0.5
B0929	8,843.1	8,852.9	9.8	R0886	0.5	R0886	10.3
B0930	8,852.9	8,862.7	9.8	R0886	10.3	R0886	20.1
B0931	8,862.7	8,871.9	9.2	R0886	20.1	R0887	7.3
B0932	8,871.9	8,880.7	8.8	R0887	7.3	R0887	16.1
B0933	8,880.7	8,890.1	9.4	R0887	16.1	R0888	3.0
B0934	8,890.1	8,898.4	8.3	R0888	3.0	R0888	11.3
B0935	8,898.4	8,907.1	8.7	R0888	11.3	R0888	20.0
B0936	8,907.1	8,915.1	8.0	R0889	0.0	R0889	8.0
B0937	8,915.1	8,922.9	7.8	R0889	8.0	R0890	0.8
B0938	8,922.9	8,931.9	9.0	R0890	0.8	R0890	9.8
B0939	8,931.9	8,940.4	8.5	R0890	9.8	R0891	0.3
B0940	8,940.4	8,949.6	9.2	R0891	0.3	R0891	9.5
B0941	8,949.6	8,958.9	9.3	R0891	9.5	R0891	18.8
B0942	8,958.9	8,968.1	9.2	R0891	18.8	R0892	6.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0943	8,968.1	8,977.9	9.8	R0892	6.0	R0892	15.8
B0944	8,977.9	8,986.8	8.9	R0892	15.8	R0893	4.7
B0945	8,986.8	8,996.6	9.8	R0893	4.7	R0893	14.5
B0946	8,996.6	9,005.5	8.9	R0893	14.5	R0894	1.4
B0947	9,005.5	9,015.2	9.7	R0894	1.4	R0894	11.1
B0948	9,015.2	9,024.6	9.4	R0894	11.1	R0894	20.5
B0949	9,024.6	9,034.4	9.8	R0894	20.5	R0895	8.3
B0950	9,034.4	9,044.2	9.8	R0895	8.3	R0895	18.1
B0951	9,044.2	9,053.0	8.8	R0895	18.1	R0896	4.9
B0952	9,053.0	9,062.3	9.3	R0896	4.9	R0896	14.2
B0953	9,062.3	9,070.1	7.8	R0896	14.2	R0896	22.0
B0954	9,070.1	9,077.1	7.0	R0896	22.0	R0897	7.0
B0955	9,077.1	9,085.9	8.8	R0898	0.0	R0898	8.8
B0956	9,085.9	9,093.4	7.5	R0898	8.8	R0899	7.3
B0957	9,093.4	9,100.6	7.2	R0899	7.3	R0900	2.5
B0958	9,100.6	9,111.1	10.5	R0900	2.5	R0901	9.0
B0959	9,111.1	9,118.1	7.0	R0901	9.0	R0903	1.0
B0960	9,118.1	9,126.4	8.3	R0903	1.0	R0903	9.3
B0961	9,126.4	9,133.8	7.4	R0903	9.3	R0905	4.7
B0962	9,133.8	9,141.6	7.8	R0905	4.7	R0906	0.5
B0963	9,141.6	9,149.8	8.2	R0906	0.5	R0907	0.7
B0964	9,149.8	9,159.2	9.4	R0907	0.7	R0908	1.1
B0965	9,159.2	9,168.8	9.6	R0908	1.1	R0908	10.7
B0966	9,168.8	9,178.5	9.7	R0908	10.7	R0908	20.4
B0967	9,178.5	9,187.2	8.7	R0908	20.4	R0909	8.1
B0968	9,187.2	9,196.3	9.1	R0909	8.1	R0909	17.2
B0969	9,196.3	9,204.6	8.3	R0909	17.2	R0910	3.5
B0970	9,204.6	9,214.2	9.6	R0910	3.5	R0910	13.1
B0971	9,214.2	9,223.4	9.2	R0910	13.1	R0911	0.3
B0972	9,223.4	9,233.3	9.9	R0911	0.3	R0911	10.2
B0973	9,233.3	9,243.2	9.9	R0911	10.2	R0911	20.1
B0974	9,243.2	9,251.8	8.6	R0911	20.1	R0912	7.7
B0975	9,251.8	9,260.3	8.5	R0912	7.7	R0912	16.2
B0976	9,260.3	9,268.1	7.8	R0912	16.2	R0913	2.0
B0977	9,268.1	9,277.3	9.2	R0913	2.0	R0913	11.2
B0978	9,277.3	9,285.7	8.4	R0913	11.2	R0914	5.6
B0979	9,285.7	9,292.1	6.4	R0914	5.6	R0914	12.0
B0980	9,292.1	9,300.5	8.4	R0914	12.0	R0915	8.4
B0981	9,300.5	9,307.3	6.8	R0915	8.4	R0916	1.2
B0982	9,307.3	9,316.4	9.1	R0916	1.2	R0916	10.3
B0983	9,316.4	9,324.1	7.7	R0916	10.3	R0916	18.0
B0984	9,324.1	9,333.3	9.2	R0917	0.0	R0917	9.2
B0985	9,333.3	9,343.2	9.9	R0917	9.2	R0917	19.1

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B0986	9,343.2	9,352.3	9.1	R0917	19.1	R0918	6.2
B0987	9,352.3	9,362.0	9.7	R0918	6.2	R0918	15.9
B0988	9,362.0	9,371.3	9.3	R0918	15.9	R0919	3.2
B0989	9,371.3	9,380.3	9.0	R0919	3.2	R0921	8.2
B0990	9,380.3	9,389.9	9.6	R0921	8.2	R0921	17.8
B0991	9,389.9	9,400.2	10.3	R0921	17.8	R0922	8.1
B0992	9,400.2	9,410.2	10.0	R0922	8.1	R0922	18.1
B0993	9,410.2	9,419.9	9.7	R0922	18.1	R0923	5.8
B0994	9,419.9	9,429.6	9.7	R0923	5.8	R0923	15.5
B0995	9,429.6	9,438.2	8.6	R0923	15.5	R0924	8.1
B0996	9,438.2	9,447.7	9.5	R0924	8.1	R0924	17.6
B0997	9,447.7	9,456.7	9.0	R0924	17.6	R0925	4.6
B0998	9,456.7	9,466.3	9.6	R0925	4.6	R0925	14.2
B0999	9,466.3	9,475.4	9.1	R0925	14.2	R0926	1.3
B1000	9,475.4	9,485.2	9.8	R0926	1.3	R0926	11.1
B1001	9,485.2	9,494.9	9.7	R0926	11.1	R0927	0.8
B1002	9,494.9	9,504.7	9.8	R0927	0.8	R0927	10.6
B1003	9,504.7	9,513.9	9.2	R0927	10.6	R0927	19.8
B1004	9,513.9	9,522.9	9.0	R0927	19.8	R0928	6.8
B1005	9,522.9	9,532.8	9.9	R0928	6.8	R0928	16.7
B1006	9,532.8	9,541.7	8.9	R0928	16.7	R0929	3.6
B1007	9,541.7	9,551.4	9.7	R0929	3.6	R0929	13.3
B1008	9,551.4	9,560.1	8.7	R0929	13.3	R0929	22.0
B1009	9,560.1	9,569.2	9.1	R0930	0.0	R0930	9.1
B1010	9,569.2	9,577.8	8.6	R0930	9.1	R0930	17.7
B1011	9,577.8	9,586.0	8.2	R0930	17.7	R0931	3.9
B1012	9,586.0	9,594.6	8.6	R0931	3.9	R0931	12.5
B1013	9,594.6	9,602.4	7.8	R0931	12.5	R0931	20.3
B1014	9,602.4	9,608.1	5.7	R0931	20.3	R0932	5.0
B1015	9,608.1	9,614.1	6.0	R0932	5.0	R0933	4.0
B1016	9,614.1	9,623.1	9.0	R0933	4.0	R0933	13.0
B1017	9,623.1	9,631.2	8.1	R0934	0.0	R0934	8.1
B1018	9,631.2	9,640.2	9.0	R0934	8.1	R0935	6.1
B1019	9,640.2	9,649.2	9.0	R0935	6.1	R0935	15.1
B1020	9,649.2	9,657.3	8.1	R0935	15.1	R0936	1.2
B1021	9,657.3	9,666.1	8.8	R0936	1.2	R0936	10.0
B1022	9,666.1	9,675.1	9.0	R0936	10.0	R0936	19.0
B1023	9,675.1	9,682.2	7.1	R0936	19.0	R0937	7.1
B1024	9,682.2	9,689.0	6.8	R0937	7.1	R0938	5.9
B1025	9,689.0	9,696.7	7.7	R0938	5.9	R0939	2.6
B1026	9,696.7	9,705.2	8.5	R0939	2.6	R0939	11.1
B1027	9,705.2	9,714.2	9.0	R0939	11.1	R0939	20.1
B1028	9,714.2	9,722.3	8.1	R0939	20.1	R0940	6.2

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B1029	9,722.3	9,731.1	8.8	R0940	6.2	R0940	15.0
B1030	9,731.1	9,738.0	6.9	R0940	15.0	R0941	1.9
B1031	9,738.0	9,747.2	9.2	R0941	1.9	R0941	11.1
B1032	9,747.2	9,753.1	5.9	R0941	11.1	R0942	3.0
B1033	9,753.1	9,761.1	8.0	R0942	3.0	R0942	11.0
B1034	9,761.1	9,767.8	6.7	R0942	11.0	R0944	2.7
B1035	9,767.8	9,775.8	8.0	R0944	2.7	R0944	10.7
B1036	9,775.8	9,782.6	6.8	R0944	10.7	R0945	6.5
B1037	9,782.6	9,790.3	7.7	R0945	6.5	R0946	0.2
B1038	9,790.3	9,798.4	8.1	R0946	0.2	R0947	3.3
B1039	9,798.4	9,806.7	8.3	R0947	3.3	R0947	11.6
B1040	9,806.7	9,814.1	7.4	R0947	11.6	R0948	6.0
B1041	9,814.1	9,821.6	7.5	R0948	6.0	R0949	7.5
B1042	9,821.6	9,826.4	4.8	R0949	7.5	R0950	2.3
B1043	9,826.4	9,832.2	5.8	R0950	2.3	R0951	2.1
B1044	9,832.2	9,841.2	9.0	R0951	2.1	R0951	11.1
B1045	9,841.2	9,848.0	6.8	R0951	11.1	R0952	1.9
B1046	9,848.0	9,855.9	7.9	R0952	1.9	R0953	6.8
B1047	9,855.9	9,863.7	7.8	R0953	6.8	R0954	1.6
B1048	9,863.7	9,872.8	9.1	R0954	1.6	R0954	10.7
B1049	9,872.8	9,880.6	7.8	R0954	10.7	R0955	6.5
B1050	9,880.6	9,886.6	6.0	R0955	6.5	R0956	2.5
B1051	9,886.6	9,896.0	9.4	R0956	2.5	R0956	11.9
B1052	9,896.0	9,905.1	9.1	R0956	11.9	R0956	21.0
B1053	9,905.1	9,913.1	8.0	R0956	21.0	R0957	8.0
B1054	9,913.1	9,918.5	5.4	R0957	8.0	R0958	2.4
B1055	9,918.5	9,927.2	8.7	R0958	2.4	R0958	11.1
B1056	9,927.2	9,934.9	7.7	R0958	11.1	R0959	4.8
B1057	9,934.9	9,944.3	9.4	R0959	4.8	R0959	14.2
B1058	9,944.3	9,953.3	9.0	R0959	14.2	R0960	1.2
B1059	9,953.3	9,962.1	8.8	R0960	1.2	R0960	10.0
B1060	9,962.1	9,970.9	8.8	R0961	0.0	R0961	8.8
B1061	9,970.9	9,980.9	10.0	R0961	8.8	R0961	18.8
B1062	9,980.9	9,992.0	11.1	R0961	18.8	R0962	7.9
B1063	9,992.0	10,001.0	9.0	R0962	7.9	R0962	16.9
B1064	10,001.0	10,009.6	8.6	R0962	16.9	R0963	5.5
B1065	10,009.6	10,018.8	9.2	R0963	5.5	R0963	14.7
B1066	10,018.8	10,027.4	8.6	R0963	14.7	R0964	1.3
B1067	10,027.4	10,036.7	9.3	R0964	1.3	R0964	10.6
B1068	10,036.7	10,046.3	9.6	R0964	10.6	R0964	20.2
B1069	10,046.3	10,053.8	7.5	R0964	20.2	R0966	0.7
B1070	10,053.8	10,062.6	8.8	R0966	0.7	R0966	9.5
B1071	10,062.6	10,071.2	8.6	R0966	9.5	R0967	8.1

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
B1072	10,071.2	10,078.8	7.6	R0967	8.1	R0968	3.7
B1073	10,078.8	10,086.8	8.0	R0968	3.7	R0969	1.7
B1074	10,086.8	10,096.1	9.3	R0969	1.7	R0969	11.0
B1075	10,096.1	10,103.6	7.5	R0969	11.0	R0971	0.5
B1076	10,103.6	10,111.5	7.9	R0971	0.5	R0972	1.4
B1077	10,111.5	10,120.2	8.7	R0972	1.4	R0972	10.1
B1078	10,120.2	10,126.1	5.9	R0972	10.1	R0972	16.0
B1079	10,126.1	10,132.6	6.5	R0972	16.0	R0975	0.5
B1080	10,132.6	10,141.1	8.5	R0975	0.5	R0975	9.0
B1081	10,141.1	10,147.9	6.8	R0975	9.0	R0978	5.3
B1082	10,147.9	10,156.5	8.6	R0978	5.3	R0979	2.4
B1083	10,156.5	10,163.6	7.1	R0979	2.4	R0980	0.5

icdp

Hawaii Scientific Drilling Project

DIS: Data-Report **ARCHIVE CORE BOX RECORD FORM**

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0001	-5.9	9.6	15.5	R0001	0.0	R0003	4.5
A0002	9.6	28.3	18.7	R0004	0.0	R0007	3.2
A0003	28.3	38.6	10.3	R0007	3.2	R0009	5.0
A0004	38.6	49.7	11.1	R0010	0.0	R0012	1.1
A0005	49.7	61.0	11.3	R0012	1.1	R0014	2.9
A0006	61.0	80.9	19.9	R0014	2.9	R0017	2.3
A0007	80.9	97.3	16.4	R0017	2.3	R0020	3.2
A0008	97.3	107.8	10.5	R0020	3.2	R0022	3.7
A0009	107.8	119.1	11.3	R0022	3.7	R0025	0.5
A0010	119.1	131.4	12.3	R0025	0.5	R0027	2.8
A0011	131.4	144.1	12.7	R0027	2.8	R0029	5.5
A0012	144.1	156.3	12.2	R0030	0.0	R0032	3.2
A0013	156.3	167.4	11.1	R0032	3.2	R0034	4.3
A0014	167.4	179.1	11.7	R0034	4.3	R0037	0.5
A0015	179.1	190.6	11.5	R0037	0.5	R0039	2.0
A0016	190.6	203.5	12.9	R0039	2.0	R0041	4.4
A0017	203.5	216.4	12.9	R0041	4.4	R0044	2.3
A0018	216.4	228.7	12.3	R0044	2.3	R0046	4.6
A0019	228.7	240.4	11.7	R0046	4.6	R0049	1.3
A0020	240.4	251.6	11.2	R0049	1.3	R0051	2.5
A0021	251.6	262.9	11.3	R0051	2.5	R0054	0.8
A0022	262.9	274.8	11.9	R0054	0.8	R0056	1.7
A0023	274.8	287.6	12.8	R0056	1.7	R0058	3.5
A0024	287.6	299.6	12.0	R0058	3.5	R0061	0.5
A0025	299.6	313.2	13.6	R0061	0.5	R0063	4.1
A0026	313.2	325.7	12.5	R0063	4.1	R0066	1.6
A0027	325.7	339.1	13.4	R0066	1.6	R0068	5.0
A0028	339.1	351.1	12.0	R0069	0.0	R0071	2.0
A0029	351.1	363.8	12.7	R0071	2.0	R0073	4.7
A0030	363.8	380.0	16.2	R0073	4.7	R0076	1.9
A0031	380.0	396.0	16.0	R0076	1.9	R0078	5.9
A0032	396.0	409.5	13.5	R0078	5.9	R0079	8.9
A0033	409.5	422.9	13.4	R0079	8.9	R0081	1.8
A0034	422.9	435.1	12.2	R0081	1.8	R0082	4.0
A0035	435.1	448.0	12.9	R0082	4.0	R0083	6.4
A0036	448.0	460.2	12.2	R0083	6.4	R0084	8.6
A0037	460.2	472.8	12.6	R0084	8.6	R0086	2.7
A0038	472.8	485.7	12.9	R0086	2.7	R0087	5.6
A0039	485.7	499.0	13.3	R0087	5.6	R0089	8.4

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0040	499.0	512.0	13.0	R0089	8.4	R0091	3.4
A0041	512.0	525.0	13.0	R0091	3.4	R0092	5.9
A0042	525.0	537.4	12.4	R0092	5.9	R0093	8.3
A0043	537.4	550.1	12.7	R0093	8.3	R0094	10.5
A0044	550.1	563.4	13.3	R0095	0.0	R0096	3.3
A0045	563.4	577.0	13.6	R0096	3.3	R0097	6.4
A0046	577.0	588.7	11.7	R0097	6.4	R0098	7.6
A0047	588.7	602.0	13.3	R0098	7.6	R0100	0.4
A0048	602.0	615.6	13.6	R0100	0.4	R0101	3.5
A0049	615.6	627.5	11.9	R0101	3.5	R0102	5.4
A0050	627.5	638.9	11.4	R0102	5.4	R0103	6.8
A0051	638.9	651.9	13.0	R0103	6.8	R0105	0.8
A0052	651.9	664.1	12.2	R0105	0.8	R0106	3.0
A0053	664.1	676.4	12.3	R0106	3.0	R0108	1.3
A0054	676.4	689.0	12.6	R0108	1.3	R0109	3.9
A0055	689.0	702.3	13.3	R0109	3.9	R0110	8.2
A0056	702.3	713.0	10.7	R0110	8.2	R0111	8.9
A0057	713.0	725.3	12.3	R0111	8.9	R0113	1.7
A0058	725.3	738.9	13.6	R0113	1.7	R0114	5.3
A0059	738.9	752.6	13.7	R0114	5.3	R0115	9.0
A0060	752.6	766.2	13.6	R0115	9.0	R0117	3.6
A0061	766.2	780.1	13.9	R0117	3.6	R0118	8.5
A0062	780.1	792.6	12.5	R0118	8.5	R0119	10.5
A0063	792.6	805.0	12.4	R0120	0.0	R0121	1.9
A0064	805.0	817.1	12.1	R0121	1.9	R0122	3.5
A0065	817.1	831.5	14.4	R0123	0.0	R0124	5.9
A0066	831.5	846.1	14.6	R0124	5.9	R0126	2.5
A0067	846.1	857.9	11.8	R0126	2.5	R0127	4.3
A0068	857.9	870.1	12.2	R0127	4.3	R0128	6.0
A0069	870.1	882.5	12.4	R0128	6.0	R0130	0.4
A0070	882.5	895.3	12.8	R0130	0.4	R0131	2.2
A0071	895.3	909.0	13.7	R0131	2.2	R0132	4.9
A0072	909.0	922.7	13.7	R0132	4.9	R0133	8.1
A0073	922.7	935.1	12.4	R0133	8.1	R0134	10.0
A0074	935.1	949.4	14.3	R0134	10.0	R0136	4.3
A0075	949.4	961.9	12.5	R0136	4.3	R0137	6.8
A0076	961.9	974.3	12.4	R0137	6.8	R0138	9.2
A0077	974.3	985.8	11.5	R0138	9.2	R0140	0.7
A0078	985.8	999.8	14.0	R0140	0.7	R0141	4.7
A0079	999.8	1,012.2	12.4	R0141	4.7	R0142	7.1
A0080	1,012.2	1,024.5	12.3	R0142	7.1	R0144	1.4
A0081	1,024.5	1,036.9	12.4	R0144	1.4	R0145	3.8
A0082	1,036.9	1,047.6	10.7	R0145	3.8	R0146	4.5

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0083	1,047.6	1,059.3	11.7	R0146	4.5	R0147	6.2
A0084	1,059.3	1,071.2	11.9	R0147	6.2	R0148	8.1
A0085	1,071.2	1,085.5	14.3	R0148	8.1	R0150	0.4
A0086	1,085.5	1,096.8	11.3	R0150	0.4	R0151	1.7
A0087	1,096.8	1,108.3	11.5	R0151	1.7	R0152	3.2
A0088	1,108.3	1,120.9	12.6	R0152	3.2	R0153	5.8
A0089	1,120.9	1,134.4	13.5	R0153	5.8	R0155	1.3
A0090	1,134.4	1,149.4	15.0	R0155	1.3	R0156	5.8
A0091	1,149.4	1,164.8	15.4	R0156	5.8	R0158	2.2
A0092	1,164.8	1,177.7	12.9	R0158	2.2	R0159	4.6
A0093	1,177.7	1,190.8	13.1	R0159	4.6	R0162	4.2
A0094	1,190.8	1,211.9	21.1	R0162	4.2	R0164	6.8
A0095	1,211.9	1,225.1	13.2	R0164	6.8	R0165	10.0
A0096	1,225.1	1,236.6	11.5	R0166	0.0	R0167	1.5
A0097	1,236.6	1,249.1	12.5	R0167	1.5	R0168	4.0
A0098	1,249.1	1,261.1	12.0	R0168	4.0	R0169	6.0
A0099	1,261.1	1,273.6	12.5	R0169	6.0	R0171	4.0
A0100	1,273.6	1,288.9	15.3	R0171	4.0	R0173	8.8
A0101	1,288.9	1,301.5	12.6	R0173	8.8	R0175	0.9
A0102	1,301.5	1,316.4	14.9	R0175	0.9	R0176	5.3
A0103	1,316.4	1,329.0	12.6	R0176	5.3	R0177	8.9
A0104	1,329.0	1,341.2	12.2	R0177	8.9	R0179	2.6
A0105	1,341.2	1,354.4	13.2	R0179	2.6	R0180	4.8
A0106	1,354.4	1,367.4	13.0	R0180	4.8	R0181	8.8
A0107	1,367.4	1,385.8	18.4	R0181	8.8	R0184	7.2
A0108	1,385.8	1,398.6	12.8	R0184	7.2	R0186	5.0
A0109	1,398.6	1,412.1	13.5	R0186	5.0	R0188	2.0
A0110	1,412.1	1,426.1	14.0	R0188	2.0	R0189	4.7
A0111	1,426.1	1,441.6	15.5	R0189	4.7	R0190	8.5
A0112	1,441.6	1,457.2	15.6	R0190	8.5	R0193	2.1
A0113	1,457.2	1,473.6	16.4	R0193	2.1	R0196	1.5
A0114	1,473.6	1,490.4	16.8	R0197	0.0	R0200	5.8
A0115	1,490.4	1,503.7	13.3	R0200	5.8	R0201	8.6
A0116	1,503.7	1,517.2	13.5	R0201	8.6	R0203	2.6
A0117	1,517.2	1,529.5	12.3	R0203	2.6	R0204	7.4
A0118	1,529.5	1,543.5	14.0	R0204	7.4	R0206	4.4
A0119	1,543.5	1,560.1	16.6	R0206	4.4	R0208	0.5
A0120	1,560.1	1,574.5	14.4	R0208	0.5	R0209	3.9
A0121	1,574.5	1,587.8	13.3	R0209	3.9	R0210	7.2
A0122	1,587.8	1,602.1	14.3	R0210	7.2	R0211	10.5
A0123	1,602.1	1,616.4	14.3	R0212	0.0	R0213	3.3
A0124	1,616.4	1,629.8	13.4	R0213	3.3	R0214	6.2
A0125	1,629.8	1,641.7	11.9	R0214	6.2	R0215	7.6

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0126	1,641.7	1,654.0	12.3	R0215	7.6	R0216	9.4
A0127	1,654.0	1,668.0	14.0	R0216	9.4	R0218	2.9
A0128	1,668.0	1,680.6	12.6	R0218	2.9	R0219	5.5
A0129	1,680.6	1,694.8	14.2	R0219	5.5	R0222	3.7
A0130	1,694.8	1,709.8	15.0	R0222	3.7	R0224	1.2
A0131	1,709.8	1,726.1	16.3	R0224	1.2	R0226	4.0
A0132	1,726.1	1,741.0	14.9	R0227	0.0	R0229	0.4
A0133	1,741.0	1,753.7	12.7	R0229	0.4	R0230	3.6
A0134	1,753.7	1,766.6	12.9	R0230	3.6	R0231	6.5
A0135	1,766.6	1,778.1	11.5	R0231	6.5	R0232	8.5
A0136	1,778.1	1,789.7	11.6	R0232	8.5	R0234	0.6
A0137	1,789.7	1,802.8	13.1	R0234	0.6	R0235	3.7
A0138	1,802.8	1,816.0	13.2	R0235	3.7	R0236	7.9
A0139	1,816.0	1,828.9	12.9	R0236	7.9	R0238	1.8
A0140	1,828.9	1,845.1	16.2	R0238	1.8	R0239	8.0
A0141	1,845.1	1,860.6	15.5	R0240	0.0	R0242	1.0
A0142	1,860.6	1,873.5	12.9	R0242	1.0	R0243	3.4
A0143	1,873.5	1,886.6	13.1	R0243	3.4	R0245	3.5
A0144	1,886.6	1,900.6	14.0	R0245	3.5	R0248	0.5
A0145	1,900.6	1,916.6	16.0	R0248	0.5	R0253	2.0
A0146	1,916.6	1,933.5	16.9	R0253	2.0	R0256	2.4
A0147	1,933.5	1,947.6	14.1	R0256	2.4	R0258	4.5
A0148	1,947.6	1,960.1	12.5	R0258	4.5	R0260	4.0
A0149	1,960.1	1,973.1	13.0	R0260	4.0	R0262	1.5
A0150	1,973.1	1,987.7	14.6	R0262	1.5	R0263	9.6
A0151	1,987.7	2,003.9	16.2	R0263	9.6	R0265	4.8
A0152	2,003.9	2,020.0	16.1	R0265	4.8	R0267	6.9
A0153	2,020.0	2,032.7	12.7	R0267	6.9	R0268	9.6
A0154	2,032.7	2,047.8	15.1	R0268	9.6	R0272	2.2
A0155	2,047.8	2,062.2	14.4	R0272	2.2	R0273	7.6
A0156	2,062.2	2,077.0	14.8	R0273	7.6	R0275	9.4
A0157	2,077.0	2,088.8	11.8	R0275	9.4	R0277	0.2
A0158	2,088.8	2,102.6	13.8	R0277	0.2	R0278	3.5
A0159	2,102.6	2,115.2	12.6	R0278	3.5	R0279	5.6
A0160	2,115.2	2,128.9	13.7	R0279	5.6	R0280	8.8
A0161	2,128.9	2,143.1	14.2	R0280	8.8	R0282	6.5
A0162	2,143.1	2,155.5	12.4	R0282	6.5	R0283	8.4
A0163	2,155.5	2,167.1	11.6	R0283	8.4	R0284	9.5
A0164	2,167.1	2,179.8	12.7	R0285	0.0	R0287	1.7
A0165	2,179.8	2,196.2	16.4	R0287	1.7	R0290	2.1
A0166	2,196.2	2,208.8	12.6	R0290	2.1	R0291	7.2
A0167	2,208.8	2,224.7	15.9	R0291	7.2	R0294	6.6
A0168	2,224.7	2,237.3	12.6	R0294	6.6	R0295	10.2

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0169	2,237.3	2,250.0	12.7	R0295	10.2	R0297	1.9
A0170	2,250.0	2,261.9	11.9	R0297	1.9	R0298	3.3
A0171	2,261.9	2,274.7	12.8	R0298	3.3	R0299	8.6
A0172	2,274.7	2,288.3	13.6	R0299	8.6	R0301	1.7
A0173	2,288.3	2,301.3	13.0	R0301	1.7	R0302	6.2
A0174	2,301.3	2,314.7	13.4	R0302	6.2	R0303	9.6
A0175	2,314.7	2,326.9	12.2	R0303	9.6	R0305	7.3
A0176	2,326.9	2,339.1	12.2	R0305	7.3	R0306	10.5
A0177	2,339.1	2,351.4	12.3	R0307	0.0	R0308	1.8
A0178	2,351.4	2,363.6	12.2	R0308	1.8	R0310	1.5
A0179	2,363.6	2,375.0	11.4	R0310	1.5	R0311	4.4
A0180	2,375.0	2,389.4	14.4	R0311	4.4	R0313	3.3
A0181	2,389.4	2,401.1	11.7	R0313	3.3	R0314	5.0
A0182	2,401.1	2,415.7	14.6	R0314	5.0	R0317	5.1
A0183	2,415.7	2,428.7	13.0	R0317	5.1	R0318	10.1
A0184	2,428.7	2,441.0	12.3	R0318	10.1	R0320	3.9
A0185	2,441.0	2,453.6	12.6	R0320	3.9	R0321	6.0
A0186	2,453.6	2,464.7	11.1	R0321	6.0	R0322	6.6
A0187	2,464.7	2,482.9	18.2	R0322	6.6	R0327	4.3
A0188	2,482.9	2,495.4	12.5	R0327	4.3	R0328	6.3
A0189	2,495.4	2,508.0	12.6	R0328	6.3	R0330	0.9
A0190	2,508.0	2,522.5	14.5	R0330	0.9	R0331	5.4
A0191	2,522.5	2,534.0	11.5	R0331	5.4	R0332	7.9
A0192	2,534.0	2,544.7	10.7	R0332	7.9	R0333	9.6
A0193	2,544.7	2,557.6	12.9	R0333	9.6	R0335	2.5
A0194	2,557.6	2,570.6	13.0	R0335	2.5	R0336	7.5
A0195	2,570.6	2,583.6	13.0	R0336	7.5	R0337	10.0
A0196	2,583.6	2,593.6	10.0	R0337	10.0	R0339	1.5
A0197	2,593.6	2,605.4	11.8	R0339	1.5	R0340	3.3
A0198	2,605.4	2,617.5	12.1	R0340	3.3	R0341	4.9
A0199	2,617.5	2,629.3	11.8	R0341	4.9	R0342	6.7
A0200	2,629.3	2,641.4	12.1	R0342	6.7	R0344	1.8
A0201	2,641.4	2,654.4	13.0	R0344	1.8	R0345	4.3
A0202	2,654.4	2,666.4	12.0	R0345	4.3	R0346	6.3
A0203	2,666.4	2,679.1	12.7	R0346	6.3	R0347	9.0
A0204	2,679.1	2,692.4	13.3	R0347	9.0	R0350	2.8
A0205	2,692.4	2,704.7	12.3	R0350	2.8	R0351	5.1
A0206	2,704.7	2,717.7	13.0	R0351	5.1	R0352	8.1
A0207	2,717.7	2,730.5	12.8	R0352	8.1	R0354	2.9
A0208	2,730.5	2,742.6	12.1	R0354	2.9	R0355	4.5
A0209	2,742.6	2,753.9	11.3	R0355	4.5	R0356	5.8
A0210	2,753.9	2,766.0	12.1	R0356	5.8	R0357	7.9
A0211	2,766.0	2,778.6	12.6	R0357	7.9	R0358	10.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0212	2,778.6	2,790.0	11.4	R0358	10.0	R0360	0.9
A0213	2,790.0	2,802.4	12.4	R0360	0.9	R0361	3.3
A0214	2,802.4	2,815.2	12.8	R0361	3.3	R0363	2.1
A0215	2,815.2	2,826.9	11.7	R0363	2.1	R0364	3.8
A0216	2,826.9	2,842.6	15.7	R0364	3.8	R0368	0.0
A0217	2,842.6	2,859.1	16.5	R0368	0.0	R0372	4.5
A0218	2,859.1	2,875.1	16.0	R0372	4.5	R0375	0.0
A0219	2,875.1	2,890.8	15.7	R0375	0.0	R0377	0.2
A0220	2,890.8	2,903.0	12.2	R0377	0.2	R0378	1.9
A0221	2,903.0	2,914.3	11.3	R0378	1.9	R0379	3.2
A0222	2,914.3	2,926.1	11.8	R0379	3.2	R0380	4.5
A0223	2,926.1	2,938.7	12.6	R0380	4.5	R0381	6.6
A0224	2,938.7	2,948.5	9.8	R0381	6.6	R0382	6.4
A0225	2,948.5	2,963.7	15.2	R0382	6.4	R0384	0.6
A0226	2,963.7	2,977.3	13.6	R0384	0.6	R0385	5.2
A0227	2,977.3	2,991.1	13.8	R0385	5.2	R0387	2.0
A0228	2,991.1	3,006.6	15.5	R0387	2.0	R0389	4.5
A0229	3,006.6	3,025.5	18.9	R0390	0.0	R0392	6.4
A0230	3,025.5	3,038.1	12.6	R0392	6.4	R0393	9.0
A0231	3,038.1	3,049.7	11.6	R0394	0.0	R0395	1.6
A0232	3,049.7	3,062.0	12.3	R0395	1.6	R0396	3.4
A0233	3,062.0	3,074.3	12.3	R0396	3.4	R0397	5.7
A0234	3,074.3	3,087.0	12.7	R0397	5.7	R0398	7.9
A0235	3,087.0	3,099.1	12.1	R0398	7.9	R0399	10.0
A0236	3,099.1	3,111.7	12.6	R0399	10.0	R0401	2.1
A0237	3,111.7	3,124.5	12.8	R0401	2.1	R0402	4.4
A0238	3,124.5	3,137.0	12.5	R0402	4.4	R0403	6.4
A0239	3,137.0	3,148.7	11.7	R0403	6.4	R0404	9.6
A0240	3,148.7	3,162.4	13.7	R0404	9.6	R0406	7.3
A0241	3,162.4	3,174.5	12.1	R0406	7.3	R0407	9.4
A0242	3,174.5	3,185.9	11.4	R0407	9.4	R0409	0.8
A0243	3,185.9	3,198.4	12.5	R0409	0.8	R0410	3.3
A0244	3,198.4	3,210.4	12.0	R0410	3.3	R0411	5.3
A0245	3,210.4	3,222.1	11.7	R0411	5.3	R0412	7.0
A0246	3,222.1	3,233.6	11.5	R0412	7.0	R0413	8.5
A0247	3,233.6	3,245.6	12.0	R0413	8.5	R0415	0.5
A0248	3,245.6	3,257.5	11.9	R0415	0.5	R0416	2.4
A0249	3,257.5	3,269.1	11.6	R0416	2.4	R0418	1.0
A0250	3,269.1	3,281.6	12.5	R0418	1.0	R0419	3.0
A0251	3,281.6	3,297.1	15.5	R0419	3.0	R0420	9.5
A0252	3,297.1	3,314.7	17.6	R0420	9.5	R0422	8.1
A0253	3,314.7	3,326.9	12.2	R0422	8.1	R0424	1.8
A0254	3,326.9	3,340.0	13.1	R0424	1.8	R0425	4.9

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0255	3,340.0	3,352.5	12.5	R0425	4.9	R0426	7.4
A0256	3,352.5	3,364.9	12.4	R0426	7.4	R0427	9.8
A0257	3,364.9	3,377.1	12.2	R0427	9.8	R0429	2.0
A0258	3,377.1	3,388.8	11.7	R0429	2.0	R0430	3.7
A0259	3,388.8	3,402.0	13.2	R0430	3.7	R0431	6.9
A0260	3,402.0	3,413.8	11.8	R0431	6.9	R0433	3.7
A0261	3,413.8	3,425.9	12.1	R0433	3.7	R0434	5.8
A0262	3,425.9	3,437.9	12.0	R0434	5.8	R0435	7.8
A0263	3,437.9	3,449.4	11.5	R0435	7.8	R0436	8.8
A0264	3,449.4	3,463.3	13.9	R0436	8.8	R0438	9.2
A0265	3,463.3	3,478.2	14.9	R0438	9.2	R0441	6.6
A0266	3,478.2	3,490.6	12.4	R0441	6.6	R0442	8.5
A0267	3,490.6	3,503.1	12.5	R0442	8.5	R0444	3.0
A0268	3,503.1	3,514.1	11.0	R0444	3.0	R0445	4.0
A0269	3,514.1	3,526.2	12.1	R0445	4.0	R0446	6.1
A0270	3,526.2	3,539.4	13.2	R0446	6.1	R0447	8.3
A0271	3,539.4	3,553.4	14.0	R0447	8.3	R0450	2.3
A0272	3,553.4	3,566.1	12.7	R0450	2.3	R0451	4.5
A0273	3,566.1	3,579.1	13.0	R0451	4.5	R0452	8.0
A0274	3,579.1	3,591.1	12.0	R0452	8.0	R0454	1.0
A0275	3,591.1	3,603.2	12.1	R0454	1.0	R0455	8.6
A0276	3,603.2	3,617.1	13.9	R0455	8.6	R0457	2.0
A0277	3,617.1	3,637.3	20.2	R0457	2.0	R0462	2.2
A0278	3,637.3	3,651.8	14.5	R0462	2.2	R0466	5.7
A0279	3,651.8	3,673.5	21.7	R0466	5.7	R0471	0.4
A0280	3,673.5	3,699.5	26.0	R0471	0.4	R0476	1.4
A0281	3,699.5	3,733.1	33.6	R0476	1.4	R0484	2.0
A0282	3,733.1	4,031.6	298.5	R0484	2.0	R0489	6.0
A0283	4,031.6	4,059.1	27.5	R0490	0.0	R0496	6.0
A0284	4,059.1	4,143.1	84.0	R0497	0.0	R0501	8.0
A0285	4,143.1	4,156.6	13.5	R0501	8.0	R0503	1.5
A0286	4,156.6	4,169.7	13.1	R0503	1.5	R0504	4.6
A0287	4,169.7	4,183.1	13.4	R0504	4.6	R0505	8.0
A0288	4,183.1	4,194.7	11.6	R0505	8.0	R0507	1.6
A0289	4,194.7	4,207.0	12.3	R0507	1.6	R0508	3.9
A0290	4,207.0	4,220.0	13.0	R0508	3.9	R0509	6.4
A0291	4,220.0	4,231.5	11.5	R0509	6.4	R0510	7.4
A0292	4,231.5	4,242.1	10.6	R0510	7.4	R0511	10.0
A0293	4,242.1	4,252.4	10.3	R0512	0.0	R0513	0.3
A0294	4,252.4	4,264.2	11.8	R0513	0.3	R0514	2.1
A0295	4,264.2	4,275.2	11.0	R0514	2.1	R0515	3.1
A0296	4,275.2	4,286.6	11.4	R0515	3.1	R0516	4.5
A0297	4,286.6	4,298.3	11.7	R0516	4.5	R0517	6.2

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0298	4,298.3	4,309.9	11.6	R0517	6.2	R0518	7.8
A0299	4,309.9	4,321.5	11.6	R0518	7.8	R0519	9.4
A0300	4,321.5	4,334.1	12.6	R0519	9.4	R0521	1.0
A0301	4,334.1	4,346.0	11.9	R0521	1.0	R0522	2.9
A0302	4,346.0	4,358.1	12.1	R0522	2.9	R0523	5.0
A0303	4,358.1	4,369.5	11.4	R0523	5.0	R0524	6.4
A0304	4,369.5	4,381.1	11.6	R0524	6.4	R0525	10.0
A0305	4,381.1	4,392.8	11.7	R0526	0.0	R0527	1.7
A0306	4,392.8	4,403.7	10.9	R0527	1.7	R0528	2.6
A0307	4,403.7	4,414.6	10.9	R0528	2.6	R0529	3.5
A0308	4,414.6	4,426.3	11.7	R0529	3.5	R0530	4.7
A0309	4,426.3	4,438.7	12.4	R0530	4.7	R0531	6.6
A0310	4,438.7	4,450.3	11.6	R0531	6.6	R0532	8.2
A0311	4,450.3	4,462.1	11.8	R0532	8.2	R0534	1.0
A0312	4,462.1	4,472.6	10.5	R0534	1.0	R0535	1.0
A0313	4,472.6	4,483.3	10.7	R0535	1.0	R0536	1.2
A0314	4,483.3	4,514.8	31.5	R0536	1.2	R0539	2.2
A0315	4,514.8	4,524.4	9.6	R0539	2.2	R0540	6.3
A0316	4,524.4	4,536.2	11.8	R0540	6.3	R0541	8.1
A0317	4,536.2	4,548.2	12.0	R0541	8.1	R0542	10.1
A0318	4,548.2	4,560.6	12.4	R0542	10.1	R0544	1.5
A0319	4,560.6	4,572.7	12.1	R0544	1.5	R0545	5.6
A0320	4,572.7	4,584.7	12.0	R0545	5.6	R0546	7.6
A0321	4,584.7	4,595.6	10.9	R0546	7.6	R0547	8.5
A0322	4,595.6	4,608.1	12.5	R0547	8.5	R0548	10.5
A0323	4,608.1	4,618.8	10.7	R0548	10.5	R0551	2.7
A0324	4,618.8	4,629.6	10.8	R0551	2.7	R0552	10.0
A0325	4,629.6	4,640.1	10.5	R0552	10.0	R0553	10.5
A0326	4,640.1	4,652.5	12.4	R0554	0.0	R0555	2.4
A0327	4,652.5	4,664.9	12.4	R0555	2.4	R0556	4.8
A0328	4,664.9	4,677.1	12.2	R0556	4.8	R0557	7.0
A0329	4,677.1	4,689.3	12.2	R0557	7.0	R0558	9.2
A0330	4,689.3	4,701.1	11.8	R0558	9.2	R0560	0.5
A0331	4,701.1	4,714.0	12.9	R0560	0.5	R0561	2.9
A0332	4,714.0	4,726.3	12.3	R0561	2.9	R0562	5.2
A0333	4,726.3	4,737.8	11.5	R0562	5.2	R0564	0.7
A0334	4,737.8	4,750.3	12.5	R0564	0.7	R0565	3.2
A0335	4,750.3	4,763.4	13.1	R0565	3.2	R0566	8.3
A0336	4,763.4	4,775.8	12.4	R0566	8.3	R0568	0.7
A0337	4,775.8	4,788.1	12.3	R0568	0.7	R0569	3.0
A0338	4,788.1	4,800.5	12.4	R0569	3.0	R0570	5.4
A0339	4,800.5	4,812.6	12.1	R0570	5.4	R0571	7.5
A0340	4,812.6	4,825.1	12.5	R0571	7.5	R0572	10.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0341	4,825.1	4,837.3	12.2	R0573	0.0	R0574	2.2
A0342	4,837.3	4,850.2	12.9	R0574	2.2	R0575	5.1
A0343	4,850.2	4,861.6	11.4	R0575	5.1	R0577	2.0
A0344	4,861.6	4,873.7	12.1	R0577	2.0	R0578	7.6
A0345	4,873.7	4,884.7	11.0	R0578	7.6	R0580	1.6
A0346	4,884.7	4,894.6	9.9	R0580	1.6	R0581	2.0
A0347	4,894.6	4,905.6	11.0	R0581	2.0	R0582	3.0
A0348	4,905.6	4,916.5	10.9	R0582	3.0	R0584	0.4
A0349	4,916.5	4,928.4	11.9	R0584	0.4	R0585	2.8
A0350	4,928.4	4,940.7	12.3	R0585	2.8	R0586	4.6
A0351	4,940.7	4,953.8	13.1	R0586	4.6	R0589	3.7
A0352	4,953.8	4,965.9	12.1	R0589	3.7	R0591	5.8
A0353	4,965.9	4,978.1	12.2	R0591	5.8	R0593	2.0
A0354	4,978.1	4,990.4	12.3	R0593	2.0	R0594	8.8
A0355	4,990.4	5,001.3	10.9	R0594	8.8	R0595	9.2
A0356	5,001.3	5,012.1	10.8	R0595	9.2	R0596	10.0
A0357	5,012.1	5,022.9	10.8	R0596	10.0	R0598	3.3
A0358	5,022.9	5,033.6	10.7	R0598	3.3	R0599	3.5
A0359	5,033.6	5,044.9	11.3	R0599	3.5	R0600	4.3
A0360	5,044.9	5,056.6	11.7	R0600	4.3	R0601	5.5
A0361	5,056.6	5,066.1	9.5	R0601	5.5	R0602	7.0
A0362	5,066.1	5,077.1	11.0	R0602	7.0	R0603	8.0
A0363	5,077.1	5,091.6	14.5	R0603	8.0	R0607	0.5
A0364	5,091.6	5,114.1	22.5	R0607	0.5	R0612	0.5
A0365	5,114.1	5,124.4	10.3	R0612	0.5	R0613	3.8
A0366	5,124.4	5,138.8	14.4	R0613	3.8	R0618	0.2
A0367	5,138.8	5,149.9	11.1	R0618	0.2	R0619	0.8
A0368	5,149.9	5,162.2	12.3	R0619	0.8	R0620	3.1
A0369	5,162.2	5,173.9	11.7	R0620	3.1	R0621	4.8
A0370	5,173.9	5,185.2	11.3	R0621	4.8	R0622	6.1
A0371	5,185.2	5,196.3	11.1	R0622	6.1	R0623	7.2
A0372	5,196.3	5,206.5	10.2	R0623	7.2	R0624	7.4
A0373	5,206.5	5,218.2	11.7	R0624	7.4	R0625	8.6
A0374	5,218.2	5,229.0	10.8	R0625	8.6	R0626	8.9
A0375	5,229.0	5,239.5	10.5	R0626	8.9	R0628	1.4
A0376	5,239.5	5,250.5	11.0	R0628	1.4	R0629	2.4
A0377	5,250.5	5,261.6	11.1	R0629	2.4	R0630	3.5
A0378	5,261.6	5,272.3	10.7	R0630	3.5	R0631	4.2
A0379	5,272.3	5,283.2	10.9	R0631	4.2	R0632	5.1
A0380	5,283.2	5,296.1	12.9	R0632	5.1	R0633	8.0
A0381	5,296.1	5,307.8	11.7	R0633	8.0	R0634	9.7
A0382	5,307.8	5,318.1	10.3	R0634	9.7	R0635	10.0
A0383	5,318.1	5,329.6	11.5	R0636	0.0	R0637	3.5

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0384	5,329.6	5,339.2	9.6	R0637	3.5	R0638	3.1
A0385	5,339.2	5,350.2	11.0	R0638	3.1	R0639	4.1
A0386	5,350.2	5,360.5	10.3	R0639	4.1	R0640	4.4
A0387	5,360.5	5,371.8	11.3	R0640	4.4	R0641	5.7
A0388	5,371.8	5,383.0	11.2	R0641	5.7	R0642	6.9
A0389	5,383.0	5,394.1	11.1	R0642	6.9	R0643	8.0
A0390	5,394.1	5,403.9	9.8	R0643	8.0	R0644	7.8
A0391	5,403.9	5,414.1	10.2	R0644	7.8	R0645	8.0
A0392	5,414.1	5,426.5	12.4	R0646	0.0	R0647	2.4
A0393	5,426.5	5,437.3	10.8	R0647	2.4	R0648	3.2
A0394	5,437.3	5,448.6	11.3	R0648	3.2	R0649	4.5
A0395	5,448.6	5,460.4	11.8	R0649	4.5	R0650	8.3
A0396	5,460.4	5,470.5	10.1	R0650	8.3	R0651	8.4
A0397	5,470.5	5,482.1	11.6	R0651	8.4	R0652	10.0
A0398	5,482.1	5,494.3	12.2	R0653	0.0	R0654	2.2
A0399	5,494.3	5,506.1	11.8	R0654	2.2	R0655	4.0
A0400	5,506.1	5,518.3	12.2	R0655	4.0	R0656	8.2
A0401	5,518.3	5,530.1	11.8	R0656	8.2	R0657	10.0
A0402	5,530.1	5,541.2	11.1	R0658	0.0	R0659	1.1
A0403	5,541.2	5,553.4	12.2	R0659	1.1	R0660	3.3
A0404	5,553.4	5,565.5	12.1	R0660	3.3	R0661	5.4
A0405	5,565.5	5,585.7	20.2	R0661	5.4	R0663	7.6
A0406	5,585.7	5,598.3	12.6	R0663	7.6	R0664	9.2
A0407	5,598.3	5,610.3	12.0	R0664	9.2	R0666	1.2
A0408	5,610.3	5,623.0	12.7	R0666	1.2	R0667	5.9
A0409	5,623.0	5,635.5	12.5	R0667	5.9	R0668	8.4
A0410	5,635.5	5,647.1	11.6	R0668	8.4	R0669	10.0
A0411	5,647.1	5,658.5	11.4	R0670	0.0	R0671	0.9
A0412	5,658.5	5,670.2	11.7	R0671	0.9	R0672	2.6
A0413	5,670.2	5,682.1	11.9	R0672	2.6	R0673	4.0
A0414	5,682.1	5,694.5	12.4	R0673	4.0	R0674	6.4
A0415	5,694.5	5,706.4	11.9	R0674	6.4	R0675	8.3
A0416	5,706.4	5,718.3	11.9	R0675	8.3	R0676	10.2
A0417	5,718.3	5,729.6	11.3	R0676	10.2	R0678	3.5
A0418	5,729.6	5,742.3	12.7	R0678	3.5	R0679	5.7
A0419	5,742.3	5,754.8	12.5	R0679	5.7	R0680	7.7
A0420	5,754.8	5,766.8	12.0	R0680	7.7	R0681	9.7
A0421	5,766.8	5,779.0	12.2	R0681	9.7	R0683	1.4
A0422	5,779.0	5,791.1	12.1	R0683	1.4	R0684	4.0
A0423	5,791.1	5,802.7	11.6	R0684	4.0	R0685	5.6
A0424	5,802.7	5,815.0	12.3	R0685	5.6	R0686	7.9
A0425	5,815.0	5,827.6	12.6	R0686	7.9	R0687	10.5
A0426	5,827.6	5,840.3	12.7	R0688	0.0	R0689	4.2

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0427	5,840.3	5,852.9	12.6	R0689	4.2	R0690	6.8
A0428	5,852.9	5,864.6	11.7	R0690	6.8	R0691	8.5
A0429	5,864.6	5,874.1	9.5	R0691	8.5	R0693	2.0
A0430	5,874.1	5,885.4	11.3	R0693	2.0	R0694	7.3
A0431	5,885.4	5,896.9	11.5	R0694	7.3	R0696	8.3
A0432	5,896.9	5,908.5	11.6	R0696	8.3	R0698	0.4
A0433	5,908.5	5,921.1	12.6	R0698	0.4	R0699	2.5
A0434	5,921.1	5,933.8	12.7	R0699	2.5	R0700	4.7
A0435	5,933.8	5,946.3	12.5	R0700	4.7	R0701	7.2
A0436	5,946.3	5,958.8	12.5	R0701	7.2	R0702	9.7
A0437	5,958.8	5,971.1	12.3	R0702	9.7	R0704	2.0
A0438	5,971.1	5,991.6	20.5	R0704	2.0	R0705	11.5
A0439	5,991.6	6,004.5	12.9	R0705	11.5	R0706	2.9
A0440	6,004.5	6,017.5	13.0	R0706	2.9	R0706	15.9
A0441	6,017.5	6,028.8	11.3	R0706	15.9	R0707	10.7
A0442	6,028.8	6,041.5	12.7	R0707	10.7	R0708	1.9
A0443	6,041.5	6,054.3	12.8	R0708	1.9	R0708	14.7
A0444	6,054.3	6,066.5	12.2	R0708	14.7	R0709	5.4
A0445	6,066.5	6,079.4	12.9	R0709	5.4	R0709	18.3
A0446	6,079.4	6,092.5	13.1	R0709	18.3	R0710	9.9
A0447	6,092.5	6,105.3	12.8	R0710	9.9	R0711	1.2
A0448	6,105.3	6,118.5	13.2	R0711	1.2	R0711	14.4
A0449	6,118.5	6,130.8	12.3	R0711	14.4	R0712	7.2
A0450	6,130.8	6,143.8	13.0	R0712	7.2	R0712	20.2
A0451	6,143.8	6,156.6	12.8	R0712	20.2	R0713	11.5
A0452	6,156.6	6,169.4	12.8	R0713	11.5	R0714	2.8
A0453	6,169.4	6,182.3	12.9	R0714	2.8	R0714	15.7
A0454	6,182.3	6,193.6	11.3	R0714	15.7	R0715	8.0
A0455	6,193.6	6,204.0	10.4	R0715	8.0	R0716	3.4
A0456	6,204.0	6,216.9	12.9	R0716	3.4	R0716	16.3
A0457	6,216.9	6,229.9	13.0	R0716	16.3	R0717	9.8
A0458	6,229.9	6,242.7	12.8	R0717	9.8	R0718	1.1
A0459	6,242.7	6,255.5	12.8	R0718	1.1	R0718	13.9
A0460	6,255.5	6,268.2	12.7	R0718	13.9	R0719	5.1
A0461	6,268.2	6,281.4	13.2	R0719	5.1	R0719	18.3
A0462	6,281.4	6,293.5	12.1	R0719	18.3	R0720	8.9
A0463	6,293.5	6,306.6	13.1	R0720	8.9	R0721	1.0
A0464	6,306.6	6,319.4	12.8	R0721	1.0	R0722	9.8
A0465	6,319.4	6,332.1	12.7	R0722	9.8	R0723	3.0
A0466	6,332.1	6,345.1	13.0	R0723	3.0	R0723	16.0
A0467	6,345.1	6,357.5	12.4	R0723	16.0	R0724	7.4
A0468	6,357.5	6,370.6	13.1	R0724	7.4	R0724	20.5
A0469	6,370.6	6,382.6	12.0	R0724	20.5	R0725	11.5

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0470	6,382.6	6,395.4	12.8	R0725	11.5	R0726	2.8
A0471	6,395.4	6,408.4	13.0	R0726	2.8	R0726	15.8
A0472	6,408.4	6,421.1	12.7	R0726	15.8	R0727	7.0
A0473	6,421.1	6,434.1	13.0	R0727	7.0	R0727	20.0
A0474	6,434.1	6,446.9	12.8	R0727	20.0	R0728	11.3
A0475	6,446.9	6,459.3	12.4	R0728	11.3	R0729	4.2
A0476	6,459.3	6,471.2	11.9	R0729	4.2	R0731	1.1
A0477	6,471.2	6,483.4	12.2	R0731	1.1	R0732	10.3
A0478	6,483.4	6,496.0	12.6	R0732	10.3	R0733	1.9
A0479	6,496.0	6,509.4	13.4	R0733	1.9	R0733	15.3
A0480	6,509.4	6,521.4	12.0	R0733	15.3	R0734	5.8
A0481	6,521.4	6,533.3	11.9	R0734	5.8	R0735	7.7
A0482	6,533.3	6,545.5	12.2	R0735	7.7	R0737	1.9
A0483	6,545.5	6,557.2	11.7	R0737	1.9	R0738	7.1
A0484	6,557.2	6,568.0	10.8	R0738	7.1	R0740	4.9
A0485	6,568.0	6,580.7	12.7	R0740	4.9	R0740	17.6
A0486	6,580.7	6,591.4	10.7	R0740	17.6	R0741	7.3
A0487	6,591.4	6,604.1	12.7	R0741	7.3	R0741	20.0
A0488	6,604.1	6,614.6	10.5	R0741	20.0	R0743	0.0
A0489	6,614.6	6,627.5	12.9	R0743	0.0	R0743	12.9
A0490	6,627.5	6,640.3	12.8	R0743	12.9	R0744	4.2
A0491	6,640.3	6,653.4	13.1	R0744	4.2	R0744	17.3
A0492	6,653.4	6,665.8	12.4	R0744	17.3	R0745	8.2
A0493	6,665.8	6,678.8	13.0	R0745	8.2	R0745	21.2
A0494	6,678.8	6,691.4	12.6	R0745	21.2	R0746	12.8
A0495	6,691.4	6,703.4	12.0	R0746	12.8	R0747	5.8
A0496	6,703.4	6,716.5	13.1	R0747	5.8	R0747	18.9
A0497	6,716.5	6,726.9	10.4	R0747	18.9	R0748	10.8
A0498	6,726.9	6,738.0	11.1	R0748	10.8	R0749	0.4
A0499	6,738.0	6,749.7	11.7	R0749	0.4	R0749	12.1
A0500	6,749.7	6,764.1	14.4	R0749	12.1	R0750	11.0
A0501	6,764.1	6,775.1	11.0	R0750	11.0	R0751	0.5
A0502	6,775.1	6,787.7	12.6	R0751	0.5	R0751	13.1
A0503	6,787.7	6,801.2	13.5	R0751	13.1	R0752	7.1
A0504	6,801.2	6,813.6	12.4	R0752	7.1	R0752	19.5
A0505	6,813.6	6,825.7	12.1	R0752	19.5	R0753	9.6
A0506	6,825.7	6,838.1	12.4	R0753	9.6	R0754	0.5
A0507	6,838.1	6,850.9	12.8	R0754	0.5	R0754	13.3
A0508	6,850.9	6,863.0	12.1	R0754	13.3	R0755	3.9
A0509	6,863.0	6,875.9	12.9	R0755	3.9	R0756	5.8
A0510	6,875.9	6,887.5	11.6	R0756	5.8	R0757	2.4
A0511	6,887.5	6,900.8	13.3	R0757	2.4	R0757	15.7
A0512	6,900.8	6,912.6	11.8	R0757	15.7	R0758	6.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0513	6,912.6	6,923.3	10.7	R0758	6.0	R0759	2.2
A0514	6,923.3	6,936.5	13.2	R0759	2.2	R0759	15.4
A0515	6,936.5	6,948.1	11.6	R0759	15.4	R0760	7.5
A0516	6,948.1	6,960.1	12.0	R0760	7.5	R0761	6.5
A0517	6,960.1	6,973.7	13.6	R0761	6.5	R0762	12.6
A0518	6,973.7	6,985.6	11.9	R0762	12.6	R0763	7.5
A0519	6,985.6	6,998.7	13.1	R0763	7.5	R0764	3.1
A0520	6,998.7	7,012.1	13.4	R0764	3.1	R0764	16.5
A0521	7,012.1	7,025.3	13.2	R0765	0.0	R0765	13.2
A0522	7,025.3	7,036.9	11.6	R0765	13.2	R0766	4.3
A0523	7,036.9	7,049.4	12.5	R0766	4.3	R0767	5.8
A0524	7,049.4	7,062.5	13.1	R0767	5.8	R0767	18.9
A0525	7,062.5	7,075.6	13.1	R0767	18.9	R0768	10.5
A0526	7,075.6	7,088.5	12.9	R0768	10.5	R0769	1.9
A0527	7,088.5	7,101.5	13.0	R0769	1.9	R0769	14.9
A0528	7,101.5	7,114.1	12.6	R0769	14.9	R0770	6.0
A0529	7,114.1	7,127.1	13.0	R0770	6.0	R0770	19.0
A0530	7,127.1	7,139.8	12.7	R0770	19.0	R0771	10.2
A0531	7,139.8	7,152.4	12.6	R0771	10.2	R0772	1.3
A0532	7,152.4	7,165.4	13.0	R0772	1.3	R0772	14.3
A0533	7,165.4	7,177.6	12.2	R0772	14.3	R0773	5.5
A0534	7,177.6	7,190.8	13.2	R0773	5.5	R0774	4.2
A0535	7,190.8	7,204.0	13.2	R0774	4.2	R0774	17.4
A0536	7,204.0	7,216.6	12.6	R0774	17.4	R0775	8.5
A0537	7,216.6	7,229.6	13.0	R0775	8.5	R0775	21.5
A0538	7,229.6	7,242.5	12.9	R0776	0.0	R0776	12.9
A0539	7,242.5	7,255.2	12.7	R0776	12.9	R0777	4.1
A0540	7,255.2	7,268.4	13.2	R0777	4.1	R0777	17.3
A0541	7,268.4	7,281.0	12.6	R0777	17.3	R0778	8.4
A0542	7,281.0	7,293.6	12.6	R0778	8.4	R0778	21.0
A0543	7,293.6	7,305.8	12.2	R0778	21.0	R0779	11.7
A0544	7,305.8	7,318.4	12.6	R0779	11.7	R0780	2.8
A0545	7,318.4	7,331.5	13.1	R0780	2.8	R0780	15.9
A0546	7,331.5	7,343.8	12.3	R0780	15.9	R0781	7.2
A0547	7,343.8	7,356.9	13.1	R0781	7.2	R0781	20.3
A0548	7,356.9	7,369.3	12.4	R0781	20.3	R0783	3.2
A0549	7,369.3	7,382.0	12.7	R0783	3.2	R0783	15.9
A0550	7,382.0	7,395.0	13.0	R0783	15.9	R0784	9.9
A0551	7,395.0	7,407.1	12.1	R0784	9.9	R0786	6.5
A0552	7,407.1	7,418.5	11.4	R0786	6.5	R0787	0.9
A0553	7,418.5	7,431.4	12.9	R0787	0.9	R0787	13.8
A0554	7,431.4	7,443.5	12.1	R0787	13.8	R0789	3.4
A0555	7,443.5	7,457.9	14.4	R0789	3.4	R0790	9.8

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0556	7,457.9	7,470.1	12.2	R0790	9.8	R0791	0.5
A0557	7,470.1	7,482.8	12.7	R0791	0.5	R0791	13.2
A0558	7,482.8	7,495.7	12.9	R0791	13.2	R0792	4.6
A0559	7,495.7	7,508.0	12.3	R0792	4.6	R0793	1.9
A0560	7,508.0	7,519.5	11.5	R0793	1.9	R0794	1.9
A0561	7,519.5	7,532.5	13.0	R0794	1.9	R0795	7.4
A0562	7,532.5	7,549.4	16.9	R0795	7.4	R0797	0.3
A0563	7,549.4	7,562.4	13.0	R0797	0.3	R0798	1.3
A0564	7,562.4	7,575.2	12.8	R0798	1.3	R0798	14.1
A0565	7,575.2	7,587.3	12.1	R0798	14.1	R0799	7.2
A0566	7,587.3	7,600.2	12.9	R0799	7.2	R0799	20.1
A0567	7,600.2	7,612.8	12.6	R0799	20.1	R0800	11.2
A0568	7,612.8	7,625.4	12.6	R0800	11.2	R0801	2.3
A0569	7,625.4	7,638.6	13.2	R0801	2.3	R0801	15.5
A0570	7,638.6	7,653.4	14.8	R0801	15.5	R0803	4.3
A0571	7,653.4	7,666.3	12.9	R0803	4.3	R0805	8.2
A0572	7,666.3	7,678.9	12.6	R0805	8.2	R0807	3.3
A0573	7,678.9	7,690.2	11.3	R0807	3.3	R0808	4.1
A0574	7,690.2	7,704.1	13.9	R0808	4.1	R0809	6.5
A0575	7,704.1	7,716.8	12.7	R0809	6.5	R0814	0.2
A0576	7,716.8	7,730.7	13.9	R0814	0.2	R0814	14.1
A0577	7,730.7	7,742.6	11.9	R0814	14.1	R0815	6.0
A0578	7,742.6	7,755.2	12.6	R0816	0.0	R0817	1.1
A0579	7,755.2	7,768.8	13.6	R0817	1.1	R0819	2.7
A0580	7,768.8	7,781.4	12.6	R0819	2.7	R0819	15.3
A0581	7,781.4	7,795.1	13.7	R0819	15.3	R0820	7.5
A0582	7,795.1	7,809.1	14.0	R0820	7.5	R0821	8.0
A0583	7,809.1	7,821.4	12.3	R0821	8.0	R0822	7.8
A0584	7,821.4	7,834.7	13.3	R0822	7.8	R0822	21.1
A0585	7,834.7	7,847.6	12.9	R0822	21.1	R0823	12.5
A0586	7,847.6	7,860.5	12.9	R0823	12.5	R0824	3.4
A0587	7,860.5	7,873.6	13.1	R0824	3.4	R0824	16.5
A0588	7,873.6	7,887.3	13.7	R0824	16.5	R0825	11.2
A0589	7,887.3	7,899.8	12.5	R0825	11.2	R0826	2.2
A0590	7,899.8	7,913.0	13.2	R0826	2.2	R0826	15.4
A0591	7,913.0	7,925.1	12.1	R0826	15.4	R0827	6.0
A0592	7,925.1	7,938.3	13.2	R0827	6.0	R0828	1.2
A0593	7,938.3	7,951.6	13.3	R0828	1.2	R0828	14.5
A0594	7,951.6	7,963.8	12.2	R0828	14.5	R0829	5.7
A0595	7,963.8	7,976.4	12.6	R0829	5.7	R0829	18.3
A0596	7,976.4	7,989.4	13.0	R0829	18.3	R0830	12.8
A0597	7,989.4	8,002.3	12.9	R0830	12.8	R0831	4.2
A0598	8,002.3	8,014.9	12.6	R0831	4.2	R0831	16.8

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0599	8,014.9	8,024.6	9.7	R0831	16.8	R0832	9.5
A0600	8,024.6	8,038.0	13.4	R0832	9.5	R0833	11.9
A0601	8,038.0	8,049.3	11.3	R0833	11.9	R0834	1.7
A0602	8,049.3	8,062.4	13.1	R0834	1.7	R0834	14.8
A0603	8,062.4	8,076.7	14.3	R0834	14.8	R0835	9.6
A0604	8,076.7	8,088.2	11.5	R0835	9.6	R0836	1.1
A0605	8,088.2	8,101.1	12.9	R0836	1.1	R0836	14.0
A0606	8,101.1	8,113.8	12.7	R0836	14.0	R0837	5.2
A0607	8,113.8	8,127.0	13.2	R0837	5.2	R0837	18.4
A0608	8,127.0	8,139.9	12.9	R0837	18.4	R0838	9.8
A0609	8,139.9	8,152.6	12.7	R0838	9.8	R0839	1.0
A0610	8,152.6	8,165.6	13.0	R0839	1.0	R0839	14.0
A0611	8,165.6	8,178.8	13.2	R0839	14.0	R0840	5.7
A0612	8,178.8	8,191.0	12.2	R0840	5.7	R0841	3.9
A0613	8,191.0	8,204.0	13.0	R0841	3.9	R0841	16.9
A0614	8,204.0	8,217.4	13.4	R0841	16.9	R0842	8.3
A0615	8,217.4	8,230.5	13.1	R0842	8.3	R0842	21.4
A0616	8,230.5	8,242.9	12.4	R0842	21.4	R0843	11.8
A0617	8,242.9	8,254.4	11.5	R0843	11.8	R0844	8.3
A0618	8,254.4	8,267.5	13.1	R0844	8.3	R0844	21.4
A0619	8,267.5	8,279.8	12.3	R0844	21.4	R0845	11.7
A0620	8,279.8	8,292.8	13.0	R0845	11.7	R0846	12.2
A0621	8,292.8	8,307.4	14.6	R0846	12.2	R0847	4.8
A0622	8,307.4	8,320.5	13.1	R0847	4.8	R0847	17.9
A0623	8,320.5	8,331.9	11.4	R0847	17.9	R0848	8.8
A0624	8,331.9	8,344.3	12.4	R0848	8.8	R0849	5.2
A0625	8,344.3	8,357.4	13.1	R0849	5.2	R0849	18.3
A0626	8,357.4	8,369.9	12.5	R0849	18.3	R0850	8.8
A0627	8,369.9	8,383.0	13.1	R0850	8.8	R0850	21.9
A0628	8,383.0	8,395.5	12.5	R0850	21.9	R0851	12.4
A0629	8,395.5	8,408.4	12.9	R0851	12.4	R0852	3.3
A0630	8,408.4	8,421.5	13.1	R0852	3.3	R0852	16.4
A0631	8,421.5	8,434.1	12.6	R0852	16.4	R0853	9.0
A0632	8,434.1	8,447.1	13.0	R0853	9.0	R0853	22.0
A0633	8,447.1	8,460.0	12.9	R0854	0.0	R0854	12.9
A0634	8,460.0	8,472.0	12.0	R0854	12.9	R0855	3.9
A0635	8,472.0	8,484.6	12.6	R0855	3.9	R0855	16.5
A0636	8,484.6	8,497.6	13.0	R0855	16.5	R0856	7.5
A0637	8,497.6	8,510.2	12.6	R0856	7.5	R0857	4.1
A0638	8,510.2	8,523.1	12.9	R0857	4.1	R0857	17.0
A0639	8,523.1	8,535.4	12.3	R0857	17.0	R0858	7.3
A0640	8,535.4	8,547.8	12.4	R0858	7.3	R0858	19.7
A0641	8,547.8	8,559.0	11.2	R0858	19.7	R0859	11.9

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0642	8,559.0	8,571.7	12.7	R0859	11.9	R0860	2.6
A0643	8,571.7	8,584.4	12.7	R0860	2.6	R0860	15.3
A0644	8,584.4	8,596.0	11.6	R0860	15.3	R0862	2.9
A0645	8,596.0	8,609.9	13.9	R0862	2.9	R0863	7.8
A0646	8,609.9	8,623.0	13.1	R0863	7.8	R0863	20.9
A0647	8,623.0	8,635.8	12.8	R0863	20.9	R0864	11.7
A0648	8,635.8	8,648.0	12.2	R0864	11.7	R0865	3.9
A0649	8,648.0	8,659.1	11.1	R0865	3.9	R0866	4.0
A0650	8,659.1	8,671.5	12.4	R0866	4.0	R0867	8.4
A0651	8,671.5	8,682.1	10.6	R0867	8.4	R0868	8.0
A0652	8,682.1	8,694.1	12.0	R0869	0.0	R0871	1.5
A0653	8,694.1	8,706.9	12.8	R0871	1.5	R0871	14.3
A0654	8,706.9	8,716.7	9.8	R0871	14.3	R0872	3.6
A0655	8,716.7	8,728.4	11.7	R0872	3.6	R0873	11.3
A0656	8,728.4	8,739.3	10.9	R0873	11.3	R0875	11.2
A0657	8,739.3	8,750.4	11.1	R0875	11.2	R0876	0.3
A0658	8,750.4	8,762.8	12.4	R0876	0.3	R0877	1.7
A0659	8,762.8	8,774.8	12.0	R0877	1.7	R0878	6.7
A0660	8,774.8	8,787.1	12.3	R0878	6.7	R0879	10.0
A0661	8,787.1	8,801.2	14.1	R0879	10.0	R0882	2.1
A0662	8,801.2	8,813.0	11.8	R0882	2.1	R0883	2.4
A0663	8,813.0	8,825.1	12.1	R0883	2.4	R0885	4.5
A0664	8,825.1	8,838.2	13.1	R0885	4.5	R0885	17.6
A0665	8,838.2	8,850.8	12.6	R0885	17.6	R0886	8.2
A0666	8,850.8	8,864.0	13.2	R0886	8.2	R0886	21.4
A0667	8,864.0	8,876.1	12.1	R0886	21.4	R0887	11.5
A0668	8,876.1	8,888.9	12.8	R0887	11.5	R0888	1.8
A0669	8,888.9	8,900.7	11.8	R0888	1.8	R0888	13.6
A0670	8,900.7	8,911.2	10.5	R0888	13.6	R0889	4.1
A0671	8,911.2	8,923.5	12.3	R0889	4.1	R0889	16.4
A0672	8,923.5	8,935.7	12.2	R0889	16.4	R0890	13.6
A0673	8,935.7	8,947.4	11.7	R0890	13.6	R0891	7.3
A0674	8,947.4	8,960.5	13.1	R0891	7.3	R0891	20.4
A0675	8,960.5	8,973.2	12.7	R0891	20.4	R0892	11.1
A0676	8,973.2	8,985.4	12.2	R0892	11.1	R0893	3.3
A0677	8,985.4	8,998.5	13.1	R0893	3.3	R0893	16.4
A0678	8,998.5	9,011.5	13.0	R0893	16.4	R0894	7.4
A0679	9,011.5	9,024.3	12.8	R0894	7.4	R0894	20.2
A0680	9,024.3	9,037.3	13.0	R0894	20.2	R0895	11.2
A0681	9,037.3	9,050.0	12.7	R0895	11.2	R0896	1.9
A0682	9,050.0	9,062.3	12.3	R0896	1.9	R0896	14.2
A0683	9,062.3	9,072.4	10.1	R0896	14.2	R0897	2.3
A0684	9,072.4	9,084.1	11.7	R0897	2.3	R0898	7.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0685	9,084.1	9,095.9	11.8	R0898	7.0	R0899	9.8
A0686	9,095.9	9,109.9	14.0	R0899	9.8	R0901	7.8
A0687	9,109.9	9,121.1	11.2	R0901	7.8	R0903	4.0
A0688	9,121.1	9,133.4	12.3	R0903	4.0	R0905	4.3
A0689	9,133.4	9,145.8	12.4	R0905	4.3	R0906	4.7
A0690	9,145.8	9,157.6	11.8	R0906	4.7	R0907	8.5
A0691	9,157.6	9,170.9	13.3	R0907	8.5	R0908	12.8
A0692	9,170.9	9,183.5	12.6	R0908	12.8	R0909	4.4
A0693	9,183.5	9,196.1	12.6	R0909	4.4	R0909	17.0
A0694	9,196.1	9,208.1	12.0	R0909	17.0	R0910	7.0
A0695	9,208.1	9,221.3	13.2	R0910	7.0	R0910	20.2
A0696	9,221.3	9,234.0	12.7	R0910	20.2	R0911	10.9
A0697	9,234.0	9,245.8	11.8	R0911	10.9	R0912	1.7
A0698	9,245.8	9,258.1	12.3	R0912	1.7	R0912	14.0
A0699	9,258.1	9,269.6	11.5	R0912	14.0	R0913	3.5
A0700	9,269.6	9,282.1	12.5	R0913	3.5	R0914	2.0
A0701	9,282.1	9,292.2	10.1	R0914	2.0	R0915	0.1
A0702	9,292.2	9,305.0	12.8	R0915	0.1	R0915	12.9
A0703	9,305.0	9,315.2	10.2	R0915	12.9	R0916	9.1
A0704	9,315.2	9,326.2	11.0	R0916	9.1	R0917	2.1
A0705	9,326.2	9,338.9	12.7	R0917	2.1	R0917	14.8
A0706	9,338.9	9,351.3	12.4	R0917	14.8	R0918	5.2
A0707	9,351.3	9,364.3	13.0	R0918	5.2	R0918	18.2
A0708	9,364.3	9,376.3	12.0	R0918	18.2	R0921	4.2
A0709	9,376.3	9,389.2	12.9	R0921	4.2	R0921	17.1
A0710	9,389.2	9,402.7	13.5	R0921	17.1	R0922	10.6
A0711	9,402.7	9,415.3	12.6	R0922	10.6	R0923	1.2
A0712	9,415.3	9,428.1	12.8	R0923	1.2	R0923	14.0
A0713	9,428.1	9,440.0	11.9	R0923	14.0	R0924	9.9
A0714	9,440.0	9,452.5	12.5	R0924	9.9	R0925	0.4
A0715	9,452.5	9,465.5	13.0	R0925	0.4	R0925	13.4
A0716	9,465.5	9,478.3	12.8	R0925	13.4	R0926	4.2
A0717	9,478.3	9,491.4	13.1	R0926	4.2	R0926	17.3
A0718	9,491.4	9,504.7	13.3	R0926	17.3	R0927	10.6
A0719	9,504.7	9,516.4	11.7	R0927	10.6	R0928	0.3
A0720	9,516.4	9,529.5	13.1	R0928	0.3	R0928	13.4
A0721	9,529.5	9,542.1	12.6	R0928	13.4	R0929	4.0
A0722	9,542.1	9,555.3	13.2	R0929	4.0	R0929	17.2
A0723	9,555.3	9,567.7	12.4	R0929	17.2	R0930	7.6
A0724	9,567.7	9,580.5	12.8	R0930	7.6	R0930	20.4
A0725	9,580.5	9,592.7	12.2	R0930	20.4	R0931	10.6
A0726	9,592.7	9,603.1	10.4	R0931	10.6	R0932	0.0
A0727	9,603.1	9,614.1	11.0	R0932	0.0	R0933	4.0

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0728	9,614.1	9,626.0	11.9	R0933	4.0	R0934	2.9
A0729	9,626.0	9,639.1	13.1	R0934	2.9	R0935	5.0
A0730	9,639.1	9,652.7	13.6	R0935	5.0	R0935	18.6
A0731	9,652.7	9,663.6	10.9	R0935	18.6	R0936	7.5
A0732	9,663.6	9,676.4	12.8	R0936	7.5	R0936	20.3
A0733	9,676.4	9,686.4	10.0	R0936	20.3	R0938	3.3
A0734	9,686.4	9,697.6	11.2	R0938	3.3	R0939	3.5
A0735	9,697.6	9,710.9	13.3	R0939	3.5	R0939	16.8
A0736	9,710.9	9,722.6	11.7	R0939	16.8	R0940	6.5
A0737	9,722.6	9,735.4	12.8	R0940	6.5	R0940	19.3
A0738	9,735.4	9,746.2	10.8	R0940	19.3	R0941	10.1
A0739	9,746.2	9,756.7	10.5	R0941	10.1	R0942	6.6
A0740	9,756.7	9,766.2	9.5	R0942	6.6	R0944	1.1
A0741	9,766.2	9,777.8	11.6	R0944	1.1	R0945	1.7
A0742	9,777.8	9,790.4	12.6	R0945	1.7	R0945	14.3
A0743	9,790.4	9,800.1	9.7	R0945	14.3	R0947	5.0
A0744	9,800.1	9,811.3	11.2	R0947	5.0	R0948	3.2
A0745	9,811.3	9,822.4	11.1	R0948	3.2	R0949	8.3
A0746	9,822.4	9,831.1	8.7	R0949	8.3	R0950	7.0
A0747	9,831.1	9,841.6	10.5	R0950	7.0	R0951	11.5
A0748	9,841.6	9,852.1	10.5	R0951	11.5	R0953	3.0
A0749	9,852.1	9,863.7	11.6	R0953	3.0	R0954	1.6
A0750	9,863.7	9,875.6	11.9	R0954	1.6	R0955	1.5
A0751	9,875.6	9,885.4	9.8	R0955	1.5	R0956	1.3
A0752	9,885.4	9,898.1	12.7	R0956	1.3	R0956	14.0
A0753	9,898.1	9,910.1	12.0	R0956	14.0	R0957	5.0
A0754	9,910.1	9,920.0	9.9	R0957	5.0	R0958	3.9
A0755	9,920.0	9,931.1	11.1	R0958	3.9	R0959	1.0
A0756	9,931.1	9,944.0	12.9	R0959	1.0	R0959	13.9
A0757	9,944.0	9,956.3	12.3	R0959	13.9	R0960	4.2
A0758	9,956.3	9,968.4	12.1	R0960	4.2	R0961	6.3
A0759	9,968.4	9,981.5	13.1	R0961	6.3	R0961	19.4
A0760	9,981.5	9,995.7	14.2	R0961	19.4	R0962	11.6
A0761	9,995.7	10,008.1	12.4	R0962	11.6	R0963	4.0
A0762	10,008.1	10,020.7	12.6	R0963	4.0	R0963	16.6
A0763	10,020.7	10,032.9	12.2	R0963	16.6	R0964	6.8
A0764	10,032.9	10,045.5	12.6	R0964	6.8	R0964	19.4
A0765	10,045.5	10,056.6	11.1	R0964	19.4	R0966	3.5
A0766	10,056.6	10,069.7	13.1	R0966	3.5	R0967	6.6
A0767	10,069.7	10,081.0	11.3	R0967	6.6	R0968	5.9
A0768	10,081.0	10,092.4	11.4	R0968	5.9	R0969	7.3
A0769	10,092.4	10,103.7	11.3	R0969	7.3	R0971	0.6
A0770	10,103.7	10,114.9	11.2	R0971	0.6	R0972	4.8

ARCHIVE CORE BOX RECORD FORM

box	depth (ft bsl) top	bottom	interval	top run	depth	bottom run	depth
A0771	10,114.9	10,126.4	11.5	R0972	4.8	R0972	16.3
A0772	10,126.4	10,135.1	8.7	R0972	16.3	R0975	3.0
A0773	10,135.1	10,144.7	9.6	R0975	3.0	R0978	2.1
A0774	10,144.7	10,156.9	12.2	R0978	2.1	R0979	2.8
A0775	10,156.9	10,163.6	6.7	R0979	2.8	R0980	0.5

Hawaii Scientific Drilling Project

DIS: Data-Report **UNIT SUMMARY**

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0001	VOL	massive	sparsely-to-moderately plagioclase-olivine-phyric basalt	-5.9	5.1	11.0	B0001	R0001	0.0	B0002	R0003	0.0
U0002	VOL	aa	moderately olivine-phyric basalt	5.1	63.1	58.0	B0002	R0003	0.0	B0008	R0014	5.0
U0003	VOL	aa	highly olivine-phyric basalt	63.1	79.9	16.8	B0008	R0014	5.0	B0008	R0017	1.3
U0004	VOL	aa	highly olivine-phyric basalt	79.9	85.5	5.6	B0008	R0017	1.3	B0009	R0018	1.4
U0005	VOL	aa	highly olivine-phyric basalt	85.5	97.6	12.1	B0009	R0018	1.4	B0010	R0020	3.5
U0006	VOL	aa	highly olivine-phyric basalt	97.6	127.0	29.4	B0010	R0020	3.5	B0014	R0026	2.9
U0007	VOL	aa	highly olivine-phyric basalt	127.0	158.3	31.3	B0014	R0026	2.9	B0017	R0032	5.2
U0008	VOL	pahoehoe	moderately-to-highly olivine-phyric basalt	158.3	186.8	28.5	B0017	R0032	5.2	B0020	R0038	2.7
U0009	VOL	massive	highly olivine-phyric basalt	186.8	204.0	17.2	B0020	R0038	2.7	B0023	R0041	4.9
U0010	SED	sandstone	sandstone	204.0	205.9	1.9	B0023	R0041	4.9	B0023	R0042	1.8
U0011	VOL	pahoehoe	aphyric basalt	205.9	227.7	21.8	B0023	R0042	1.8	B0025	R0046	3.6
U0012	VOL	pahoehoe	aphyric basalt	227.7	234.1	6.4	B0025	R0046	3.6	B0026	R0047	5.0
U0013	VOL	pahoehoe	aphyric basalt	234.1	243.1	9.0	B0026	R0047	5.0	B0027	R0049	4.0
U0014	VOL	pahoehoe	sparsely olivine-phyric basalt	243.1	252.5	9.4	B0027	R0049	4.0	B0028	R0051	3.4
U0015	VOL	pahoehoe	sparsely olivine-phyric basalt	252.5	288.1	35.6	B0028	R0051	3.4	B0032	R0058	4.0
U0016	VOL	pahoehoe	aphyric to moderately olivine-phyric basalt	288.1	318.8	30.7	B0032	R0058	4.0	B0036	R0064	4.7
U0017	VOL	ash	ash	318.8	319.3	0.5	B0036	R0064	4.7	B0036	R0065	0.2
U0018	VOL	transitional	highly olivine-phyric basalt	319.3	352.1	32.8	B0036	R0065	0.2	B0040	R0071	3.0

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	bottom	thickness	top contact box	run	depth	bottom contact box	run	depth
U0019	VOL	pahoehoe	sparsely olivine-phyric basalt	352.1	430.0	77.9	B0040	R0071	3.0	B0048	R0081	8.9
U0020	VOL	pahoehoe	aphyric basalt	430.0	453.0	23.0	B0048	R0081	8.9	B0051	R0084	1.4
U0021	VOL	ash	ash	453.0	453.6	0.6	B0051	R0084	1.4	B0051	R0084	2.0
U0022	VOL	pahoehoe	moderately-to-highly olivine-plagioclase-phyric basalt	453.6	503.9	50.3	B0051	R0084	2.0	B0056	R0090	3.3
U0023	VOL	ash	soil	503.9	504.1	0.2	B0056	R0090	3.3	B0057	R0090	3.5
U0024	VOL	pahoehoe	aphyric basalt	504.1	507.3	3.2	B0057	R0090	3.5	B0057	R0090	6.7
U0025	VOL	ash	ash	507.3	507.5	0.2	B0057	R0090	6.7	B0057	R0090	6.9
U0026	VOL	pahoehoe	aphyric basalt	507.5	558.4	50.9	B0057	R0090	6.9	B0062	R0095	8.3
U0027	VOL	aa	highly olivine-phyric basalt	558.4	568.8	10.4	B0062	R0095	8.3	B0063	R0096	8.7
U0028	VOL	aa	highly olivine-phyric basalt	568.8	594.2	25.4	B0063	R0096	8.7	B0067	R0099	3.1
U0029	VOL	transitional	sparsely-to-moderately olivine-phyric basalt	594.2	617.1	22.9	B0067	R0099	3.1	B0069	R0101	5.0
U0030	VOL	aa	highly olivine-phyric basalt	617.1	617.9	0.8	B0069	R0101	5.0	B0069	R0101	5.8
U0031	VOL	aa	aphyric basalt	617.9	619.3	1.4	B0069	R0101	5.8	B0069	R0101	7.2
U0032	VOL	aa	moderately-to-highly olivine-phyric basalt	619.3	661.2	41.9	B0069	R0101	7.2	B0074	R0105	10.1
U0033	SED	soil	soil	661.2	661.8	0.6	B0074	R0105	10.1	B0074	R0106	0.7
U0034	VOL	ash	ash	661.8	662.5	0.7	B0074	R0106	0.7	B0074	R0106	1.4
U0035	VOL	aa	moderately olivine-phyric basalt	662.5	700.3	37.8	B0074	R0106	1.4	B0079	R0110	6.2
U0036	VOL	aa	highly olivine-phyric basalt	700.3	763.8	63.5	B0079	R0110	6.2	B0086	R0117	1.2
U0037	VOL	pahoehoe	moderately olivine-phyric basalt	763.8	780.8	17.0	B0086	R0117	1.2	B0087	R0118	9.2
U0038	SED	soil	soil	780.8	782.1	1.3	B0087	R0118	9.2	B0088	R0119	0.0

unit	class	type	rock name	depth (ft bsl) top	bottom	thickness	top contact box	run	depth	bottom contact box	run	depth
U0039	VOL	ash	ash	782.1	784.1	2.0	B0088	R0119	0.0	B0088	R0119	2.0
U0040	VOL	transitional	moderately olivine-phyric basalt	784.1	800.3	16.2	B0088	R0119	2.0	B0090	R0120	7.7
U0041	VOL	transitional	moderately olivine-phyric basalt	800.3	805.3	5.0	B0090	R0120	7.7	B0090	R0121	2.2
U0042	VOL	transitional	sparsely plagioclase-phyric basalt	805.3	814.8	9.5	B0090	R0121	2.2	B0091	R0122	1.2
U0043	VOL	aa	moderately olivine-phyric basalt	814.8	838.6	23.8	B0091	R0122	1.2	B0094	R0125	3.5
U0044	VOL	ash	ash	838.6	839.8	1.2	B0094	R0125	3.5	B0094	R0125	4.7
U0045	VOL	pahoehoe	aphyric basalt	839.8	844.5	4.7	B0094	R0125	4.7	B0094	R0126	0.9
U0046	VOL	pahoehoe	moderately-to-highly olivine-plagioclase-phyric basalt	844.5	864.5	20.0	B0094	R0126	0.9	B0097	R0128	0.4
U0047	VOL	aa	moderately-to-highly olivine-plagioclase-phyric basalt	864.5	884.9	20.4	B0097	R0128	0.4	B0099	R0130	2.8
U0048	VOL	aa	aphyric basalt	884.9	915.4	30.5	B0099	R0130	2.8	B0102	R0133	0.8
U0049	VOL	aa	moderately-to-highly olivine-plagioclase-phyric basalt	915.4	933.6	18.2	B0102	R0133	0.8	B0104	R0134	8.5
U0050	VOL	aa	highly olivine-phyric basalt	933.6	941.7	8.1	B0104	R0134	8.5	B0105	R0135	6.6
U0051	SED	soil	soil	941.7	945.1	3.4	B0105	R0135	6.6	B0105	R0136	0.0
U0052	VOL	aa	highly olivine-phyric basalt	945.1	952.7	7.6	B0105	R0136	0.0	B0106	R0136	7.6
U0053	VOL	aa	moderately plagioclase-olivine-phyric basalt	952.7	964.2	11.5	B0106	R0136	7.6	B0107	R0137	9.1
U0054	VOL	aa	moderately plagioclase-olivine-phyric basalt	964.2	973.7	9.5	B0107	R0137	9.1	B0108	R0138	8.6
U0055	VOL	aa	highly olivine-phyric basalt	973.7	976.8	3.1	B0108	R0138	8.6	B0109	R0139	1.7
U0056	VOL	aa	sparsely-to-moderately olivine-phyric basalt	976.8	1,016.9	40.1	B0109	R0139	1.7	B0113	R0143	1.8
U0057	VOL	aa	highly olivine-phyric basalt	1,016.9	1,035.9	19.0	B0113	R0143	1.8	B0115	R0145	2.8
U0058	VOL	aa	moderately olivine-phyric basalt	1,035.9	1,053.1	17.2	B0115	R0145	2.8	B0118	R0147	0.0

unit	class	type	rock name	depth (ft bsl) top	bottom	thickness	top contact box	run	depth	bottom contact box	run	depth
U0059	VOL	aa	aphyric to sparsely olivine-phyric basalt	1,053.1	1,064.1	11.0	B0118	R0147	0.0	B0119	R0148	1.0
U0060	VOL	aa	highly olivine-phyric basalt	1,064.1	1,080.5	16.4	B0119	R0148	1.0	B0121	R0149	5.9
U0061	VOL	pahoehoe	sparsely olivine-plagioclase-phyric basalt	1,080.5	1,085.7	5.2	B0121	R0149	5.9	B0121	R0150	0.6
U0062	VOL	pahoehoe	sparsely olivine-phyric basalt	1,085.7	1,101.1	15.4	B0121	R0150	0.6	B0123	R0151	6.0
U0063	VOL	pahoehoe	sparsely olivine-phyric basalt	1,101.1	1,118.8	17.7	B0123	R0151	6.0	B0125	R0153	3.7
U0064	VOL	ash	ash	1,118.8	1,118.9	0.1	B0125	R0153	3.7	B0125	R0153	3.8
U0065	VOL	massive	highly olivine-phyric basalt	1,118.9	1,178.6	59.7	B0125	R0153	3.8	B0131	R0159	5.5
U0066	VOL	ash	ash	1,178.6	1,179.0	0.4	B0131	R0159	5.5	B0131	R0159	5.9
U0067	VOL	aa	sparsely olivine-phyric basalt	1,179.0	1,190.1	11.1	B0131	R0159	5.9	B0132	R0162	3.5
U0068	VOL	pahoehoe	sparsely-to-moderately olivine-phyric basalt	1,190.1	1,219.0	28.9	B0132	R0162	3.5	B0135	R0165	3.9
U0069	VOL	pahoehoe	sparsely olivine-phyric basalt	1,219.0	1,223.4	4.4	B0135	R0165	3.9	B0135	R0165	8.3
U0070	VOL	pahoehoe	moderately olivine-phyric basalt	1,223.4	1,253.9	30.5	B0135	R0165	8.3	B0139	R0168	8.8
U0071	VOL	aa	highly olivine-phyric basalt	1,253.9	1,274.6	20.7	B0139	R0168	8.8	B0141	R0172	0.0
U0072	VOL	transitional	sparsely olivine-phyric basalt	1,274.6	1,291.6	17.0	B0141	R0172	0.0	B0143	R0174	1.0
U0073	VOL	transitional	highly olivine-phyric basalt	1,291.6	1,312.0	20.4	B0143	R0174	1.0	B0145	R0176	0.9
U0074	VOL	ash	ash	1,312.0	1,312.1	0.1	B0145	R0176	0.9	B0145	R0176	1.0
U0075	VOL	transitional	aphyric basalt	1,312.1	1,355.0	42.9	B0145	R0176	1.0	B0149	R0180	5.4
U0076	VOL	transitional	highly olivine-phyric basalt	1,355.0	1,390.9	35.9	B0149	R0180	5.4	B0153	R0185	2.3
U0077	VOL	aa	moderately-to-highly olivine-phryic basalt	1,390.9	1,403.5	12.6	B0153	R0185	2.3	B0154	R0186	9.9
U0078	VOL	transitional	highly olivine-phryic basalt	1,403.5	1,410.7	7.2	B0154	R0186	9.9	B0155	R0188	0.6

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0079	VOL	aa	highly olivine-phyric basalt	1,410.7	1,441.8	31.1	B0155	R0188	0.6	B0158	R0190	8.7
U0080	VOL	aa	moderately olivine-phyric basalt	1,441.8	1,466.1	24.3	B0158	R0190	8.7	B0160	R0194	2.0
U0081	VOL	aa	moderately olivine-phyric basalt	1,466.1	1,480.5	14.4	B0160	R0194	2.0	B0161	R0199	2.4
U0082	VOL	aa	moderately olivine-phyric basalt	1,480.5	1,520.5	40.0	B0161	R0199	2.4	B0166	R0203	5.9
U0083	VOL	aa	highly olivine-phyric basalt	1,520.5	1,539.1	18.6	B0166	R0203	5.9	B0168	R0206	0.0
U0084	VOL	aa	highly olivine-phyric basalt	1,539.1	1,557.2	18.1	B0168	R0206	0.0	B0169	R0207	5.1
U0085	VOL	aa	highly olivine-phyric basalt	1,557.2	1,563.6	6.4	B0169	R0207	5.1	B0170	R0208	4.0
U0086	VOL	aa	highly olivine-phyric basalt	1,563.6	1,588.6	25.0	B0170	R0208	4.0	B0173	R0210	8.0
U0087	VOL	aa	moderately-to-highly plagioclase-olivine-phyric basalt	1,588.6	1,606.1	17.5	B0173	R0210	8.0	B0174	R0212	4.0
U0088	VOL	aa	moderately-to-highly olivine-phyric basalt	1,606.1	1,624.8	18.7	B0174	R0212	4.0	B0176	R0214	1.2
U0089	VOL	pahoehoe	aphyric basalt	1,624.8	1,655.9	31.1	B0176	R0214	1.2	B0180	R0217	0.8
U0090	VOL	aa	moderately olivine-phyric basalt	1,655.9	1,672.0	16.1	B0180	R0217	0.8	B0181	R0218	6.9
U0091	VOL	aa	aphyric to sparsely olivine-phyric basalt	1,672.0	1,685.1	13.1	B0181	R0218	6.9	B0183	R0220	0.0
U0092	VOL	aa	moderately-to-highly plagioclase-olivine-phyric basalt	1,685.1	1,715.1	30.0	B0183	R0220	0.0	B0186	R0224	6.5
U0093	VOL	aa	moderately-to-highly plagioclase-olivine-phyric basalt	1,715.1	1,768.7	53.6	B0186	R0224	6.5	B0191	R0231	8.6
U0094	VOL	aa	moderately olivine-phyric basalt	1,768.7	1,784.6	15.9	B0191	R0231	8.6	B0193	R0233	4.5
U0095	VOL	pahoehoe	aphyric basalt	1,784.6	1,818.6	34.0	B0193	R0233	4.5	B0197	R0237	0.5
U0096	VOL	aa	highly olivine-phyric basalt	1,818.6	1,831.0	12.4	B0197	R0237	0.5	B0198	R0238	3.9
U0097	VOL	aa	moderately olivine-phyric basalt	1,831.0	1,838.1	7.1	B0198	R0238	3.9	B0199	R0239	1.0
U0098	VOL	aa	moderately-to-highly olivine-phyric basalt	1,838.1	1,855.1	17.0	B0199	R0239	1.0	B0200	R0241	0.0

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0099	VOL	transitional	aphyric to sparsely olivine-phyric basalt	1,855.1	1,864.9	9.8	B0200	R0241	0.0	B0201	R0242	5.3
U0100	VOL	aa	aphyric basalt	1,864.9	1,879.9	15.0	B0201	R0242	5.3	B0203	R0244	1.8
U0101	VOL	aa	sparsely olivine-phyric basalt	1,879.9	1,900.3	20.4	B0203	R0244	1.8	B0204	R0248	0.2
U0102	VOL	aa	moderately olivine-phyric basalt	1,900.3	1,912.1	11.8	B0204	R0248	0.2	B0205	R0252	0.0
U0103	VOL	aa	moderately olivine-phyric basalt	1,912.1	1,933.2	21.1	B0205	R0252	0.0	B0207	R0256	2.1
U0104	VOL	aa	aphyric to sparsely olivine-phyric basalt	1,933.2	1,961.5	28.3	B0207	R0256	2.1	B0210	R0260	5.4
U0105	VOL	aa	highly olivine-phyric basalt	1,961.5	1,975.4	13.9	B0210	R0260	5.4	B0212	R0262	3.8
U0106	VOL	aa	aphyric basalt	1,975.4	1,997.0	21.6	B0212	R0262	3.8	B0214	R0264	7.9
U0107	VOL	aa	highly olivine-phyric basalt	1,997.0	2,037.1	40.1	B0214	R0264	7.9	B0218	R0270	0.0
U0108	VOL	aa	aphyric basalt	2,037.1	2,042.5	5.4	B0218	R0270	0.0	B0218	R0271	1.4
U0109	VOL	aa	moderately olivine-phyric basalt	2,042.5	2,075.9	33.4	B0218	R0271	1.4	B0222	R0275	8.3
U0110	VOL	transitional	moderately-to-highly olivine-phyric basalt	2,075.9	2,093.3	17.4	B0222	R0275	8.3	B0224	R0277	4.7
U0111	VOL	transitional	highly olivine-phyric basalt	2,093.3	2,103.6	10.3	B0224	R0277	4.7	B0225	R0278	4.5
U0112	VOL	aa	moderately olivine-phyric basalt	2,103.6	2,108.3	4.7	B0225	R0278	4.5	B0226	R0278	9.2
U0113	VOL	transitional	highly olivine-phyric basalt	2,108.3	2,119.4	11.1	B0226	R0278	9.2	B0227	R0279	9.8
U0114	VOL	aa	highly olivine-phyric basalt	2,119.4	2,162.7	43.3	B0227	R0279	9.8	B0232	R0284	5.1
U0115	VOL	aa	moderately olivine-phyric basalt	2,162.7	2,209.6	46.9	B0232	R0284	5.1	B0237	R0291	8.0
U0116	VOL	aa	moderately olivine-phric basalt	2,209.6	2,234.9	25.3	B0237	R0291	8.0	B0239	R0295	7.8
U0117	VOL	pahoehoe	aphyric basalt	2,234.9	2,260.7	25.8	B0239	R0295	7.8	B0242	R0298	2.1
U0118	VOL	pahoehoe	moderately olivine-phyric basalt	2,260.7	2,272.3	11.6	B0242	R0298	2.1	B0243	R0299	6.2

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0119	VOL	aa	moderately-to-highly olivine-phyric basalt	2,272.3	2,315.1	42.8	B0243	R0299	6.2	B0248	R0304	0.0
U0120	VOL	aa	moderately olivine-phyric basalt	2,315.1	2,350.8	35.7	B0248	R0304	0.0	B0252	R0308	1.2
U0121	VOL	aa	highly olivine-phyric basalt	2,350.8	2,362.2	11.4	B0252	R0308	1.2	B0253	R0310	0.1
U0122	VOL	ash	ash	2,362.2	2,362.4	0.2	B0253	R0310	0.1	B0253	R0310	0.3
U0123	VOL	aa	moderately-to-highly olivine-phyric basalt	2,362.4	2,368.1	5.7	B0253	R0310	0.3	B0254	R0310	6.0
U0124	VOL	aa	moderately olivine-phyric basalt	2,368.1	2,387.1	19.0	B0254	R0310	6.0	B0256	R0313	1.0
U0125	VOL	aa	highly olivine-phyric basalt	2,387.1	2,398.3	11.2	B0256	R0313	1.0	B0258	R0314	2.2
U0126	VOL	aa	aphyric basalt	2,398.3	2,435.7	37.4	B0258	R0314	2.2	B0261	R0319	6.6
U0127	VOL	aa	moderately-to-highly olivine-phyric basalt	2,435.7	2,498.4	62.7	B0261	R0319	6.6	B0268	R0328	9.3
U0128	VOL	aa	highly olivine-phyric basalt	2,498.4	2,532.9	34.5	B0268	R0328	9.3	B0272	R0332	6.8
U0129	VOL	ash	ash	2,532.9	2,533.1	0.2	B0272	R0332	6.8	B0272	R0332	7.0
U0130	VOL	aa	sparsely-to-moderately olivine-phyric basalt	2,533.1	2,555.1	22.0	B0272	R0332	7.0	B0275	R0335	0.0
U0131	VOL	aa	moderately-to-highly olivine-phyric basalt	2,555.1	2,579.7	24.6	B0275	R0335	0.0	B0277	R0337	6.1
U0132	VOL	aa	highly olivine-phyric basalt	2,579.7	2,607.8	28.1	B0277	R0337	6.1	B0281	R0340	5.7
U0133	VOL	aa	sparsely olivine-phyric basalt	2,607.8	2,638.5	30.7	B0281	R0340	5.7	B0284	R0343	5.4
U0134	VOL	aa	sparsely olivine-phyric basalt	2,638.5	2,653.5	15.0	B0284	R0343	5.4	B0286	R0345	3.4
U0135	VOL	pahoehoe	aphryic basalt	2,653.5	2,657.8	4.3	B0286	R0345	3.4	B0287	R0345	7.7
U0136	VOL	pahoehoe	moderately olivine-phyric basalt	2,657.8	2,678.3	20.5	B0287	R0345	7.7	B0289	R0347	8.2
U0137	VOL	aa	aphyric basalt	2,678.3	2,719.3	41.0	B0289	R0347	8.2	B0294	R0352	9.7
U0138	VOL	aa	moderately olivine-phyric basalt	2,719.3	2,742.6	23.3	B0294	R0352	9.7	B0296	R0355	4.5

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U0139	VOL	pahoehoe	aphyric to highly olivine-phyric basalt	2,742.6	2,778.6	36.0	B0296	R0355	4.5	B0301	R0358	10.0
U0140	VOL	aa	moderately-to-highly olivine-phyric basalt	2,778.6	2,809.6	31.0	B0301	R0358	10.0	B0304	R0362	0.5
U0141	VOL	aa	moderately olivine-phyric basalt	2,809.6	2,827.1	17.5	B0304	R0362	0.5	B0306	R0364	4.0
U0142	VOL	aa	aphyric to sparsely olivine-phyric basalt	2,827.1	2,871.9	44.8	B0306	R0364	4.0	B0310	R0374	1.8
U0143	VOL	aa	moderately-to-highly olivine-phyric basalt	2,871.9	2,893.4	21.5	B0310	R0374	1.8	B0312	R0377	2.8
U0144	VOL	pahoehoe	aphyric to moderately olivine-phyric basalt	2,893.4	2,944.5	51.1	B0312	R0377	2.8	B0318	R0382	2.4
U0145	VOL	pahoehoe	sparsely olivine-phyric basalt	2,944.5	2,949.1	4.6	B0318	R0382	2.4	B0319	R0382	7.0
U0146	VOL	aa	highly olivine-phyric basalt	2,949.1	2,966.0	16.9	B0319	R0382	7.0	B0320	R0384	2.9
U0147	VOL	transitional	aphyric to sparsely olivine-phyric basalt	2,966.0	3,005.4	39.4	B0320	R0384	2.9	B0324	R0389	3.3
U0148	VOL	aa	moderately-to-highly olivine-phyric basalt	3,005.4	3,049.3	43.9	B0324	R0389	3.3	B0328	R0395	1.2
U0149	VOL	pahoehoe	aphyric to moderately olivine-phyric basalt	3,049.3	3,088.6	39.3	B0328	R0395	1.2	B0333	R0398	9.5
U0150	VOL	aa	highly olivine-phyric basalt	3,088.6	3,093.7	5.1	B0333	R0398	9.5	B0334	R0399	4.6
U0151	VOL	pahoehoe	highly olivine-phyric basalt	3,093.7	3,114.2	20.5	B0334	R0399	4.6	B0336	R0401	4.6
U0152	VOL	pahoehoe	aphyric to highly olivine-phyric basalt	3,114.2	3,138.8	24.6	B0336	R0401	4.6	B0339	R0403	8.2
U0153	VOL	aa	highly olivine-phyric basalt	3,138.8	3,153.1	14.3	B0339	R0403	8.2	B0340	R0405	4.0
U0154	VOL	transitional	moderately-to-highly olivine-phyric basalt	3,153.1	3,172.7	19.6	B0340	R0405	4.0	B0342	R0407	7.6
U0155	VOL	pahoehoe	aphyric to highly olivine-phyric basalt	3,172.7	3,285.1	112.4	B0342	R0407	7.6	B0355	R0419	6.5
U0156	VOL	transitional	moderately-to-highly olivine-phyric basalt	3,285.1	3,300.2	15.1	B0355	R0419	6.5	B0357	R0421	2.1
U0157	VOL	aa	aphyric basalt	3,300.2	3,337.4	37.2	B0357	R0421	2.1	B0361	R0425	2.3
U0158	VOL	pahoehoe	aphyric basalt	3,337.4	3,351.0	13.6	B0361	R0425	2.3	B0362	R0426	5.9

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U0159	VOL	pahoehoe	aphyric basalt	3,351.0	3,385.0	34.0	B0362	R0426	5.9	B0366	R0429	9.9
U0160	VOL	transitional	aphyric to sparsely olivine-phyric basalt	3,385.0	3,412.7	27.7	B0366	R0429	9.9	B0369	R0433	2.6
U0161	VOL	pahoehoe	moderately olivine-phyric basalt	3,412.7	3,430.4	17.7	B0369	R0433	2.6	B0371	R0434	10.3
U0162	VOL	pahoehoe	sparsely olivine-phyric basalt	3,430.4	3,439.3	8.9	B0371	R0434	10.3	B0372	R0435	9.2
U0163	VOL	pahoehoe	moderately olivine-phyric basalt	3,439.3	3,444.1	4.8	B0372	R0435	9.2	B0373	R0436	3.5
U0164	VOL	transitional	moderately olivine-phyric basalt	3,444.1	3,450.3	6.2	B0373	R0436	3.5	B0373	R0436	9.7
U0165	VOL	aa	sparsely olivine-plagioclase-phyric basalt	3,450.3	3,463.7	13.4	B0373	R0436	9.7	B0375	R0438	9.6
U0166	VOL	aa	sparsely olivine-phyric basalt	3,463.7	3,500.1	36.4	B0375	R0438	9.6	B0379	R0443	8.0
U0167	VOL	ash	ash	3,500.1	3,500.5	0.4	B0379	R0443	8.0	B0379	R0443	8.4
U0168	VOL	transitional	aphyric basalt	3,500.5	3,540.1	39.6	B0379	R0443	8.4	B0384	R0447	9.0
U0169	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, sparsely olivine-phyric basalt)	3,540.1	3,545.6	5.5	B0384	R0447	9.0	B0384	R0448	4.5
U0170	VOL	massive	sparsely olivine-phyric basalt	3,545.6	3,552.8	7.2	B0384	R0448	4.5	B0385	R0450	1.7
U0171	VOL	massive	highly olivine-phyric basalt	3,552.8	3,559.2	6.4	B0385	R0450	1.7	B0386	R0450	8.1
U0172	VOL	massive	aphyric basalt	3,559.2	3,564.9	5.7	B0386	R0450	8.1	B0387	R0451	3.3
U0173	SED	conglomerate	conglomerate	3,564.9	3,568.5	3.6	B0387	R0451	3.3	B0387	R0451	6.9
U0174	VOL	massive	moderately-to-highly olivine-phyric basalt	3,568.5	3,572.1	3.6	B0387	R0451	6.9	B0388	R0452	1.0
U0175	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	3,572.1	3,575.4	3.3	B0388	R0452	1.0	B0388	R0452	4.3
U0176	VOL	massive	moderately-to-highly olivine-phyric basalt	3,575.4	3,584.9	9.5	B0388	R0452	4.3	B0389	R0453	3.3
U0177	SED	sandstone	sandstone	3,584.9	3,585.2	0.3	B0389	R0453	3.3	B0389	R0453	3.6
U0178	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, aphyric basalt clasts)	3,585.2	3,594.4	9.2	B0389	R0453	3.6	B0390	R0454	4.3

UNIT SUMMARY

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U0179	VOL	massive	highly olivine-phyric basalt	3,594.4	3,606.8	12.4	B0390	R0454	4.3	B0392	R0456	1.7
U0180	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, aphyric to sparsely olivine-phyric basalt clasts)	3,606.8	3,632.1	25.3	B0392	R0456	1.7	B0394	R0459	4.0
U0181	VOL	massive	sparsely-to-moderately olivine-phyric basalt	3,632.1	3,642.4	10.3	B0394	R0459	4.0	B0395	R0465	0.3
U0182	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, sparsely olivine-phyric basalt clasts)	3,642.4	3,644.6	2.2	B0395	R0465	0.3	B0395	R0465	2.5
U0183	VOL	massive	moderately olivine-phyric basalt	3,644.6	3,648.1	3.5	B0395	R0465	2.5	B0395	R0466	2.0
U0184	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, aphyric to sparsely olivine-phyric basalt clasts)	3,648.1	3,683.1	35.0	B0395	R0466	2.0	B0398	R0472	0.0
U0185	VOL	massive	sparsely olivine-phyric basalt	3,683.1	3,695.7	12.6	B0398	R0472	0.0	B0398	R0475	0.6
U0186	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, aphyric to sparsely olivine-phyric basalt clasts)	3,695.7	3,701.4	5.7	B0398	R0475	0.6	B0399	R0476	3.3
U0187	VOL	massive	sparsely olivine-phyric basalt	3,701.4	4,012.7	311.3	B0399	R0476	3.3	B0401	R0486	0.6
U0188	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately olivine-phyric basalt clasts)	4,012.7	4,025.6	12.9	B0401	R0486	0.6	B0401	R0489	0.0
U0189	SED	sandstone	sandstone	4,025.6	4,026.1	0.5	B0401	R0489	0.0	B0401	R0489	0.5
U0190	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately-to-highly olivine-phyric basalt clasts)	4,026.1	4,135.6	109.5	B0401	R0489	0.5	B0404	R0501	0.5
U0191	VOL	massive	highly olivine-phyric basalt	4,135.6	4,211.2	75.6	B0404	R0501	0.5	B0412	R0508	8.1
U0192	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	4,211.2	4,217.0	5.8	B0412	R0508	8.1	B0413	R0509	3.4
U0193	VOL	massive	highly olivine-phyric basalt	4,217.0	4,222.6	5.6	B0413	R0509	3.4	B0413	R0509	9.0
U0194	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	4,222.6	4,300.7	78.1	B0413	R0509	9.0	B0422	R0517	8.6
U0195	VOL	massive	highly olivine-phyric basalt	4,300.7	4,308.1	7.4	B0422	R0517	8.6	B0423	R0518	6.0
U0196	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	4,308.1	4,377.2	69.1	B0423	R0518	6.0	B0431	R0525	6.1
U0197	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly aphyric basalt clasts)	4,377.2	4,382.2	5.0	B0431	R0525	6.1	B0432	R0526	1.1
U0198	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately-to-highly olivine-phyric basalt clasts)	4,382.2	4,605.9	223.7	B0432	R0526	1.1	B0456	R0548	8.3

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U0199	VOL	massive	highly olivine-phyric basalt	4,605.9	4,621.3	15.4	B0456	R0548	8.3	B0458	R0552	1.7
U0200	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-rich basalt clasts)	4,621.3	4,625.2	3.9	B0458	R0552	1.7	B0458	R0552	5.6
U0201	VOL	massive	moderately-to-highly olivine-phyric basalt	4,625.2	4,639.0	13.8	B0458	R0552	5.6	B0460	R0553	9.4
U0202	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	4,639.0	4,871.7	232.7	B0460	R0553	9.4	B0486	R0578	5.6
U0203	VOL	massive	highly olivine-phyric basalt	4,871.7	4,876.1	4.4	B0486	R0578	5.6	B0487	R0578	10.0
U0204	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly highly olivine-phyric basalt clasts)	4,876.1	4,904.4	28.3	B0487	R0578	10.0	B0491	R0582	1.8
U0205	VOL	massive	highly olivine-phyric basalt	4,904.4	4,910.3	5.9	B0491	R0582	1.8	B0492	R0582	7.7
U0206	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	4,910.3	4,912.1	1.8	B0492	R0582	7.7	B0492	R0582	9.5
U0207	VOL	massive	highly olivine-phyric basalt	4,912.1	4,917.1	5.0	B0492	R0582	9.5	B0492	R0584	1.0
U0208	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-rich basalt clasts)	4,917.1	4,940.1	23.0	B0492	R0584	1.0	B0495	R0586	4.0
U0209	VOL	massive	highly olivine-phyric basalt	4,940.1	4,950.4	10.3	B0495	R0586	4.0	B0496	R0588	3.3
U0210	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	4,950.4	4,954.7	4.3	B0496	R0588	3.3	B0497	R0589	4.6
U0211	VOL	massive	highly olivine-phyric basalt	4,954.7	4,963.1	8.4	B0497	R0589	4.6	B0498	R0591	3.0
U0212	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	4,963.1	4,987.7	24.6	B0498	R0591	3.0	B0501	R0594	6.1
U0213	VOL	massive	highly olivine-phyric basalt	4,987.7	4,992.6	4.9	B0501	R0594	6.1	B0501	R0595	0.5
U0214	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-rich basalt clasts)	4,992.6	5,017.4	24.8	B0501	R0595	0.5	B0505	R0597	5.3
U0215	VOL	massive	highly olivine-phyric basalt	5,017.4	5,023.1	5.7	B0505	R0597	5.3	B0505	R0598	3.5
U0216	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	5,023.1	5,081.0	57.9	B0505	R0598	3.5	B0512	R0604	1.9
U0217	VOL	massive	highly olivine-phyric basalt	5,081.0	5,091.1	10.1	B0512	R0604	1.9	B0513	R0607	0.0
U0218	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately-to-highly olivine-phyric basalt clasts)	5,091.1	5,198.6	107.5	B0513	R0607	0.0	B0524	R0623	9.5

UNIT SUMMARY

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U0219	SED	conglomerate	pebbly conglomerate	5,198.6	5,202.1	3.5	B0524	R0623	9.5	B0525	R0624	3.0
U0220	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-rich basalt clasts)	5,202.1	5,222.9	20.8	B0525	R0624	3.0	B0527	R0626	2.8
U0221	VOL	massive	highly olivine-phyric basalt	5,222.9	5,243.5	20.6	B0527	R0626	2.8	B0530	R0628	5.4
U0222	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly highly olivine-phyric basalt clasts)	5,243.5	5,248.3	4.8	B0530	R0628	5.4	B0530	R0628	10.2
U0223	VOL	hyaloclastite	basaltic hyaloclastite (polymict, sandy matrix with dominantly highly olivine-phyric basalt clasts)	5,248.3	5,255.3	7.0	B0530	R0628	10.2	B0531	R0629	7.2
U0224	VOL	massive	moderately-to-highly olivine-phyric basalt	5,255.3	5,272.2	16.9	B0531	R0629	7.2	B0533	R0631	4.1
U0225	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-rich basalt clasts)	5,272.2	5,365.7	93.5	B0533	R0631	4.1	B0545	R0640	9.6
U0226	VOL	massive	highly olivine-phyric basalt	5,365.7	5,368.2	2.5	B0545	R0640	9.6	B0545	R0641	2.1
U0227	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	5,368.2	5,392.7	24.5	B0545	R0641	2.1	B0548	R0643	6.6
U0228	VOL	massive	highly olivine-phyric basalt	5,392.7	5,395.1	2.4	B0548	R0643	6.6	B0549	R0643	9.0
U0229	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	5,395.1	5,420.8	25.7	B0549	R0643	9.0	B0552	R0646	6.7
U0230	VOL	massive	highly olivine-phyric basalt	5,420.8	5,424.1	3.3	B0552	R0646	6.7	B0552	R0647	0.0
U0231	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	5,424.1	5,436.2	12.1	B0552	R0647	0.0	B0554	R0648	2.1
U0232	VOL	massive	highly olivine-phyric basalt	5,436.2	5,438.2	2.0	B0554	R0648	2.1	B0554	R0648	4.1
U0233	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately olivine-phyric basalt clasts)	5,438.2	5,447.6	9.4	B0554	R0648	4.1	B0555	R0649	3.5
U0234	VOL	massive	highly olivine-phyric basalt	5,447.6	5,450.5	2.9	B0555	R0649	3.5	B0555	R0649	6.4
U0235	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately olivine-phyric basalt clasts)	5,450.5	5,458.2	7.7	B0555	R0649	6.4	B0556	R0650	6.1
U0236	VOL	massive	moderately-to-highly olivine-phyric basalt	5,458.2	5,461.3	3.1	B0556	R0650	6.1	B0557	R0650	9.2
U0237	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly moderately olivine-phyric basalt clasts)	5,461.3	5,470.1	8.8	B0557	R0650	9.2	B0558	R0651	8.0
U0238	VOL	hyaloclastite	basaltic hyaloclastite (sandy matrix, polymict, dominantly moderately olivine-phyric basalt clasts)	5,470.1	5,629.8	159.7	B0558	R0651	8.0	B0575	R0668	2.7

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0239	SED	sandstone	sandstone with silty interbeds	5,629.8	5,632.1	2.3	B0575	R0668	2.7	B0575	R0668	5.0
U0240	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly moderately-to-highly olivine-phyric basalt clasts)	5,632.1	5,635.9	3.8	B0575	R0668	5.0	B0575	R0668	8.8
U0241	SED	sandstone	sandstone with silty and pebbly interbeds	5,635.9	5,642.2	6.3	B0575	R0668	8.8	B0576	R0669	5.1
U0242	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	5,642.2	5,704.6	62.4	B0576	R0669	5.1	B0583	R0675	6.5
U0243	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly highly olivine-phyric basalt clasts)	5,704.6	5,708.0	3.4	B0583	R0675	6.5	B0583	R0675	9.9
U0244	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly aphyric basalt clasts)	5,708.0	5,772.3	64.3	B0583	R0675	9.9	B0591	R0682	5.2
U0245	VOL	massive	highly olivine-phyric basalt	5,772.3	5,789.6	17.3	B0591	R0682	5.2	B0593	R0684	2.5
U0246	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	5,789.6	5,791.4	1.8	B0593	R0684	2.5	B0593	R0684	4.3
U0247	VOL	massive	highly olivine-phyric basalt	5,791.4	5,794.4	3.0	B0593	R0684	4.3	B0593	R0684	7.3
U0248	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	5,794.4	5,845.8	51.4	B0593	R0684	7.3	B0599	R0689	9.7
U0249	VOL	massive	moderately olivine-phyric basalt	5,845.8	5,851.2	5.4	B0599	R0689	9.7	B0599	R0690	5.1
U0250	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	5,851.2	5,852.8	1.6	B0599	R0690	5.1	B0600	R0690	6.7
U0251	VOL	massive	moderately olivine-phyric basalt	5,852.8	5,883.1	30.3	B0600	R0690	6.7	B0604	R0694	5.0
U0252	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately olivine-phyric basalt clasts)	5,883.1	5,885.1	2.0	B0604	R0694	5.0	B0604	R0694	7.0
U0253	VOL	massive	moderately olivine-phyric basalt	5,885.1	5,889.0	3.9	B0604	R0694	7.0	B0604	R0694	10.9
U0254	VOL	hyaloclastite	basaltic hyaloclastite (polymict, sparsely-to-highly olivine-phyric basalt clasts)	5,889.0	5,912.2	23.2	B0604	R0694	10.9	B0607	R0698	4.1
U0255	VOL	hyaloclastite	basaltic hyaloclastite with silty interbeds	5,912.2	5,920.1	7.9	B0607	R0698	4.1	B0608	R0699	1.5
U0256	VOL	hyaloclastite	basaltic hyaloclastite (polymict, moderately-to-highly olivine-phyric basalt clasts)	5,920.1	5,935.9	15.8	B0608	R0699	1.5	B0609	R0700	6.8
U0257	SED	sandstone	sandstone with silty intervals	5,935.9	5,938.8	2.9	B0609	R0700	6.8	B0610	R0700	9.7
U0258	VOL	hyaloclastite	basaltic hyaloclastite with sandy interbeds	5,938.8	5,946.1	7.3	B0610	R0700	9.7	B0611	R0701	7.0

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0259	SED	sandstone	sandstone with silty intervals	5,946.1	5,948.9	2.8	B0611	R0701	7.0	B0611	R0701	9.8
U0260	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	5,948.9	6,032.5	83.6	B0611	R0701	9.8	B0619	R0707	14.4
U0261	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly highly olivine-phyric basalt clasts)	6,032.5	6,135.4	102.9	B0619	R0707	14.4	B0630	R0712	11.8
U0262	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	6,135.4	6,176.4	41.0	B0630	R0712	11.8	B0635	R0714	9.8
U0263	INT	massive	moderately olivine-phyric basalt	6,176.4	6,195.5	19.1	B0635	R0714	9.8	B0637	R0715	9.9
U0264	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-poor basalt clasts)	6,195.5	6,269.6	74.1	B0637	R0715	9.9	B0645	R0719	6.5
U0265	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately olivine-phyric basalt clasts)	6,269.6	6,277.5	7.9	B0645	R0719	6.5	B0646	R0719	14.4
U0266	INT	massive	moderately olivine-phyric basalt	6,277.5	6,283.4	5.9	B0646	R0719	14.4	B0647	R0719	20.3
U0267	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-poor basalt clasts)	6,283.4	6,301.6	18.2	B0647	R0719	20.3	B0649	R0720	17.0
U0268	INT	massive	highly olivine-phyric basalt	6,301.6	6,309.8	8.2	B0649	R0720	17.0	B0650	R0722	0.2
U0269	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	6,309.8	6,313.5	3.7	B0650	R0722	0.2	B0650	R0722	3.9
U0270	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	6,313.5	6,384.3	70.8	B0650	R0722	3.9	B0658	R0725	13.2
U0271	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	6,384.3	6,423.9	39.6	B0658	R0725	13.2	B0662	R0727	9.8
U0272	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	6,423.9	6,451.0	27.1	B0662	R0727	9.8	B0665	R0728	15.4
U0273	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	6,451.0	6,457.6	6.6	B0665	R0728	15.4	B0665	R0729	2.5
U0274	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately-to-highly olivine-phyric basalt clasts	6,457.6	6,481.0	23.4	B0665	R0729	2.5	B0668	R0732	7.9
U0275	SED	sandstone	sandstone (silty intervals, grading to basaltic hyaloclastite)	6,481.0	6,508.0	27.0	B0668	R0732	7.9	B0671	R0733	13.9
U0276	VOL	pillow	moderately-to-highly olivine-phyric basalt	6,508.0	6,527.8	19.8	B0671	R0733	13.9	B0673	R0735	2.2
U0277	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, highly olivine-phyric basalt clasts)	6,527.8	6,533.7	5.9	B0673	R0735	2.2	B0674	R0735	8.1
U0278	VOL	pillow	moderately-to-highly olivine-phyric basalt	6,533.7	6,598.5	64.8	B0674	R0735	8.1	B0682	R0741	14.4

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0279	VOL	hyaloclastite	basaltic hyaloclastite (with silty intervals)	6,598.5	6,602.3	3.8	B0682	R0741	14.4	B0682	R0741	18.2
U0280	VOL	pillow	moderately-to-highly olivine-phyric basalt	6,602.3	6,637.8	35.5	B0682	R0741	18.2	B0686	R0744	1.7
U0281	VOL	sandstone	sandstone (with silty intervals)	6,637.8	6,646.0	8.2	B0686	R0744	1.7	B0687	R0744	9.9
U0282	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	6,646.0	6,672.1	26.1	B0687	R0744	9.9	B0690	R0745	14.5
U0283	VOL	pillow	moderately-to-highly olivine-phyric basalt	6,672.1	6,845.6	173.5	B0690	R0745	14.5	B0710	R0754	8.0
U0284	VOL	pillow	highly olivine-phyric basalt	6,845.6	7,007.4	161.8	B0710	R0754	8.0	B0728	R0764	11.8
U0285	VOL	hyaloclastite	basaltic hyaloclastite with silty interbeds	7,007.4	7,128.3	120.9	B0728	R0764	11.8	B0741	R0770	20.2
U0286	VOL	hyaloclastite	basaltic hyaloclastite with silty interbeds	7,128.3	7,266.4	138.1	B0741	R0770	20.2	B0756	R0777	15.3
U0287	VOL	hyaloclastite	basaltic hyaloclastite with silty interbeds	7,266.4	7,325.8	59.4	B0756	R0777	15.3	B0762	R0780	10.2
U0288	VOL	pillow	aphyric to moderately olivine-phyric basalt	7,325.8	7,486.0	160.2	B0762	R0780	10.2	B0780	R0791	16.4
U0289	SED	sandstone	sandstone with silty intervals	7,486.0	7,489.2	3.2	B0780	R0791	16.4	B0780	R0791	19.6
U0290	VOL	pillow	sparsely olivine-phyric basalt	7,489.2	7,588.6	99.4	B0780	R0791	19.6	B0791	R0799	8.5
U0291	VOL	pillow	aphyric basalt	7,588.6	7,637.0	48.4	B0791	R0799	8.5	B0796	R0801	13.9
U0292	VOL	pillow	aphyric to sparsely olivine-phyric basalt	7,637.0	7,740.5	103.5	B0796	R0801	13.9	B0807	R0815	3.9
U0293	VOL	pillow	aphyric to moderately olivine-phyric basalt	7,740.5	8,063.3	322.8	B0807	R0815	3.9	B0843	R0834	15.7
U0294	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly aphyric basalt clasts)	8,063.3	8,085.9	22.6	B0843	R0834	15.7	B0845	R0835	18.8
U0295	VOL	pillow	aphyric basalt	8,085.9	8,104.6	18.7	B0845	R0835	18.8	B0847	R0836	17.5
U0296	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly sparsely olivine-phyric basalt clasts)	8,104.6	8,139.9	35.3	B0847	R0836	17.5	B0851	R0838	9.8
U0297	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-poor basalt clasts)	8,139.9	8,208.5	68.6	B0851	R0838	9.8	B0858	R0841	21.4
U0298	VOL	massive	aphyric basalt	8,208.5	8,212.2	3.7	B0858	R0841	21.4	B0858	R0842	3.1

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0299	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly moderately olivine-phyric basalt clasts)	8,212.2	8,228.7	16.5	B0858	R0842	3.1	B0860	R0842	19.6
U0300	VOL	massive	moderately olivine-phyric basalt	8,228.7	8,234.3	5.6	B0860	R0842	19.6	B0861	R0843	3.2
U0301	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, moderately olivine-phyric basalt clasts)	8,234.3	8,239.4	5.1	B0861	R0843	3.2	B0861	R0843	8.3
U0302	INT	massive	highly olivine-phyric basalt	8,239.4	8,258.1	18.7	B0861	R0843	8.3	B0863	R0844	12.0
U0303	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-poor basalt clasts)	8,258.1	8,299.2	41.1	B0863	R0844	12.0	B0868	R0846	18.6
U0304	INT	massive	aphyric basalt	8,299.2	8,299.7	0.5	B0868	R0846	18.6	B0868	R0846	19.1
U0305	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-poor basalt clasts)	8,299.7	8,482.5	182.8	B0868	R0846	19.1	B0887	R0855	14.4
U0306	VOL	hyaloclastite	basaltic hyaloclastite (with silty intervals)	8,482.5	8,491.8	9.3	B0887	R0855	14.4	B0888	R0856	1.7
U0307	INT	massive	aphyric to sparsely olivine-phyric basalt	8,491.8	8,503.7	11.9	B0888	R0856	1.7	B0889	R0856	13.6
U0308a	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	8,503.7	8,515.5	11.8	B0889	R0856	13.6	B0890	R0857	9.4
U0309a	INT	massive	sparsely olivine-phyric basalt	8,515.5	8,516.1	0.6	B0890	R0857	9.4	B0891	R0857	10.0
U0308b	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	8,516.1	8,517.0	0.9	B0891	R0857	10.0	B0891	R0857	10.9
U0309b	INT	massive	sparsely olivine-phyric basalt	8,517.0	8,525.1	8.1	B0891	R0857	10.9	B0892	R0857	19.0
U0308c	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	8,525.1	8,526.9	1.8	B0892	R0857	19.0	B0892	R0857	20.8
U0309c	INT	massive	sparsely olivine-phyric basalt	8,526.9	8,532.4	5.5	B0892	R0857	20.8	B0892	R0858	4.3
U0308d	VOL	hyaloclastite	basaltic hyaloclastite (polymict, olivine-poor basalt clasts)	8,532.4	8,532.7	0.3	B0892	R0858	4.3	B0892	R0858	4.6
U0310a	VOL	pillow	moderately olivine-phyric basalt	8,532.7	8,533.8	1.1	B0892	R0858	4.6	B0893	R0858	5.7
U0309d	INT	massive	sparsely olivine-phyric basalt	8,533.8	8,534.1	0.3	B0893	R0858	5.7	B0893	R0858	6.0
U0310b	VOL	pillow	moderately olivine-phyric basalt	8,534.1	8,536.1	2.0	B0893	R0858	6.0	B0893	R0858	8.0
U0309e	INT	massive	sparsely olivine-phyric basalt	8,536.1	8,538.4	2.3	B0893	R0858	8.0	B0893	R0858	10.3

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	bottom	thickness	top contact box	run	depth	bottom contact box	run	depth
U0310c	VOL	pillow	moderately olivine-phyric basalt	8,538.4	8,538.9	0.5	B0893	R0858	10.3	B0893	R0858	10.8
U0309f	INT	massive	sparsely olivine-phyric basalt	8,538.9	8,543.6	4.7	B0893	R0858	10.8	B0894	R0858	15.5
U0310d	VOL	pillow	moderately olivine-phyric basalt	8,543.6	8,544.2	0.6	B0894	R0858	15.5	B0894	R0858	16.1
U0309g	INT	massive	sparsely olivine-phyric basalt	8,544.2	8,544.4	0.2	B0894	R0858	16.1	B0894	R0858	16.3
U0310e	VOL	pillow	moderately olivine-phyric basalt	8,544.4	8,587.3	42.9	B0894	R0858	16.3	B0898	R0860	18.2
U0311	SED	sandstone	sandstone	8,587.3	8,587.7	0.4	B0898	R0860	18.2	B0898	R0860	18.6
U0312	VOL	pillow	moderately olivine-phyric basalt	8,587.7	8,823.9	236.2	B0898	R0860	18.6	B0926	R0885	3.3
U0313	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-rich basalt clasts)	8,823.9	8,838.5	14.6	B0926	R0885	3.3	B0928	R0885	17.9
U0314	VOL	hyaloclastite	basaltic hyaloclastite (monolithologic, aphyric to sparsely olivine-phyric basalt clasts)	8,838.5	8,845.1	6.6	B0928	R0885	17.9	B0929	R0886	2.5
U0315	VOL	hyaloclastite	basaltic hyaloclastite (polymict, dominantly olivine-poor basalt clasts)	8,845.1	8,868.9	23.8	B0929	R0886	2.5	B0931	R0887	4.3
U0316	VOL	pillow	moderately-to-highly olivine-phyric basalt	8,868.9	8,962.1	93.2	B0931	R0887	4.3	B0942	R0892	0.0
U0317	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	8,962.1	8,979.6	17.5	B0942	R0892	0.0	B0944	R0892	17.5
U0318	VOL	massive	sparsely olivine-phyric basalt	8,979.6	8,981.8	2.2	B0944	R0892	17.5	B0944	R0892	19.7
U0319	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to moderately olivine-phyric basalt clasts)	8,981.8	9,065.8	84.0	B0944	R0892	19.7	B0953	R0896	17.7
U0320	VOL	pillow	moderately olivine-phyric basalt	9,065.8	9,115.1	49.3	B0953	R0896	17.7	B0959	R0902	4.0
U0321	VOL	pillow	moderately plagioclase-olivine-phyric basalt	9,115.1	9,158.1	43.0	B0959	R0902	4.0	B0964	R0908	0.0
U0322	VOL	hyaloclastite	basaltic hyaloclastite (polymict, sparsely-to-highly olivine-phyric basalt clasts)	9,158.1	9,174.6	16.5	B0964	R0908	0.0	B0966	R0908	16.5
U0323	VOL	massive	aphyric basalt	9,174.6	9,177.6	3.0	B0966	R0908	16.5	B0966	R0908	19.4
U0324a	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,177.6	9,184.4	6.8	B0966	R0908	19.4	B0967	R0909	5.3
U0325a	INT	massive	moderately-to-highly olivine-phyric basalt	9,184.4	9,187.5	3.1	B0967	R0909	5.3	B0968	R0909	8.4

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0324b	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,187.5	9,193.8	6.3	B0968	R0909	8.4	B0968	R0909	14.7
U0325b	INT	massive	moderately-to-highly olivine-phyric basalt	9,193.8	9,195.1	1.3	B0968	R0909	14.7	B0968	R0909	16.0
U0324c	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,195.1	9,197.5	2.4	B0968	R0909	16.0	B0969	R0909	18.4
U0325c	INT	massive	moderately-to-highly olivine-phyric basalt	9,197.5	9,202.7	5.2	B0969	R0909	18.4	B0969	R0910	1.6
U0324d	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,202.7	9,209.0	6.3	B0969	R0910	1.6	B0970	R0910	7.9
U0325d	INT	massive	moderately-to-highly olivine-phyric basalt	9,209.0	9,209.3	0.3	B0970	R0910	7.9	B0970	R0910	8.2
U0324e	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,209.3	9,254.8	45.5	B0970	R0910	8.2	B0975	R0912	10.7
U0326a	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,254.8	9,264.6	9.8	B0975	R0912	10.7	B0976	R0912	20.6
U0327	INT	massive	moderately olivine-phyric basalt	9,264.6	9,270.3	5.7	B0976	R0912	20.6	B0977	R0913	4.2
U0326b	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,270.3	9,293.5	23.2	B0977	R0913	4.2	B0980	R0915	1.4
U0328	VOL	pillow	moderately olivine-phyric basalt	9,293.5	9,304.4	10.9	B0980	R0915	1.4	B0981	R0915	12.3
U0329	INT	massive	aphyric basalt	9,304.4	9,305.7	1.3	B0981	R0915	12.3	B0981	R0915	13.6
U0330	VOL	pillow	moderately olivine-phyric basalt	9,305.7	9,335.8	30.1	B0981	R0915	13.6	B0985	R0917	11.7
U0331	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,335.8	9,452.3	116.5	B0985	R0917	11.7	B0997	R0925	0.2
U0332	VOL	hyaloclastite	basaltic hyaloclastite (polymict, aphyric to highly olivine-phyric basalt clasts)	9,452.3	9,571.1	118.8	B0997	R0925	0.2	B1010	R0930	11.0
U0333	VOL	pillow	highly olivine-phyric basalt	9,571.1	9,578.0	6.9	B1010	R0930	11.0	B1011	R0930	17.9
U0334	VOL	hyaloclastite	pillow breccia (highly olivine-phyric basalt fragments)	9,578.0	9,587.0	9.0	B1011	R0930	17.9	B1012	R0931	4.9
U0335a	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,587.0	9,720.4	133.4	B1012	R0931	4.9	B1028	R0940	4.3
U0336a	INT	massive	aphyric basalt	9,720.4	9,721.0	0.6	B1028	R0940	4.3	B1028	R0940	4.9
U0335b	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,721.0	9,721.6	0.6	B1028	R0940	4.9	B1028	R0940	5.5

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0336b	INT	massive	aphyric basalt	9,721.6	9,722.6	1.0	B1028	R0940	5.5	B1029	R0940	6.5
U0335c	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,722.6	9,729.2	6.6	B1029	R0940	6.5	B1029	R0940	13.1
U0336c	INT	massive	aphyric basalt	9,729.2	9,736.3	7.1	B1029	R0940	13.1	B1030	R0940	20.2
U0335d	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,736.3	9,763.3	27.0	B1030	R0940	20.2	B1034	R0943	2.2
U0336d	INT	massive	aphyric basalt	9,763.3	9,767.3	4.0	B1034	R0943	2.2	B1034	R0944	2.2
U0335e	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,767.3	9,774.6	7.3	B1034	R0944	2.2	B1035	R0944	9.5
U0336e	INT	massive	aphyric basalt	9,774.6	9,775.8	1.2	B1035	R0944	9.5	B1036	R0944	10.7
U0337a	VOL	hyaloclastite	pillow breccia (moderately-to-highly olivine-phyric basalt fragments)	9,775.8	9,776.7	0.9	B1036	R0944	10.7	B1036	R0944	11.6
U0336f	INT	massive	aphyric basalt	9,776.7	9,776.9	0.2	B1036	R0944	11.6	B1036	R0944	11.8
U0337b	VOL	hyaloclastite	pillow breccia (moderately-to-highly olivine-phyric basalt fragments)	9,776.9	9,782.3	5.4	B1036	R0944	11.8	B1036	R0945	6.2
U0335f	VOL	pillow	moderately-to-highly olivine-phyric basalt	9,782.3	9,784.9	2.6	B1036	R0945	6.2	B1037	R0945	8.8
U0337c	VOL	hyaloclastite	pillow breccia (moderately-to-highly olivine-phyric basalt fragments)	9,784.9	9,790.1	5.2	B1037	R0945	8.8	B1037	R0945	14.0
U0336g	INT	massive	aphyric basalt	9,790.1	9,793.7	3.6	B1037	R0945	14.0	B1038	R0946	3.6
U0337d	VOL	hyaloclastite	pillow breccia (moderately-to-highly olivine-phyric basalt fragments)	9,793.7	9,822.1	28.4	B1038	R0946	3.6	B1042	R0949	8.0
U0336h	INT	massive	aphyric basalt	9,822.1	9,826.8	4.7	B1042	R0949	8.0	B1043	R0950	2.7
U0337e	VOL	hyaloclastite	pillow breccia (moderately-to-highly olivine-phyric basalt fragments)	9,826.8	9,830.1	3.3	B1043	R0950	2.7	B1043	R0950	6.0
U0336i	INT	massive	aphyric basalt	9,830.1	9,846.1	16.0	B1043	R0950	6.0	B1045	R0952	0.0
U0338	VOL	pillow	highly olivine-phyric basalt	9,846.1	9,868.8	22.7	B1045	R0952	0.0	B1048	R0954	6.7
U0339	VOL	pillow	highly olivine-phyric basalt	9,868.8	9,872.8	4.0	B1048	R0954	6.7	B1049	R0954	10.7
U0340a	VOL	pillow	highly olivine-phyric basalt	9,872.8	9,884.1	11.3	B1049	R0954	10.7	B1050	R0955	10.0

UNIT SUMMARY

unit	class	type	rock name	depth (ft bsl) top	depth (ft bsl) bottom	thickness	top contact box	top contact run	top contact depth	bottom contact box	bottom contact run	bottom contact depth
U0341a	INT	massive	aphyric to sparsely plagioclase-olivine-phyric basalt	9,884.1	9,884.9	0.8	B1050	R0955	10.0	B1050	R0956	0.8
U0340b	VOL	pillow	highly olivine-phyric basalt	9,884.9	9,885.5	0.6	B1050	R0956	0.8	B1050	R0956	1.4
U0341b	INT	massive	aphyric to sparsely plagioclase-olivine-phyric basalt	9,885.5	9,909.4	23.9	B1050	R0956	1.4	B1053	R0957	4.3
U0340c	VOL	pillow	highly olivine-phyric basalt	9,909.4	9,910.1	0.7	B1053	R0957	4.3	B1053	R0957	5.0
U0341c	INT	massive	aphyric to sparsely plagioclase-olivine-phyric basalt	9,910.1	9,912.6	2.5	B1053	R0957	5.0	B1053	R0957	7.5
U0340d	VOL	pillow	highly olivine-phyric basalt	9,912.6	9,917.1	4.5	B1053	R0957	7.5	B1054	R0957	12.0
U0341d	INT	massive	aphyric to sparsely plagioclase-olivine-phyric basalt	9,917.1	9,917.6	0.5	B1054	R0957	12.0	B1054	R0958	1.5
U0340e	VOL	pillow	highly olivine-phyric basalt	9,917.6	10,038.1	120.5	B1054	R0958	1.5	B1068	R0964	12.0
U0342	VOL	hyaloclastite	pillow breccia (highly olivine-phyric basalt fragments)	10,038.1	10,042.9	4.8	B1068	R0964	12.0	B1068	R0964	16.8
U0340f	VOL	pillow	highly olivine-phyric basalt	10,042.9	10,049.6	6.7	B1068	R0964	16.8	B1069	R0965	1.5
U0343a	VOL	pillow	sparsely-to-moderately olivine-phyric basalt	10,049.6	10,102.3	52.7	B1069	R0965	1.5	B1075	R0970	6.2
U0344a	INT	massive	aphyric basalt	10,102.3	10,102.5	0.2	B1075	R0970	6.2	B1075	R0970	6.4
U0343b	VOL	pillow	sparsely-to-moderately olivine-phyric basalt	10,102.5	10,106.1	3.6	B1075	R0970	6.4	B1076	R0971	3.0
U0344b	INT	massive	aphyric basalt	10,106.1	10,108.9	2.8	B1076	R0971	3.0	B1076	R0971	5.8
U0343c	VOL	pillow	sparsely-to-moderately olivine-phyric basalt	10,108.9	10,117.8	8.9	B1076	R0971	5.8	B1077	R0972	7.7
U0344c	INT	massive	aphyric basalt	10,117.8	10,117.9	0.1	B1077	R0972	7.7	B1077	R0972	7.8
U0343d	VOL	pillow	sparsely-to-moderately olivine-phyric basalt	10,117.9	10,125.8	7.9	B1077	R0972	7.8	B1078	R0972	15.7
U0344d	INT	massive	aphyric basalt	10,125.8	10,126.3	0.5	B1078	R0972	15.7	B1079	R0973	0.2
U0343e	VOL	pillow	sparsely-to-moderately olivine-phyric basalt	10,126.3	10,148.8	22.5	B1079	R0973	0.2	B1082	R0978	6.2
U0345	VOL	pillow	sparsely olivine-phyric basalt	10,148.8	10,163.6	14.8	B1082	R0978	6.2	B1083	R0980	5.0

Hawaii Scientific Drilling Project

DIS: Data-Report — **REFERENCE SAMPLE RECORD**

sample	unit	core box	depth (ft bsl) top	depth (ft bsl) bottom	run	distance top	distance bottom	comments
SR0008-2.7	U0002	B0004	31.3	32.8	R0008	2.7	4.2	
SR0023-2.9	U0006	B0012	111.5	112.9	R0023	2.9	4.3	
SR0031-0.5	U0007	B0016	149.1	150.6	R0031	0.5	2	
SR0036-1.22	U0008	B0019	175.32	177	R0036	1.22	2.9	
SR0040-1.07	U0009	B0022	195.17	197.1	R0040	1.07	3	
SR0046-1.15	U0011	B0025	225.25	227.2	R0046	1.15	3.1	
SR0057-3	U0015	B0032	281.6	283.1	R0057	3	4.5	
SR0061-0	U0016	B0034	299.1	300.4	R0061	0	1.3	
SR0066-0	U0018	B0037	324.1	324.6	R0066	0	0.5	sample from R66-0.0 to 0.5, R66-0.8 to 1.6, and R67-0.4-1.3
SR0080-0.35	U0019	B0046	411.45	413.1	R0080	0.35	2	
SR0083-7.85	U0020	B0050	449.45	450.8	R0083	7.85	9.2	
SR0089-1.15	U0022	B0055	491.75	493.2	R0089	1.15	2.6	
SR0093-6.55	U0026	B0060	535.65	537.4	R0093	6.55	8.3	
SR0098-2	U0028	B0065	583.1	584.6	R0098	2	3.5	
SR0104-4.95	U0032	B0073	647.55	649.1	R0104	4.95	6.5	
SR0109-0.65	U0035	B0077	685.75	687.3	R0109	0.65	2.2	
SR0113-6.2	U0036	B0082	729.8	731.3	R0113	6.2	7.7	
SR0117-4	U0037	B0086	766.6	767.5	R0117	4	4.9	sample from R117-4.0 to 4.9 and R117-6.85 to 7.70
SR0120-1	U0040	B0089	793.6	795.3	R0120	1	2.7	

DIS: Data-Report

REFERENCE SAMPLE RECORD

sample	unit	core box	depth (ft bsl) top	depth (ft bsl) bottom	run	distance top	distance bottom	comments
SR0121-4.4	U0042	B0091	807.5	810	R0121	4.4	6.9	
SR0124-3.9	U0043	B0093	829.5	830.1	R0124	3.9	4.5	sample from R124-3.9 to 4.5 and R124-6.9 to 8.0
SR0125-6.25	U0045	B0094	841.35	842.15	R0125	6.25	7.05	sample from R125-6.25 to 7.05 and R126-0.0 to 0.75
SR0127-4.75	U0046	B0096	858.35	858.85	R0127	4.75	5.25	sample from R127-4.75 to 5.25 and R127-5.94 to 7.20
SR0129-5.2	U0047	B0098	877.3	878.35	R0129	5.2	6.25	sample from R129-5.2 to 6.25 and R129-6.93 to 7.90
SR0131-6.92	U0048	B0101	900.02	901	R0131	6.92	7.9	sample from R131-6.92 to 7.90 and R131- 8.1 to 8.9
SR0133-8.2	U0049	B0103	922.8	923.25	R0133	8.2	8.65	sample from R133-8.2 to 8.65, R133-8.9 to 9.4 and R133-9.5-10.1
SR0137-5.98	U0053	B0107	961.08	962.6	R0137	5.98	7.5	
SR0141-7.9	U0056	B0112	1003	1004.2	R0141	7.9	9.1	
SR0148-8.5	U0060	B0120	1071.6	1073.3	R0148	8.5	10.2	
SR0157-6.25	U0065	B0129	1157.85	1159.6	R0157	6.25	8	
SR0167-5.9	U0070	B0137	1241	1242.6	R0167	5.9	7.5	
SR0175-5.25	U0073	B0144	1305.85	1307.4	R0175	5.25	6.8	
SR0184-2.8	U0076	B0152	1381.4	1383	R0184	2.8	4.4	
SR0193-0	U0080	B0159	1455.1	1456.8	R0193	0	1.7	
SR0205-1.3	U0083	B0167	1534.4	1535.2	R0205	1.3	2.1	sample from R205-1.3 to 2.1 and R205-3.8 to 4.6
SR0212-8.2	U0088	B0175	1610.3	1611.9	R0212	8.2	9.8	
SR0222-2	U0092	B0184	1693.1	1694.75	R0222	2	3.65	
SR0232-8.5	U0094	B0192	1778.1	1779.9	R0232	8.5	10.3	
SR0240-3.3	U0098	B0199	1848.4	1849.73	R0240	3.3	4.63	
SR0256-0.95	U0103	B0207	1932.05	1932.8	R0256	0.95	1.7	
SR0267-6.85	U0107	B0216	2019.95	2021.3	R0267	6.85	8.2	

REFERENCE SAMPLE RECORD

sample	unit	core box	depth (ft bsl) top	depth (ft bsl) bottom	run	distance top	distance bottom	comments
SR0276-7.85	U0110	B0223	2085.95	2087.1	R0276	7.85	9	sample from R276-7.85 to 9.0 and R276-10.0 to 10.6
SR0284-1.75	U0114	B0231	2159.35	2160.6	R0284	1.75	3	
SR0294-7.65	U0116	B0238	2225.75	2227.1	R0294	7.65	9	
SR0300-6.5	U0119	B0244	2282.6	2284.1	R0300	6.5	8	
SR0311-4.4	U0124	B0255	2375	2376.3	R0311	4.4	5.7	sample from R311-4.4 to 5.7 and R311-6.0 to 6.35
SR0328-3.1	U0127	B0267	2492.2	2494	R0328	3.1	4.9	
SR0340-1	U0132	B0280	2603.1	2604.55	R0340	1	2.45	
SR0346-5.6	U0136	B0288	2665.7	2667.55	R0346	5.6	7.45	
SR0354-7.75	U0138	B0296	2735.35	2736.1	R0354	7.75	8.5	sample from R354-7.75 to 8.5 and R354-9.7 to 10.55
SR0372-2.8	U0142	B0309	2857.4	2858	R0372	2.8	3.4	sample from R372-2.8 to 3.4 and R372-3.7 to 4.5
SR0379-3	U0144	B0315	2914.1	2915.2	R0379	3	4.1	sample from R379-3.0 to 4.1 and R379-5.15 to 5.8
SR0392-4.3	U0148	B0326	3023.4	3024.6	R0392	4.3	5.5	sample from R392-4.3 to 5.5 and R392-5.65 to 6.25
SR0401-2.85	U0151	B0366	3112.45	3113.9	R0401	2.85	4.3	
SR0413-3.1	U0155	B0349	3228.2	3229.8	R0413	3.1	4.7	
SR0423-3.65	U0157	B0359	3320.75	3322.1	R0423	3.65	5	
SR0431-8.5	U0160	B0368	3403.6	3404.9	R0431	8.5	9.8	
SR0441-9.1	U0166	B0377	3480.7	3482.1	R0441	9.1	10.5	
SR0450-3.55	U0171	B0386	3554.65	3556	R0450	3.55	4.9	
SR0455-7.4	U0179	B0391	3602	3603.6	R0455	7.4	9	
SR0472-1	U0185	B0398	3684.1	3684.5	R0472	1	1.4	sampled sections are R472-1.0 to 1.4 and R473-0.0 to 0.65
SR0490-1.5	U0190	B0402	4033.1	4033.6	R0490	1.5	2	large clast from hyaloclastite
SR0502-4.85	U0191	B0405	4149.95	4151.4	R0502	4.85	6.3	

REFERENCE SAMPLE RECORD

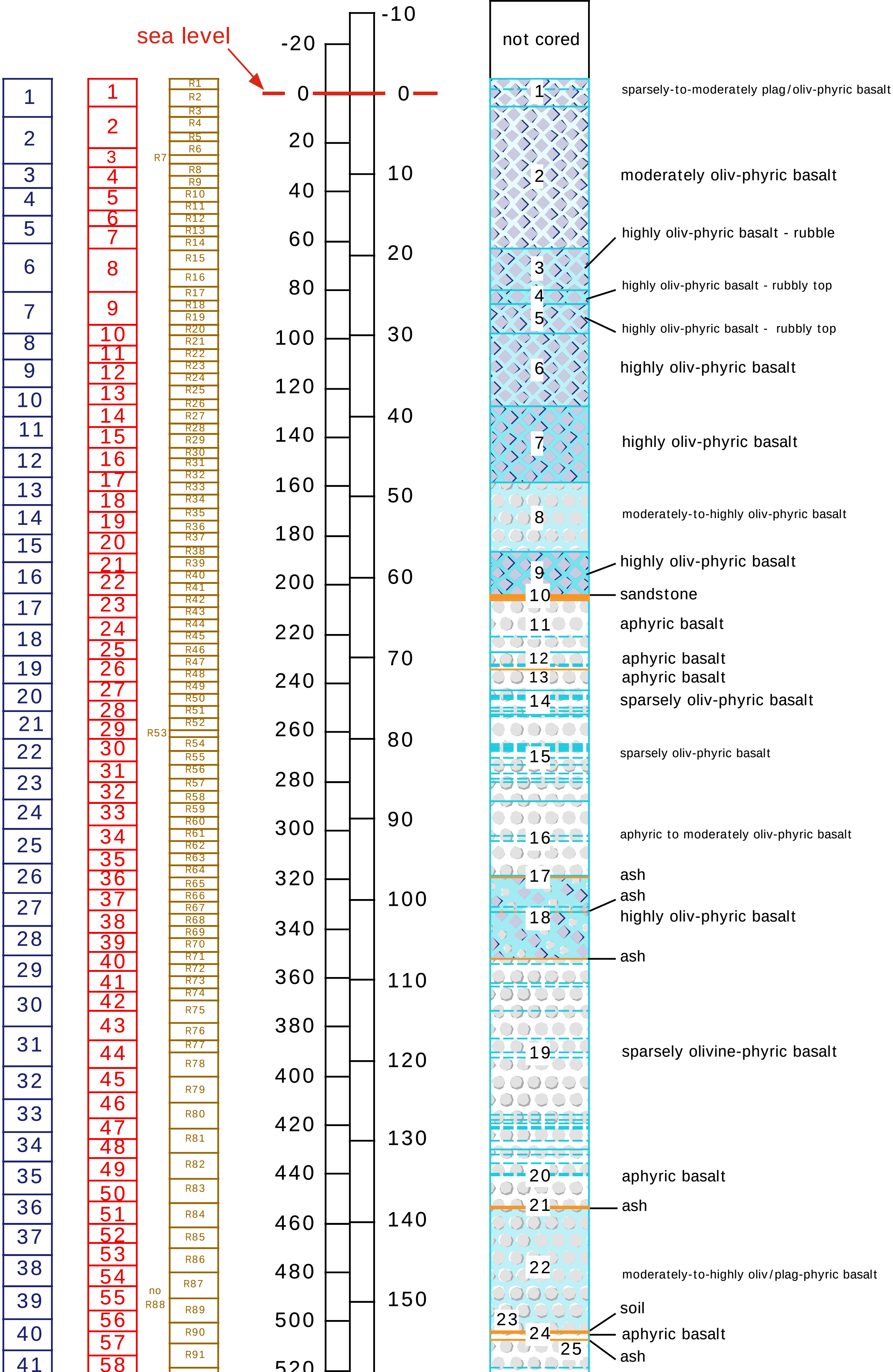
sample	unit	core box	depth (ft bsl) top	depth (ft bsl) bottom	run	distance top	distance bottom	comments
SR0518-0.8	U0195	B0423	4302.9	4303.65	R0518	0.8	1.55	sample from R518-0.8 to 1.55, R518-2.5 to 3.1, and R518-5.1 to 5.5; gypsum in sample
SR0531-4.4	U0198	B0438	4436.5	4437.8	R0531	4.4	5.7	large clast from hyaloclastite
SR0545-8.35	U0198	B0452	4575.45	4576.5	R0545	8.35	9.4	large clast from hyaloclastite; top of clast well cemented to hyaloclastite
SR0548-8	U0199	B0456	4605.6	4607.6	R0548	8	10	
SR0560-7.5	U0202	B0468	4708.1	4708.7	R0560	7.5	8.1	large clast from hyaloclastite
SR0574-1.9	U0202	B0482	4837	4838	R0574	1.9	2.9	large clast from hyaloclastite
SR0582-10	U0207	B0492	4912.6	4913.25	R0582	10	10.65	sample from R582-10.0 to 10.65 and R583-0.0 to 1.1
SR0594-8.7	U0213	B0501	4990.3	4992.2	R0594	8.7	10.6	
SR0603-8.9	U0216	B0512	5078	5078.95	R0603	8.9	9.85	large clast from hyaloclastite; secondary minerals in fractures
SR0604-2.5	U0217	B0513	5081.6	5082.25	R0604	2.5	3.15	
SR0622-7.1	U0218	B0522	5186.2	5186.8	R0622	7.1	7.7	large clast from hyaloclastite; vesicles are filled
SR0630-6.2	U0224	B0532	5264.3	5265.9	R0630	6.2	7.8	
SR0641-1	U0226	B0545	5367.1	5368.1	R0641	1	2	white vesicle filling
SR0655-4	U0238	B0562	5506.1	5506.55	R0655	4	4.45	clast not representative of unit lithology; left cored surface due to small sample size
SR0664-5.1	U0238	B0571	5594.2	5594.7	R0664	5.1	5.6	point count on sample; small sample - kept cored surface; filled vesicles; clast
SR0675-6.9	U0243	B0583	5705	5705.4	R0675	6.9	7.3	clast from hyaloclastite, remaining hyaloclastite on sample (?)
SR0683-5.75	U0245	B0592	5783.35	5784.65	R0683	5.75	7.05	
SR0694-9	U0253	B0604	5887.1	5887.6	R0694	9	9.5	sample from R694-9.0 to 9.5 and R694-9.8 to 10.8
SR0705-0.15	U0260	B0614	5980.25	5981.3	R0705	0.15	1.2	clast from hyaloclastite
SR0709-13.35	U0261	B0624	6074.45	6074.95	R0709	13.35	13.85	clast from hyaloclastite
SR0714-11.55	U0263	B0635	6178.15	6178.5	R0714	11.55	11.9	sample from R714-11.55 to 11.9, R714-12.4 to 12.8, and R714-14.4 to 14.85
SR0720-18.25	U0268	B0649	6302.85	6304.4	R0720	18.25	19.8	

REFERENCE SAMPLE RECORD

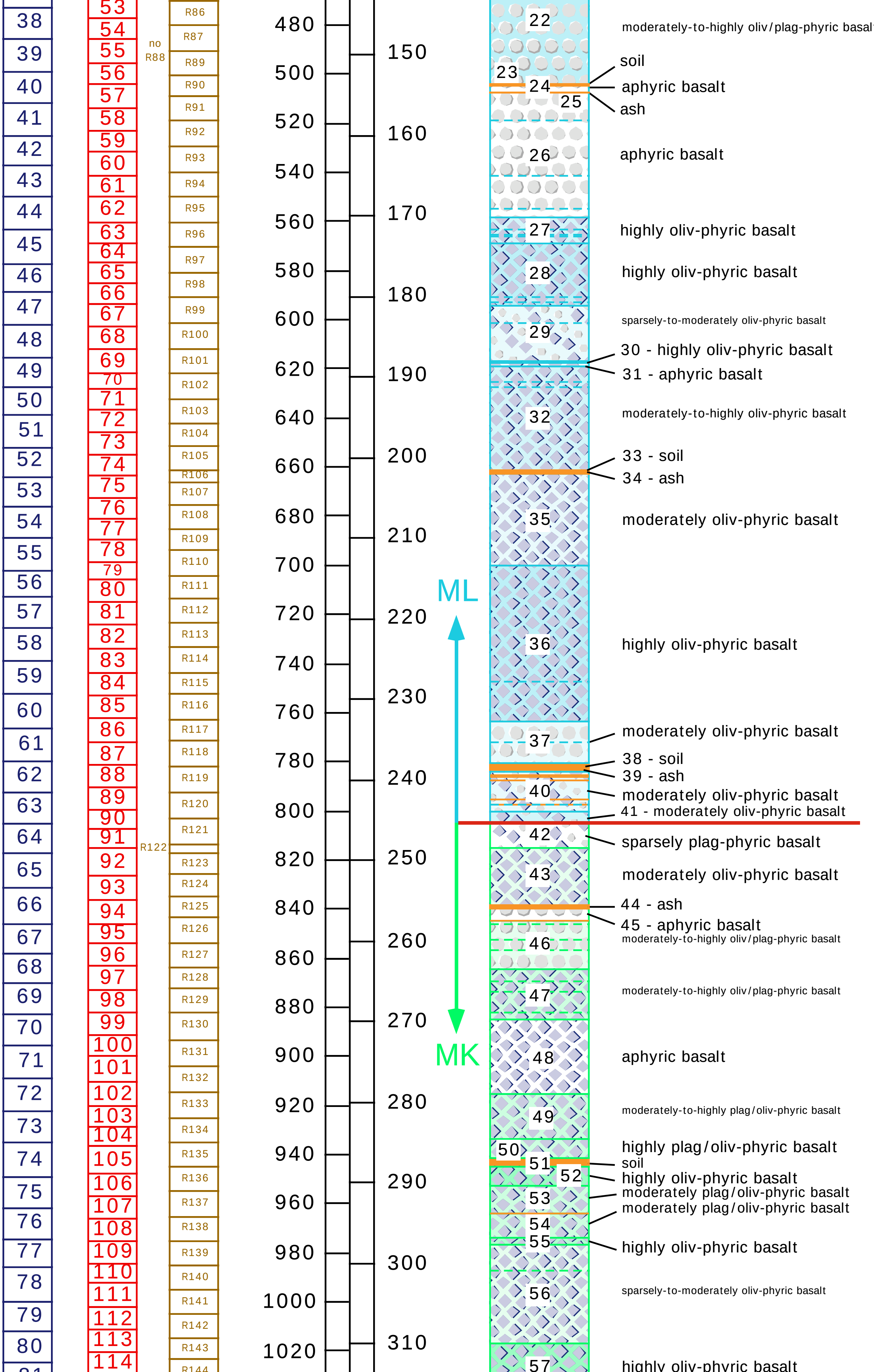
sample	unit	core box	depth (ft bsl) top	depth (ft bsl) bottom	run	distance top	distance bottom	comments
SR0723-13.7	U0270	B0653	6342.8	6343.4	R0723	13.7	14.3	clast from hyaloclastite; clast is very small
SR0732-1.1	U0274	B0667	6474.2	6474.7	R0732	1.1	1.6	clast from hyaloclastite
SR0741-7.9	U0278	B0681	6592	6592.95	R0741	7.9	8.85	
SR0750-12.45	U0283	B0701	6765.55	6766.55	R0750	12.45	13.45	
SR0756-13.25	U0284	B0714	6883.35	6884.35	R0756	13.25	14.25	
SR0762-4.6	U0284	B0724	6965.7	6966.45	R0762	4.6	5.35	pillow basalt interior
SR0768-11.2	U0285	B0736	7076.3	7076.8	R0768	11.2	11.7	clast from hyaloclastite
SR0776-17.7	U0286	B0754	7247.3	7247.6	R0776	17.7	18	pillow basalt interior
SR0778-3.2	U0287	B0757	7275.8	7276.1	R0778	3.2	3.5	pillow basalt interior
SR0791-9.5	U0288	B0779	7479.1	7480.4	R0791	9.5	10.8	pillow basalt interior
SR0796-6.7	U0290	B0786	7544.8	7545.8	R0796	6.7	7.7	pillow basalt interior
SR0800-13.2	U0291	B0794	7614.8	7616.1	R0800	13.2	14.5	
SR0814-14.4	U0292	B0806	7731	7731.4	R0814	14.4	14.8	sample from 14.4 to 14.8 and 14.9 to 15.3
SR0826-20.6	U0293	B0826	7918.2	7919.2	R0826	20.6	21.6	
SR0836-5.8	U0295	B0846	8092.9	8093.7	R0836	5.8	6.6	
SR0842-2.35	U0298	B0858	8211.45	8212.05	R0842	2.35	2.95	
SR0846-2.8	U0303	B0866	8283.4	8283.85	R0846	2.8	3.25	clast from hyaloclastite; round side of core left intact
SR0850-5.95	U0305	B0875	8367.05	8367.3	R0850	5.95	6.2	clast from hyaloclastite
SR0855-0.1	U0305	B0885	8468.2	8468.5	R0855	0.1	0.4	clast from hyaloclastite
SR0860-8.1	U0310e	B0897	8577.2	8577.45	R0860	8.1	8.35	sample from R860-8.1 to 8.35, R860-8.5 to 8.85, R860-9.0 to 9.35 and R860-9.6 to 9.8
SR0871-13	U0312	B0912	8705.6	8706.25	R0871	13	13.65	sample from R871-13.0 to 13.65, R871-15.8 to 16.0 and R871-16.05 to 16.2
SR0891-15.1	U0316	B0941	8955.2	8955.35	R0891	15.1	15.25	sample from R891-15.1 to 15.25, R891-16.35 to 16.75, and R891-17.4 to 18.15

REFERENCE SAMPLE RECORD

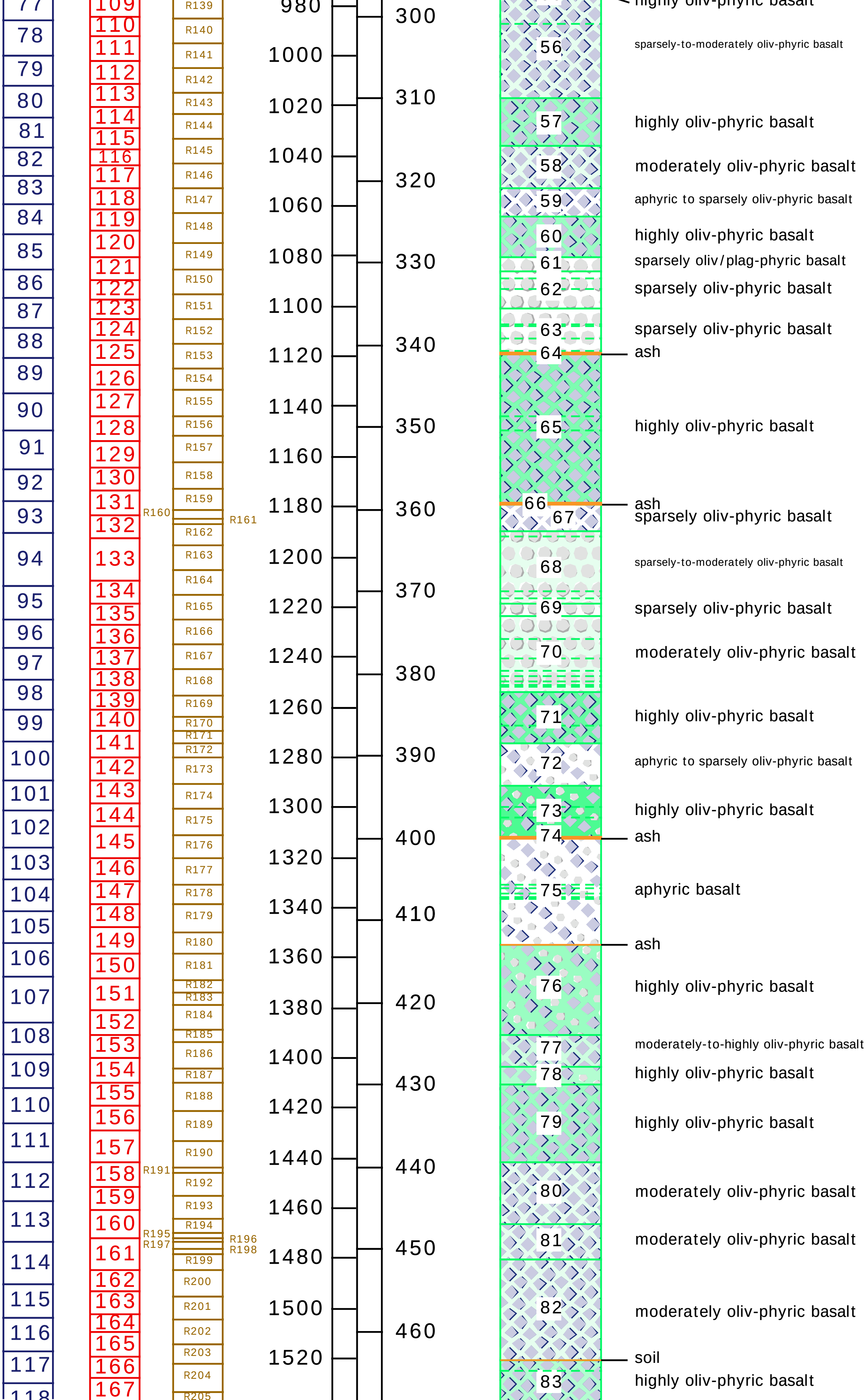
sample	unit	core box	depth (ft bsl) top	depth (ft bsl) bottom	run	distance top	distance bottom	comments
SR0896-2.4	U0319	B0951	9050.5	9050.9	R0896	2.4	2.8	clast from hyaloclastite
SR0899-2.45	U0320	B0956	9088.55	9088.75	R0899	2.45	2.65	sample from R899-2.45 to 2.65, R899-4.4 to 4.75, and R899-4.9 to 5.15
SR0907-1.65	U0321	B0964	9150.75	9150.95	R0907	1.65	1.85	sample from R907-1.65 to 1.85 and R907-6.5 to 7.4
SR0913-2.4	U0327	B0977	9268.5	9269.05	R0913	2.4	2.95	
SR0916-1.15	U0330	B0982	9307.25	9308.1	R0916	1.15	2	
SR0930-15.85	U0333	B1010	9575.95	9576.85	R0930	15.85	16.75	
SR0939-18.1	U0335a	B1027	9712.2	9713.35	R0939	18.1	19.25	
SR0940-18.35	U0336c	B1030	9734.45	9734.8	R0940	18.35	18.7	sample from R940-18.35 to 18.7 and R940-18.95 to 19.75
SR0954-8	U0339	B1048	9870.1	9871.25	R0954	8	9.15	sample from R954-8.0 to 9.15 and R954-10.1 to 10.3
SR0956-18.35	U0341b	B1052	9902.45	9903	R0956	18.35	18.9	sample from R956-18.3 to 18.9 and R956-19.9 to 10.5
SR0964-4.3	U0340e	B1067	10030.4	10030.9	R0964	4.3	4.8	sample from R964-4.3 to 4.8 and R964-5.8 to 6.75
SR0967-2.75	U0343a	B1071	10065.85	10066.25	R0967	2.75	3.15	sample from R967-2.75 to 3.15 and R967-3.5 to 4.65



sea level
not cored
R7
R53
no R88
sparsely-to-moderately plag/oliv-phyric basalt
moderately oliv-phyric basalt
highly oliv-phyric basalt - rubble
highly oliv-phyric basalt - rubbly top
highly oliv-phyric basalt - rubbly top
highly oliv-phyric basalt
highly oliv-phyric basalt
moderately-to-highly oliv-phyric basalt
highly oliv-phyric basalt
sandstone
aphyric basalt
aphyric basalt
aphyric basalt
sparsely oliv-phyric basalt
sparsely oliv-phyric basalt
aphyric to moderately oliv-phyric basalt
ash
ash
highly oliv-phyric basalt
ash
sparsely olivine-phyric basalt
aphyric basalt
ash
moderately-to-highly oliv/plag-phyric basalt
soil
aphyric basalt
ash



no R88
R122
ML
MK
moderately-to-highly oliv/plag-phyric basalt
soil
aphyric basalt
ash
aphyric basalt
highly oliv-phyric basalt
highly oliv-phyric basalt
sparsely-to-moderately oliv-phyric basalt
30 - highly oliv-phyric basalt
31 - aphyric basalt
moderately-to-highly oliv-phyric basalt
33 - soil
34 - ash
moderately oliv-phyric basalt
highly oliv-phyric basalt
moderately oliv-phyric basalt
38 - soil
39 - ash
moderately oliv-phyric basalt
41 - moderately oliv-phyric basalt
sparsely plag-phyric basalt
moderately oliv-phyric basalt
44 - ash
45 - aphyric basalt
moderately-to-highly oliv/plag-phyric basalt
moderately-to-highly oliv/plag-phyric basalt
aphyric basalt
moderately-to-highly plag/oliv-phyric basalt
highly plag/oliv-phyric basalt
soil
highly oliv-phyric basalt
moderately plag/oliv-phyric basalt
moderately plag/oliv-phyric basalt
highly oliv-phyric basalt
sparsely-to-moderately oliv-phyric basalt
highly oliv-phyric basalt


highly oliv-phyric basalt
56 sparsely-to-moderately oliv-phyric basalt
57 highly oliv-phyric basalt
58 moderately oliv-phyric basalt
59 aphyric to sparsely oliv-phyric basalt
60 highly oliv-phyric basalt
61 sparsely oliv/plag-phyric basalt
62 sparsely oliv-phyric basalt
63 sparsely oliv-phyric basalt
64 ash
65 highly oliv-phyric basalt
66 ash
67 sparsely oliv-phyric basalt
68 sparsely-to-moderately oliv-phyric basalt
69 sparsely oliv-phyric basalt
70 moderately oliv-phyric basalt
71 highly oliv-phyric basalt
72 aphyric to sparsely oliv-phyric basalt
73 highly oliv-phyric basalt
74 ash
75 aphyric basalt
ash
76 highly oliv-phyric basalt
77 moderately-to-highly oliv-phyric basalt
78 highly oliv-phyric basalt
79 highly oliv-phyric basalt
80 moderately oliv-phyric basalt
81 moderately oliv-phyric basalt
82 moderately oliv-phyric basalt
soil
83 highly oliv-phyric basalt
980
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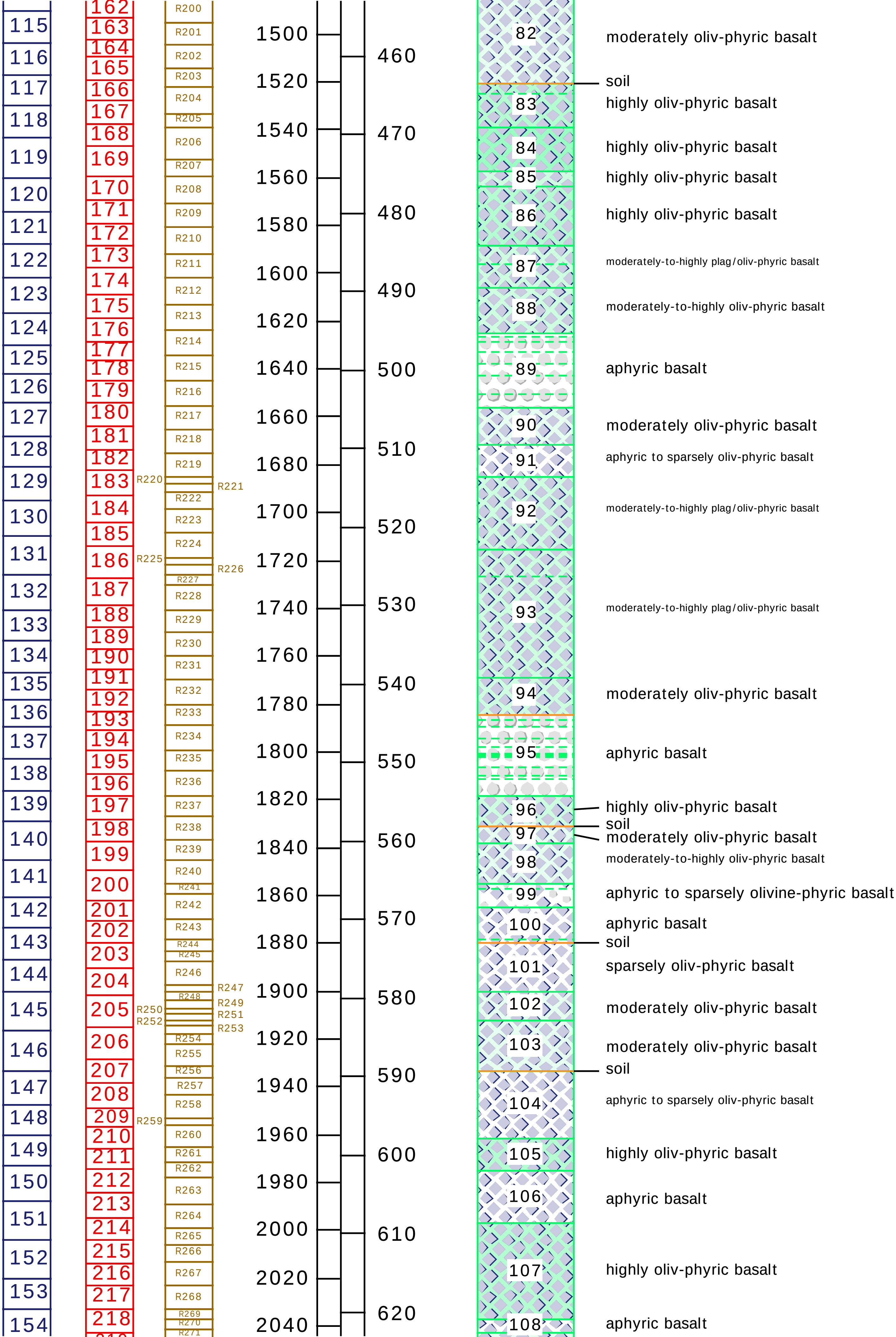
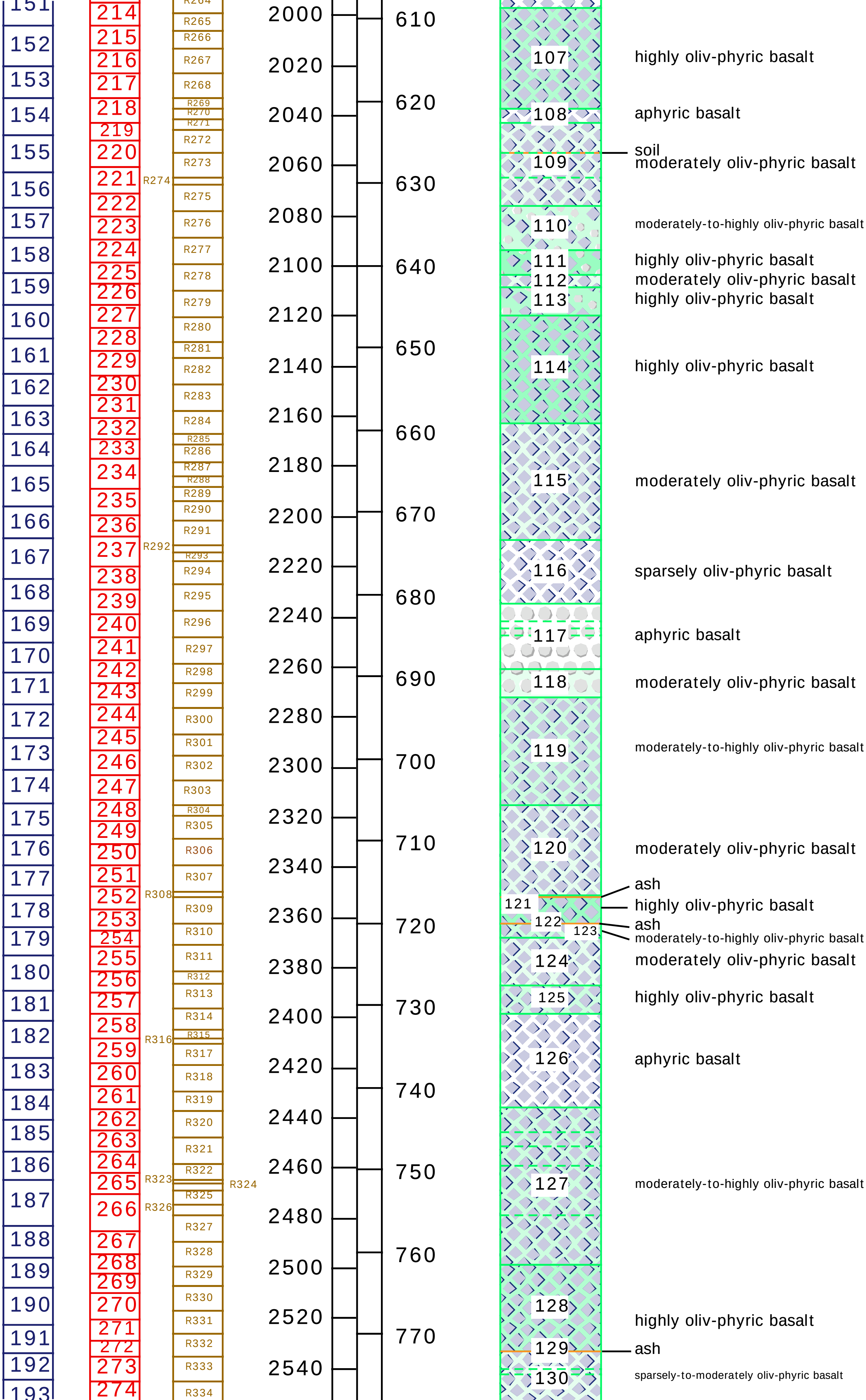
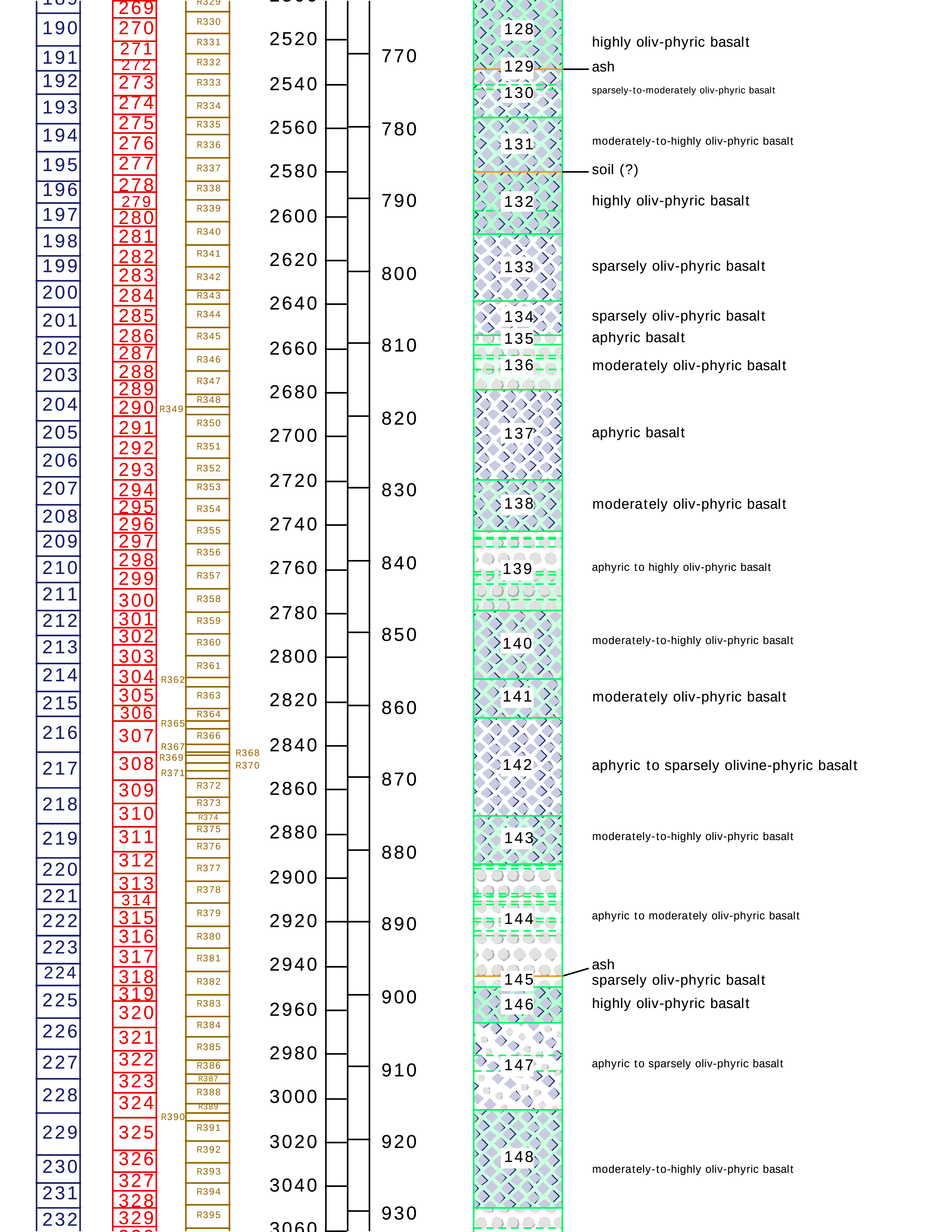
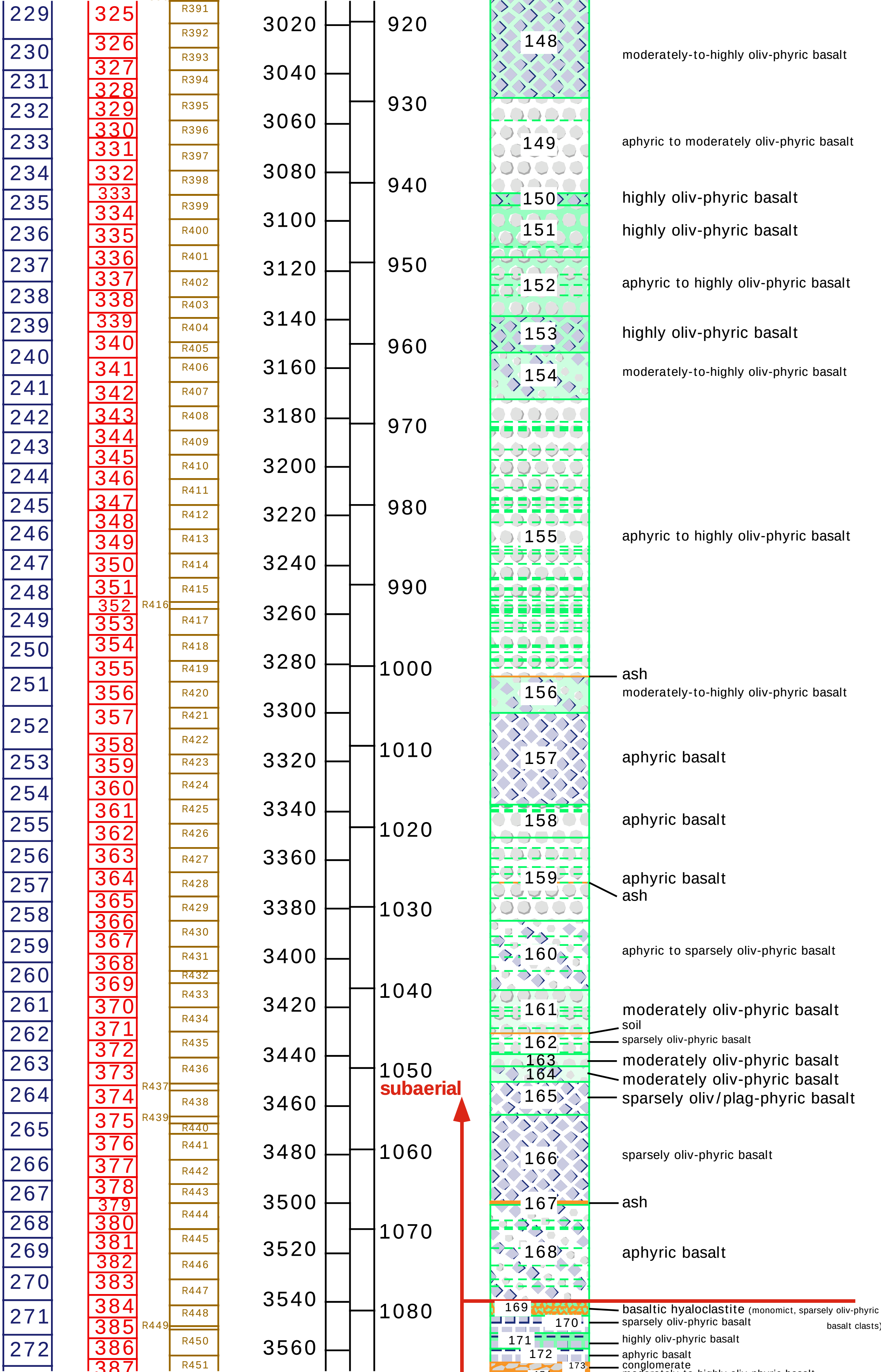

82
moderately oliv-phyric basalt
soil
83
highly oliv-phyric basalt
84
highly oliv-phyric basalt
85
highly oliv-phyric basalt
86
highly oliv-phyric basalt
87
moderately-to-highly plag/oliv-phyric basalt
88
moderately-to-highly oliv-phyric basalt
89
aphyric basalt
90
moderately oliv-phyric basalt
91
aphyric to sparsely oliv-phyric basalt
92
moderately-to-highly plag/oliv-phyric basalt
93
moderately-to-highly plag/oliv-phyric basalt
94
moderately oliv-phyric basalt
95
aphyric basalt
96
highly oliv-phyric basalt
soil
97
moderately oliv-phyric basalt
98
moderately-to-highly oliv-phyric basalt
99
aphyric to sparsely olivine-phyric basalt
100
aphyric basalt
soil
101
sparsely oliv-phyric basalt
102
moderately oliv-phyric basalt
103
moderately oliv-phyric basalt
soil
104
aphyric to sparsely oliv-phyric basalt
105
highly oliv-phyric basalt
106
aphyric basalt
107
highly oliv-phyric basalt
108
aphyric basalt



highly oliv-phyric basalt
aphyric basalt
soil
moderately oliv-phyric basalt
moderately-to-highly oliv-phyric basalt
highly oliv-phyric basalt
moderately oliv-phyric basalt
highly oliv-phyric basalt
highly oliv-phyric basalt
moderately oliv-phyric basalt
sparsely oliv-phyric basalt
aphyric basalt
moderately oliv-phyric basalt
moderately-to-highly oliv-phyric basalt
moderately oliv-phyric basalt
ash
highly oliv-phyric basalt
ash
moderately-to-highly oliv-phyric basalt
moderately oliv-phyric basalt
highly oliv-phyric basalt
aphyric basalt
moderately-to-highly oliv-phyric basalt
highly oliv-phyric basalt
ash
sparsely-to-moderately oliv-phyric basalt



128
highly oliv-phyric basalt
129
ash
130
sparsely-to-moderately oliv-phyric basalt
131
moderately-to-highly oliv-phyric basalt
soil (?)
132
highly oliv-phyric basalt
133
sparsely oliv-phyric basalt
134
sparsely oliv-phyric basalt
135
aphyric basalt
136
moderately oliv-phyric basalt
137
aphyric basalt
138
moderately oliv-phyric basalt
139
aphyric to highly oliv-phyric basalt
140
moderately-to-highly oliv-phyric basalt
141
moderately oliv-phyric basalt
142
aphyric to sparsely olivine-phyric basalt
143
moderately-to-highly oliv-phyric basalt
144
aphyric to moderately oliv-phyric basalt
ash
145
sparsely oliv-phyric basalt
146
highly oliv-phyric basalt
147
aphyric to sparsely oliv-phyric basalt
148
moderately-to-highly oliv-phyric basalt



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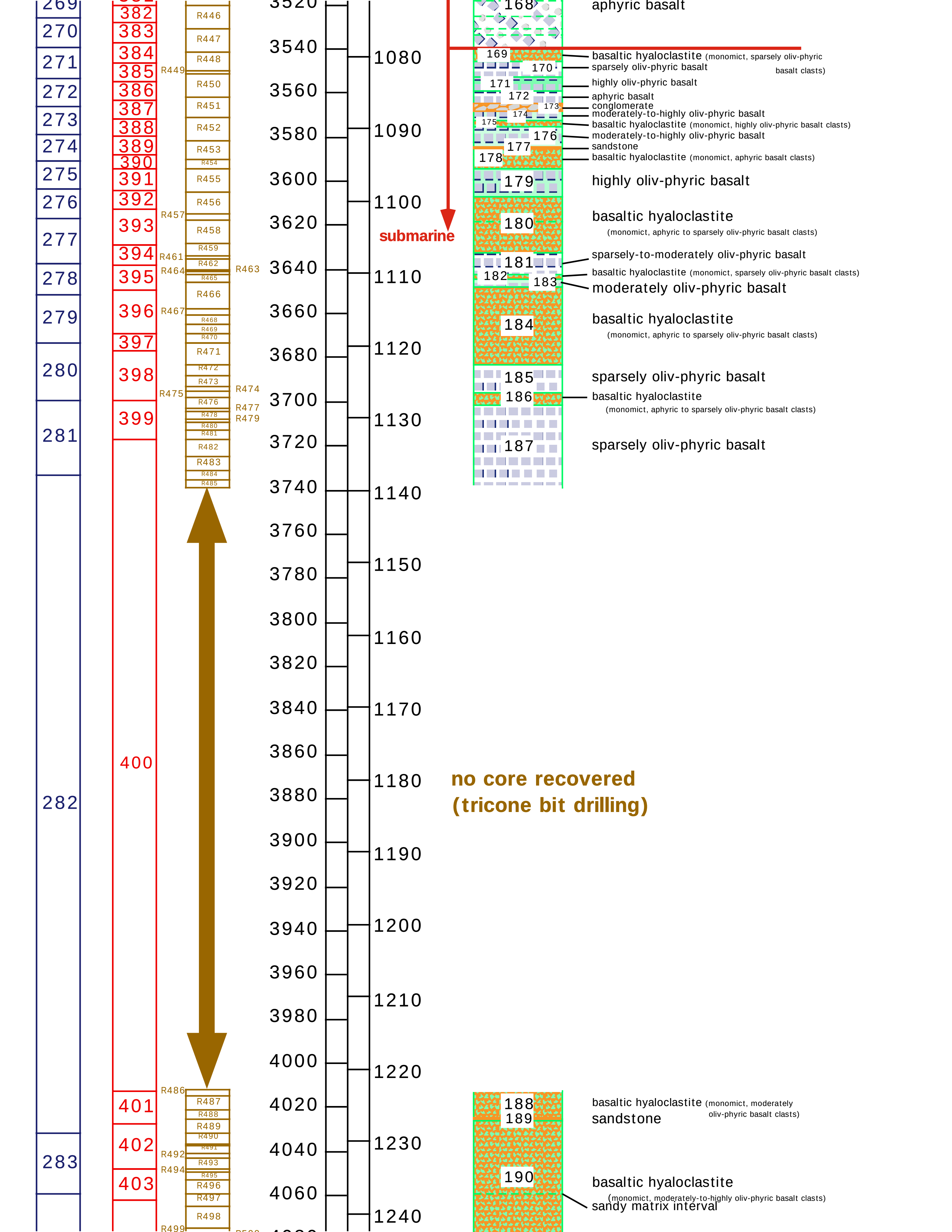
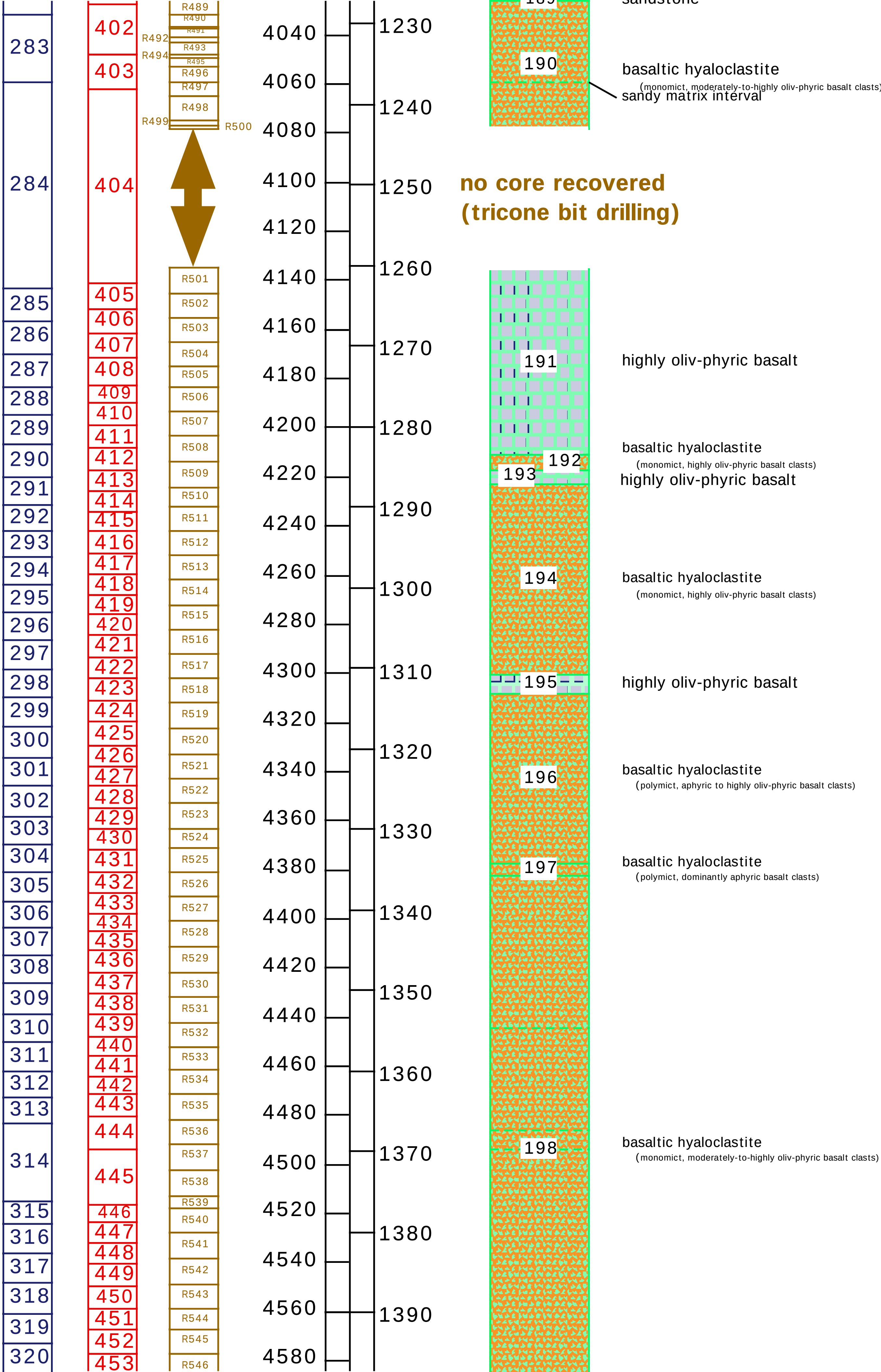
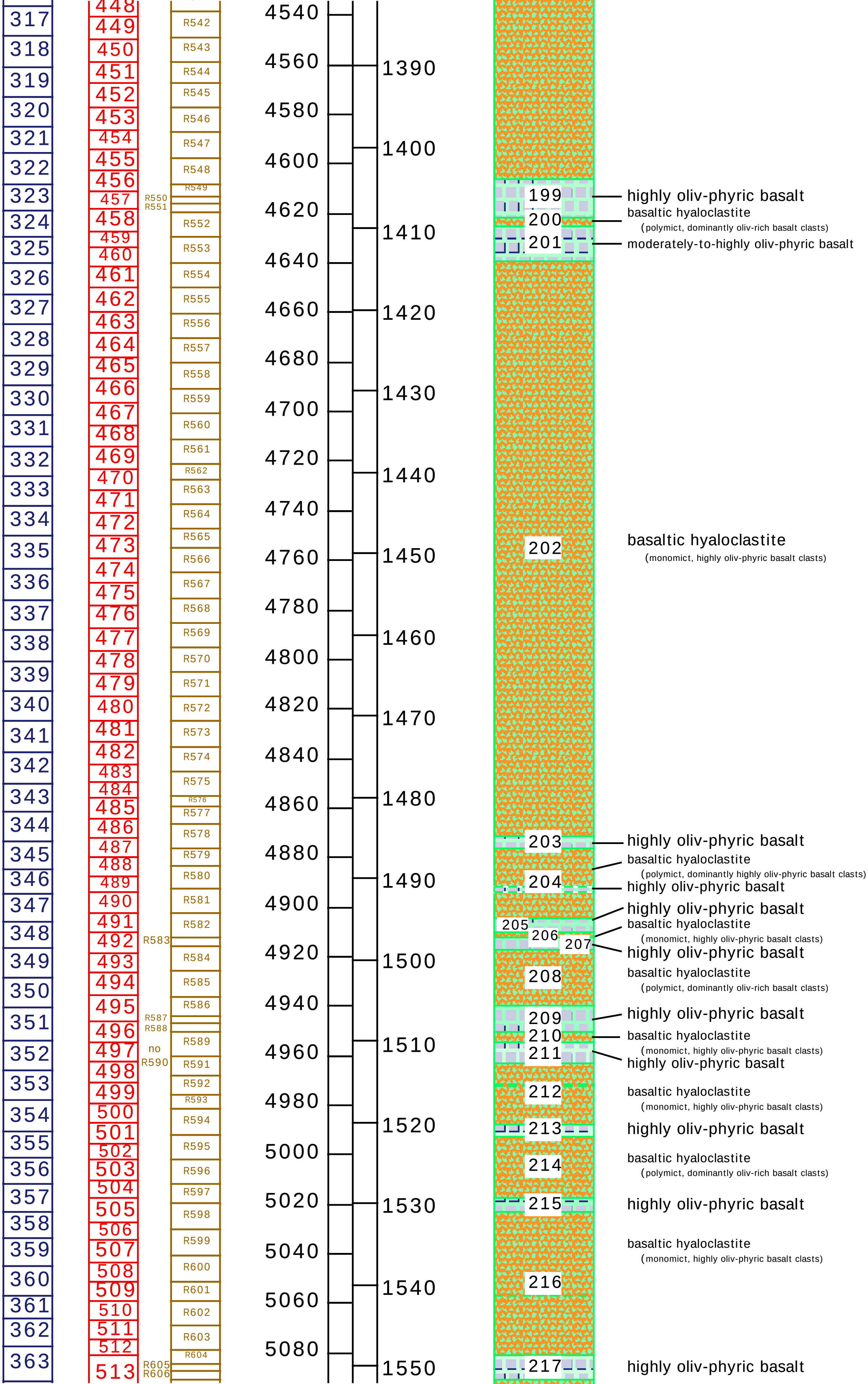
subaerial
148 moderately-to-highly oliv-phyric basalt
149 aphyric to moderately oliv-phyric basalt
150 highly oliv-phyric basalt
151 highly oliv-phyric basalt
152 aphyric to highly oliv-phyric basalt
153 highly oliv-phyric basalt
154 moderately-to-highly oliv-phyric basalt
155 aphyric to highly oliv-phyric basalt
ash
156 moderately-to-highly oliv-phyric basalt
157 aphyric basalt
158 aphyric basalt
159 aphyric basalt
ash
160 aphyric to sparsely oliv-phyric basalt
161 moderately oliv-phyric basalt
soil
162 sparsely oliv-phyric basalt
163 moderately oliv-phyric basalt
164 moderately oliv-phyric basalt
165 sparsely oliv/plag-phyric basalt
166 sparsely oliv-phyric basalt
167 ash
168 aphyric basalt
169 basaltic hyaloclastite (monomict, sparsely oliv-phyric basalt clasts)
170 sparsely oliv-phyric basalt
171 highly oliv-phyric basalt
172 aphyric basalt
173 conglomerate



aphyric basalt
basaltic hyaloclastite (monomict, sparsely oliv-phyric basalt clasts)
sparsely oliv-phyric basalt
highly oliv-phyric basalt
aphyric basalt
conglomerate
moderately-to-highly oliv-phyric basalt
basaltic hyaloclastite (monomict, highly oliv-phyric basalt clasts)
moderately-to-highly oliv-phyric basalt
sandstone
basaltic hyaloclastite (monomict, aphyric basalt clasts)
highly oliv-phyric basalt
basaltic hyaloclastite
(monomict, aphyric to sparsely oliv-phyric basalt clasts)
submarine
sparsely-to-moderately oliv-phyric basalt
basaltic hyaloclastite (monomict, sparsely oliv-phyric basalt clasts)
moderately oliv-phyric basalt
basaltic hyaloclastite
(monomict, aphyric to sparsely oliv-phyric basalt clasts)
sparsely oliv-phyric basalt
basaltic hyaloclastite
(monomict, aphyric to sparsely oliv-phyric basalt clasts)
sparsely oliv-phyric basalt
no core recovered
(tricone bit drilling)
basaltic hyaloclastite (monomict, moderately oliv-phyric basalt clasts)
sandstone
basaltic hyaloclastite
(monomict, moderately-to-highly oliv-phyric basalt clasts)
sandy matrix interval


sandstone
189
190
basaltic hyaloclastite
(monomict, moderately-to-highly oliv-phyric basalt clasts)
sandy matrix interval
no core recovered
(tricone bit drilling)
191
highly oliv-phyric basalt
192
basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
193
highly oliv-phyric basalt
194
basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
195
highly oliv-phyric basalt
196
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
197
basaltic hyaloclastite
(polymict, dominantly aphyric basalt clasts)
198
basaltic hyaloclastite
(monomict, moderately-to-highly oliv-phyric basalt clasts)



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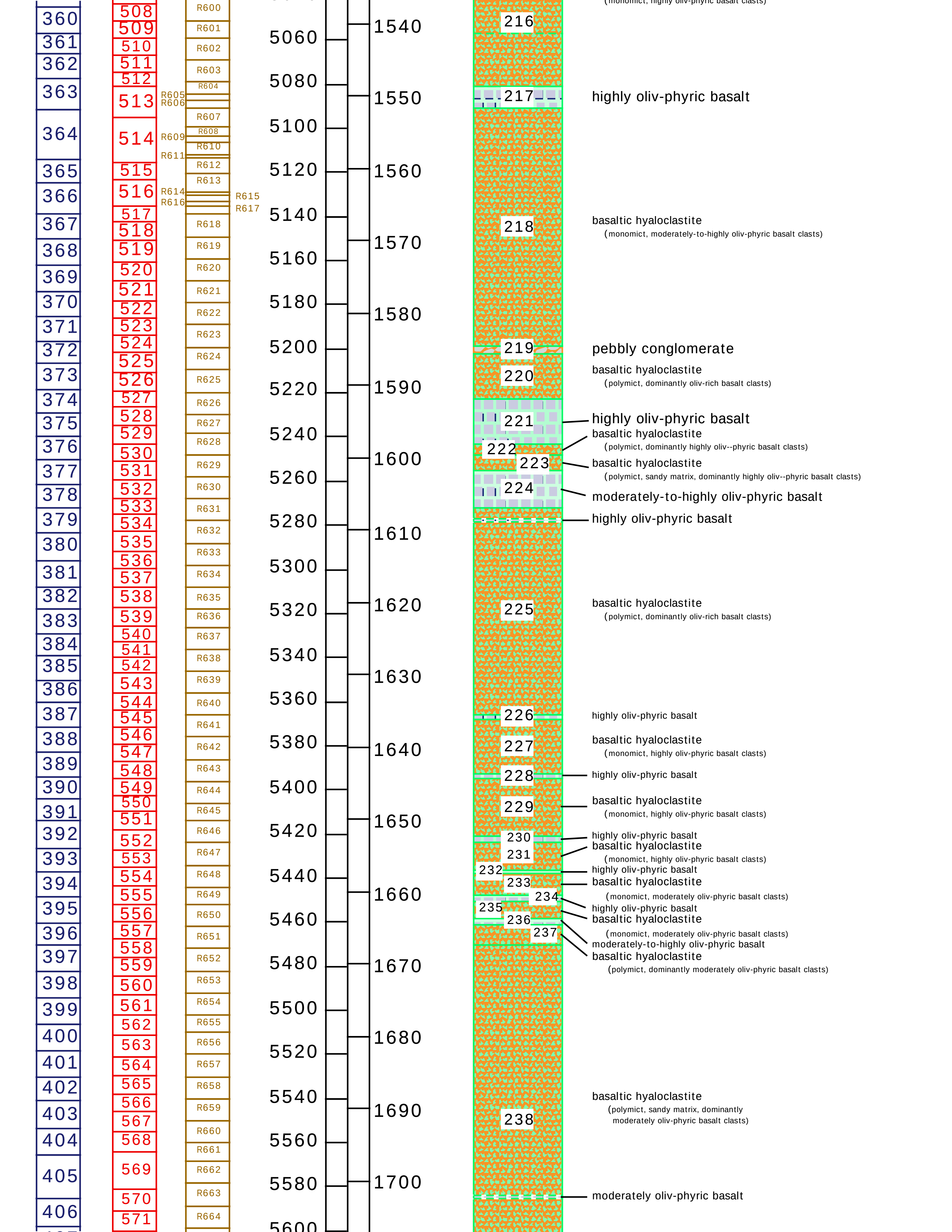
199 highly oliv-phyric basalt
200 basaltic hyaloclastite (polymict, dominantly oliv-rich basalt clasts)
201 moderately-to-highly oliv-phyric basalt
202 basaltic hyaloclastite (monomict, highly oliv-phyric basalt clasts)
203 highly oliv-phyric basalt
basaltic hyaloclastite (polymict, dominantly highly oliv-phyric basalt clasts)
204 highly oliv-phyric basalt
205 highly oliv-phyric basalt
206 basaltic hyaloclastite (monomict, highly oliv-phyric basalt clasts)
207 highly oliv-phyric basalt
208 basaltic hyaloclastite (polymict, dominantly oliv-rich basalt clasts)
209 highly oliv-phyric basalt
210 basaltic hyaloclastite (monomict, highly oliv-phyric basalt clasts)
211 highly oliv-phyric basalt
212 basaltic hyaloclastite (monomict, highly oliv-phyric basalt clasts)
213 highly oliv-phyric basalt
214 basaltic hyaloclastite (polymict, dominantly oliv-rich basalt clasts)
215 highly oliv-phyric basalt
216 basaltic hyaloclastite (monomict, highly oliv-phyric basalt clasts)
217 highly oliv-phyric basalt


(monomict, highly oliv-phyric basalt clasts)
216
217 highly oliv-phyric basalt
218 basaltic hyaloclastite
(monomict, moderately-to-highly oliv-phyric basalt clasts)
219 pebbly conglomerate
220 basaltic hyaloclastite
(polymict, dominantly oliv-rich basalt clasts)
221 highly oliv-phyric basalt
222 basaltic hyaloclastite
(polymict, dominantly highly oliv--phyric basalt clasts)
223 basaltic hyaloclastite
(polymict, sandy matrix, dominantly highly oliv--phyric basalt clasts)
224 moderately-to-highly oliv-phyric basalt
highly oliv-phyric basalt
225 basaltic hyaloclastite
(polymict, dominantly oliv-rich basalt clasts)
226 highly oliv-phyric basalt
227 basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
228 highly oliv-phyric basalt
229 basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
230 highly oliv-phyric basalt
231 basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
232 highly oliv-phyric basalt
233 basaltic hyaloclastite
(monomict, moderately oliv-phyric basalt clasts)
234 highly oliv-phyric basalt
235
236 basaltic hyaloclastite
(monomict, moderately oliv-phyric basalt clasts)
237 moderately-to-highly oliv-phyric basalt
basaltic hyaloclastite
(polymict, dominantly moderately oliv-phyric basalt clasts)
238 basaltic hyaloclastite
(polymict, sandy matrix, dominantly
moderately oliv-phyric basalt clasts)
moderately oliv-phyric basalt
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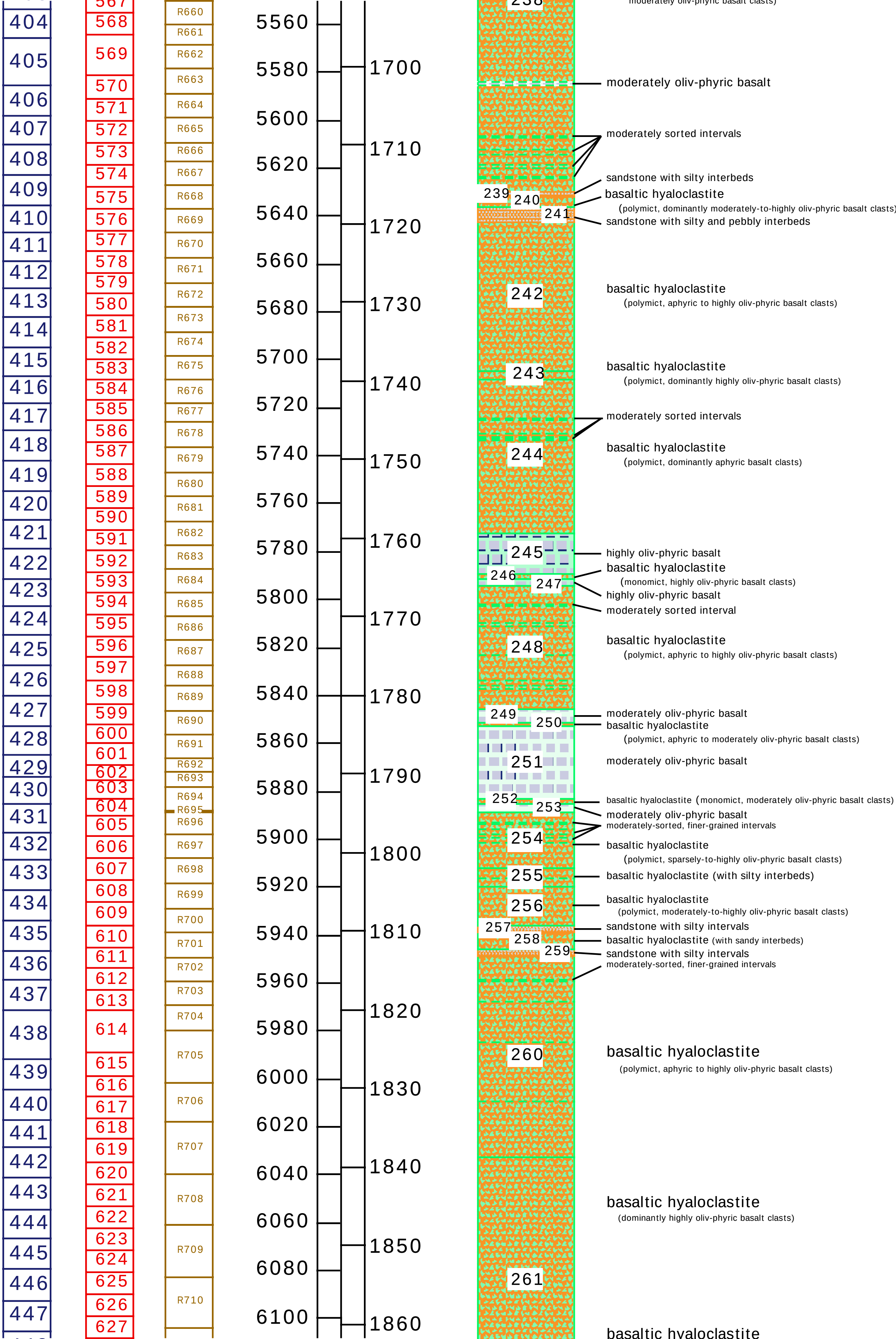

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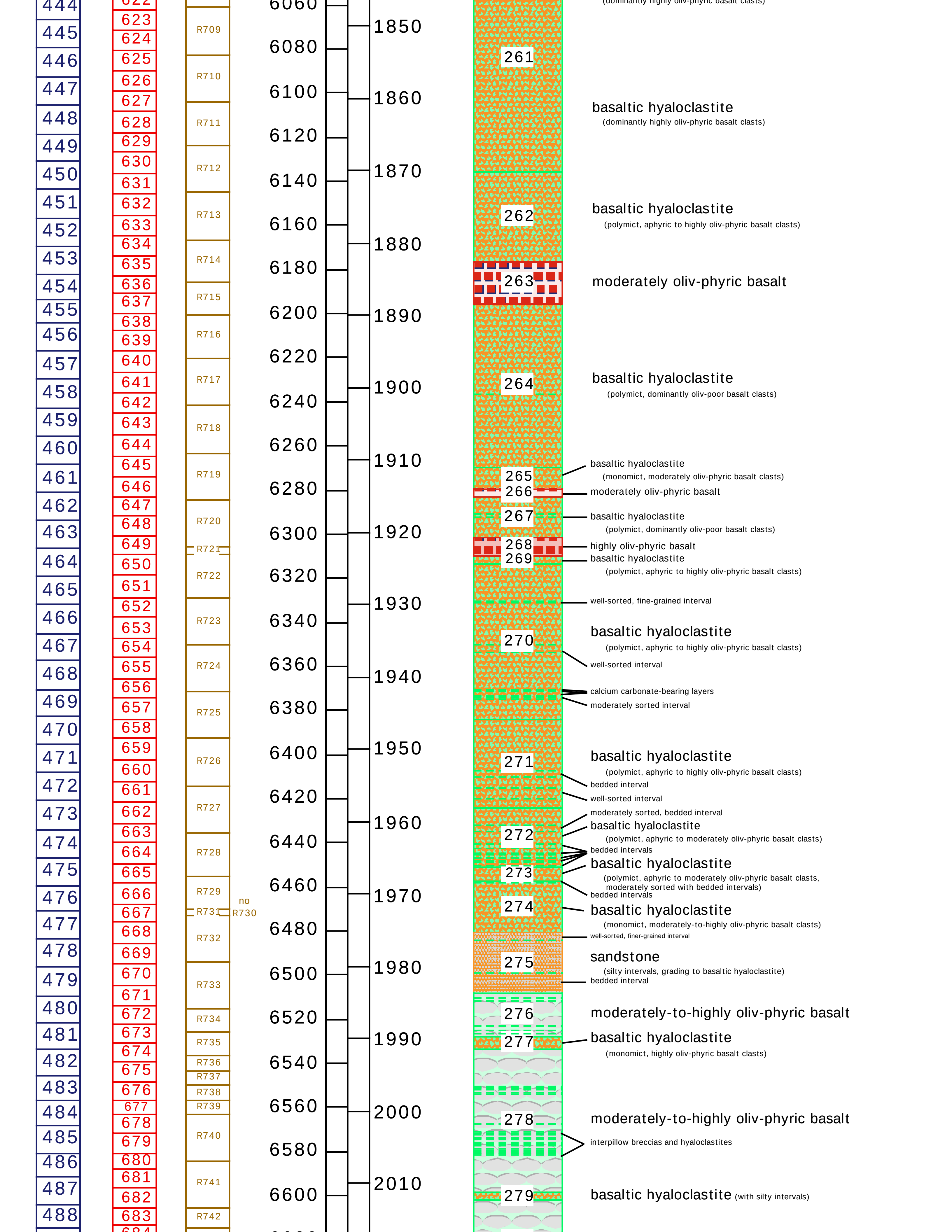
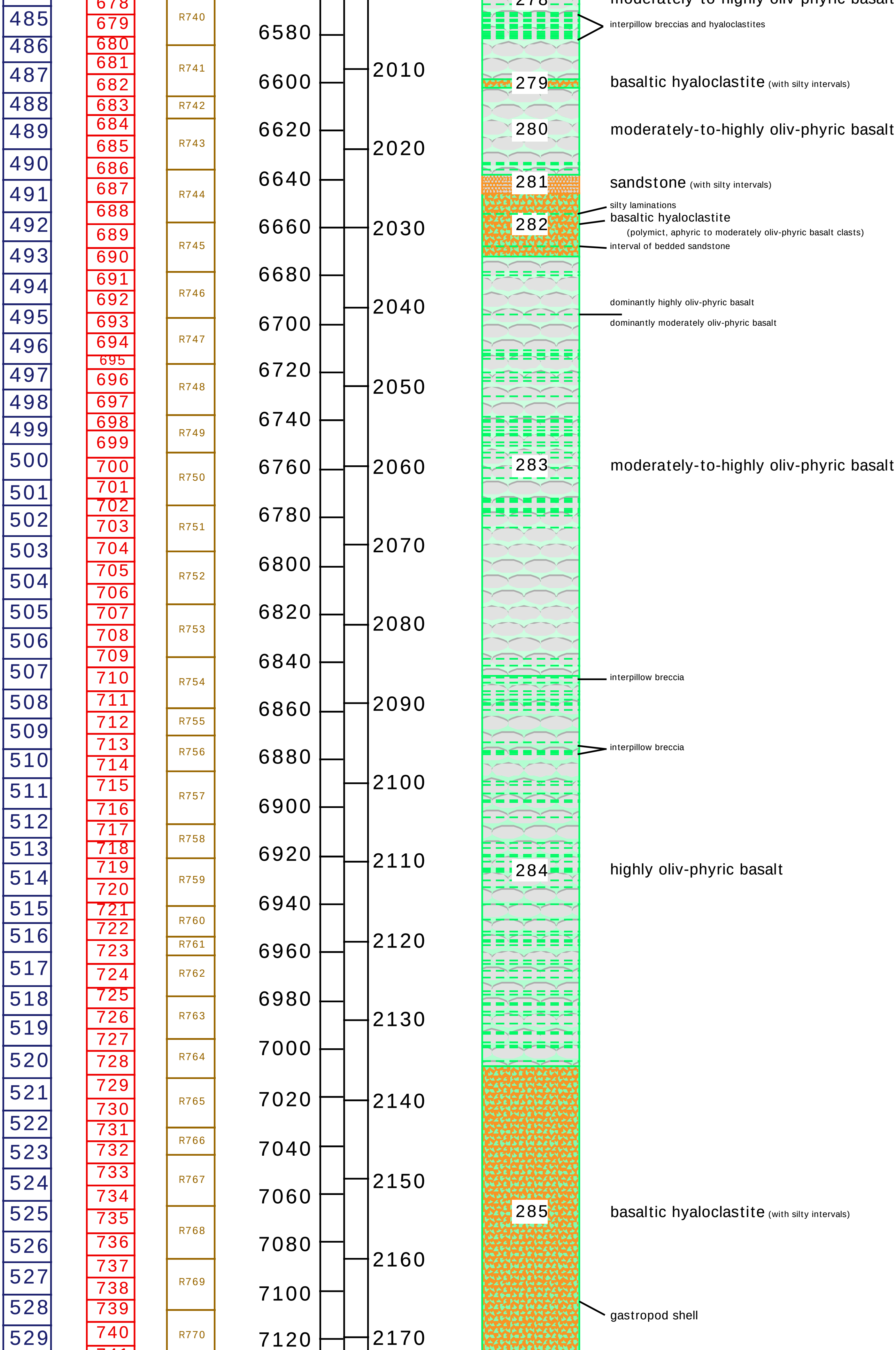
moderately oliv-phyric basalt clasts)
moderately oliv-phyric basalt
moderately sorted intervals
239
240
241
sandstone with silty interbeds
basaltic hyaloclastite
(polymict, dominantly moderately-to-highly oliv-phyric basalt clasts)
sandstone with silty and pebbly interbeds
242
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
243
basaltic hyaloclastite
(polymict, dominantly highly oliv-phyric basalt clasts)
moderately sorted intervals
244
basaltic hyaloclastite
(polymict, dominantly aphyric basalt clasts)
245
highly oliv-phyric basalt
246
247
basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
highly oliv-phyric basalt
moderately sorted interval
248
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
249
250
moderately oliv-phyric basalt
basaltic hyaloclastite
(polymict, aphyric to moderately oliv-phyric basalt clasts)
251
moderately oliv-phyric basalt
252
253
basaltic hyaloclastite (monomict, moderately oliv-phyric basalt clasts)
moderately oliv-phyric basalt
moderately-sorted, finer-grained intervals
254
basaltic hyaloclastite
(polymict, sparsely-to-highly oliv-phyric basalt clasts)
255
basaltic hyaloclastite (with silty interbeds)
256
basaltic hyaloclastite
(polymict, moderately-to-highly oliv-phyric basalt clasts)
257
258
259
sandstone with silty intervals
basaltic hyaloclastite (with sandy interbeds)
sandstone with silty intervals
moderately-sorted, finer-grained intervals
260
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
261
basaltic hyaloclastite
(dominantly highly oliv-phyric basalt clasts)
basaltic hyaloclastite



(dominantly highly oliv-phyric basalt clasts)
261
basaltic hyaloclastite
(dominantly highly oliv-phyric basalt clasts)
262
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
263
moderately oliv-phyric basalt
264
basaltic hyaloclastite
(polymict, dominantly oliv-poor basalt clasts)
265
basaltic hyaloclastite
(monomict, moderately oliv-phyric basalt clasts)
266
moderately oliv-phyric basalt
267
basaltic hyaloclastite
(polymict, dominantly oliv-poor basalt clasts)
268
highly oliv-phyric basalt
269
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
well-sorted, fine-grained interval
270
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
well-sorted interval
calcium carbonate-bearing layers
moderately sorted interval
271
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
bedded interval
well-sorted interval
moderately sorted, bedded interval
272
basaltic hyaloclastite
(polymict, aphyric to moderately oliv-phyric basalt clasts)
bedded intervals
273
basaltic hyaloclastite
(polymict, aphyric to moderately oliv-phyric basalt clasts, moderately sorted with bedded intervals)
bedded intervals
274
basaltic hyaloclastite
(monomict, moderately-to-highly oliv-phyric basalt clasts)
well-sorted, finer-grained interval
275
sandstone
(silty intervals, grading to basaltic hyaloclastite)
bedded interval
276
moderately-to-highly oliv-phyric basalt
277
basaltic hyaloclastite
(monomict, highly oliv-phyric basalt clasts)
278
moderately-to-highly oliv-phyric basalt
interpillow breccias and hyaloclastites
279
basaltic hyaloclastite (with silty intervals)
no R730



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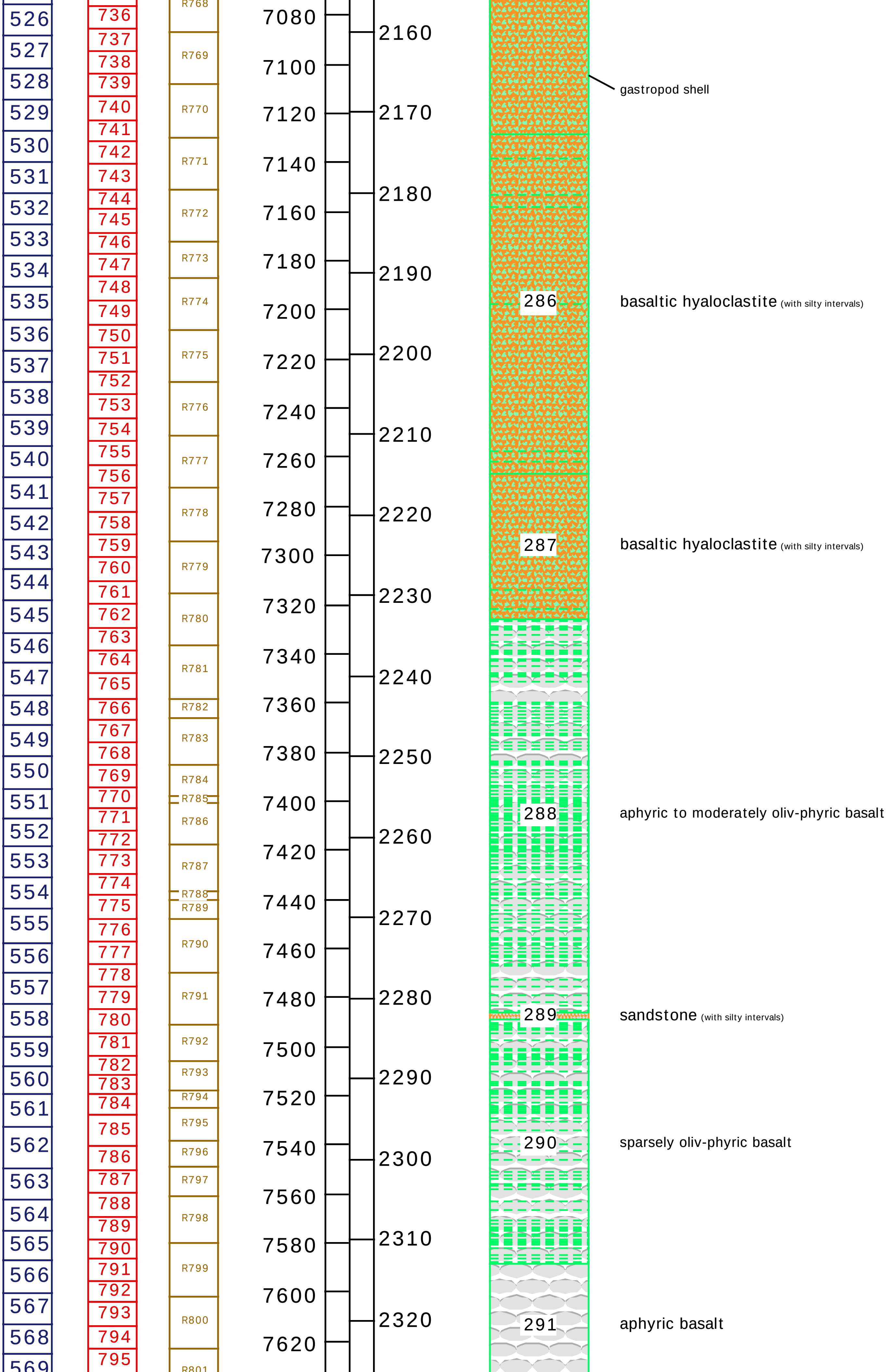
interpillow breccias and hyaloclastites
279
basaltic hyaloclastite (with silty intervals)
280
moderately-to-highly oliv-phyric basalt
281
sandstone (with silty intervals)
silty laminations
282
basaltic hyaloclastite
(polymict, aphyric to moderately oliv-phyric basalt clasts)
interval of bedded sandstone
dominantly highly oliv-phyric basalt
dominantly moderately oliv-phyric basalt
283
moderately-to-highly oliv-phyric basalt
interpillow breccia
interpillow breccia
284
highly oliv-phyric basalt
285
basaltic hyaloclastite (with silty intervals)
gastropod shell



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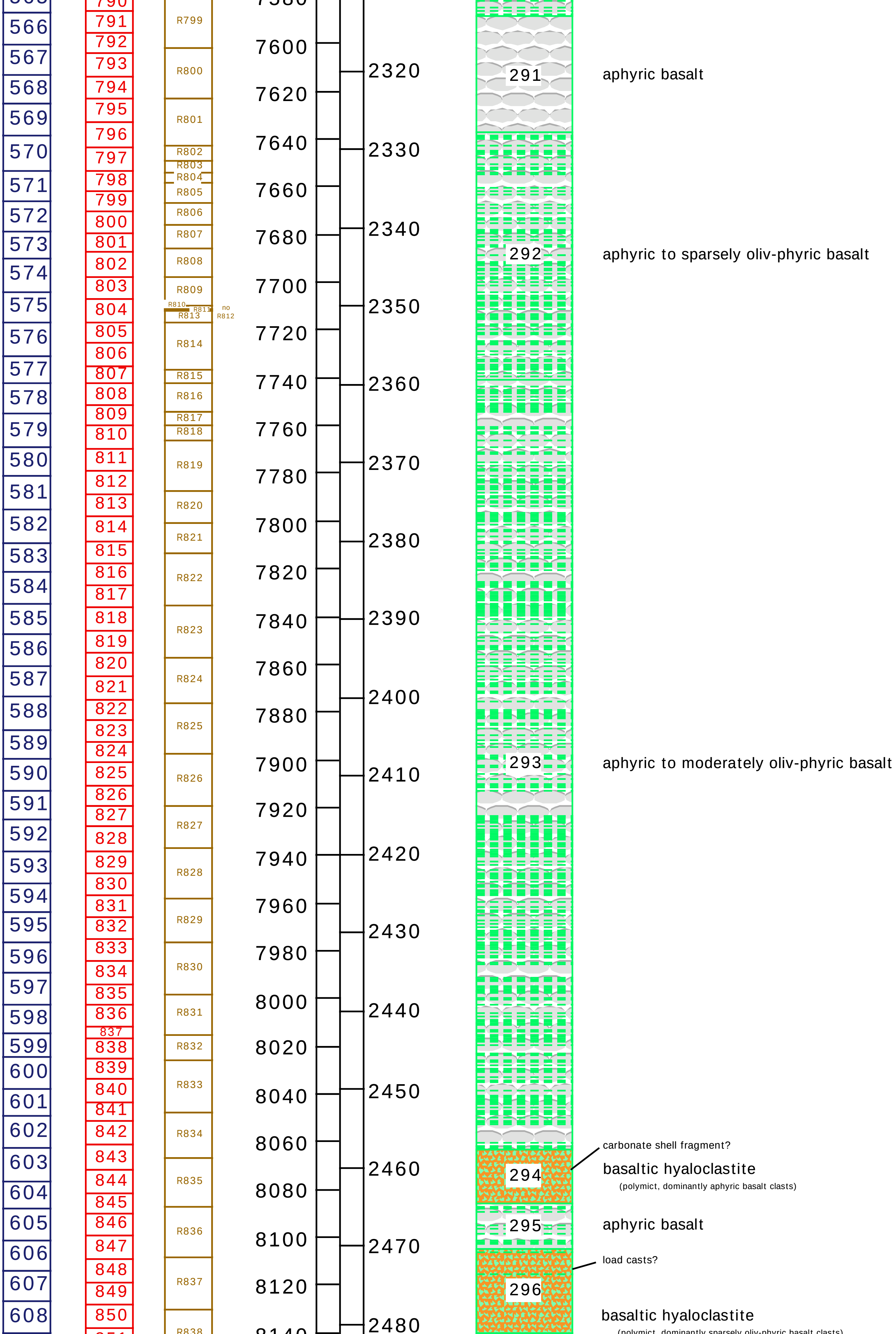
gastropod shell
286
basaltic hyaloclastite (with silty intervals)
287
basaltic hyaloclastite (with silty intervals)
288
aphyric to moderately oliv-phyric basalt
289
sandstone (with silty intervals)
290
sparsely oliv-phyric basalt
291
aphyric basalt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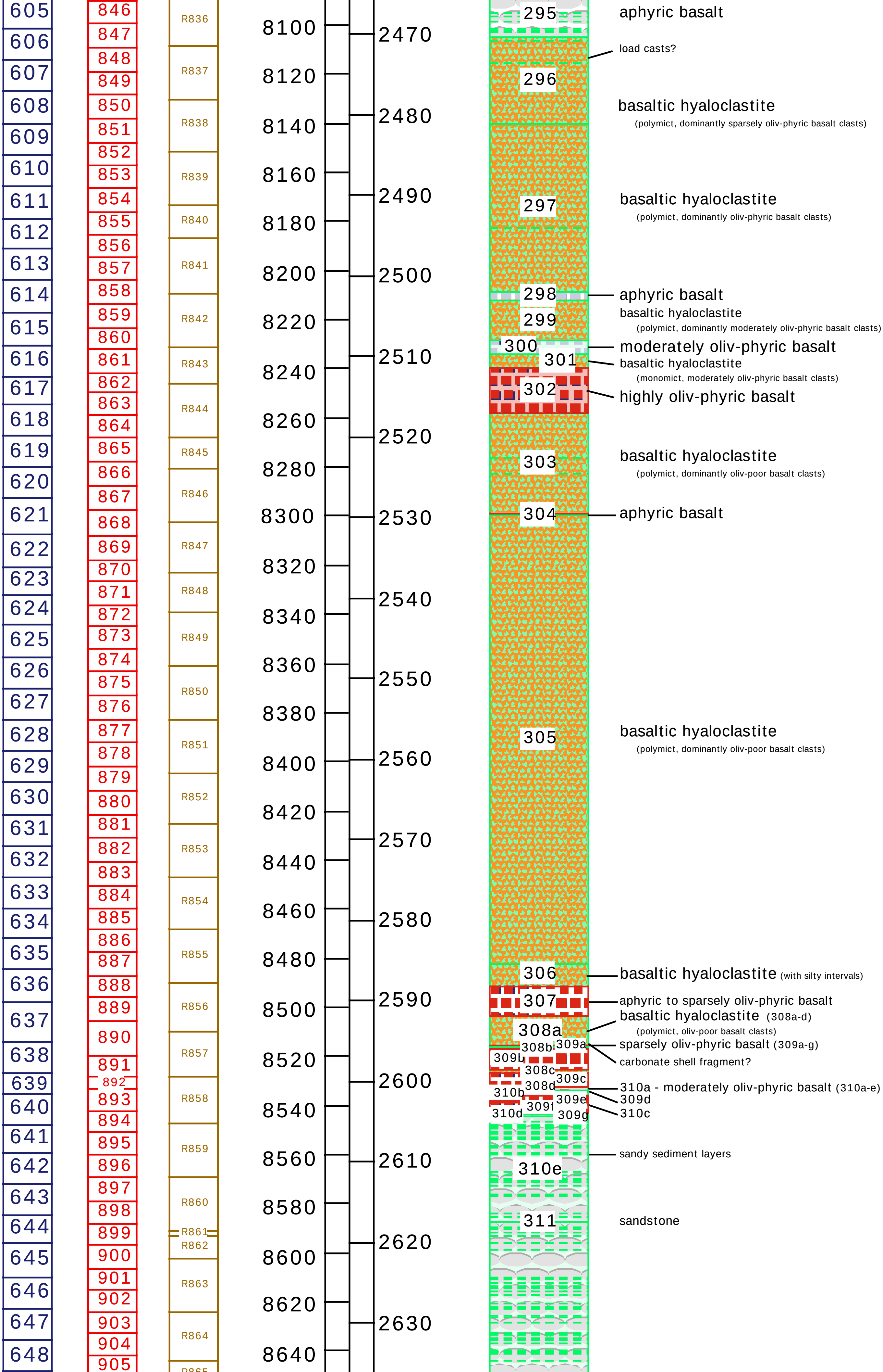
291
aphyric basalt
292
aphyric to sparsely oliv-phyric basalt
293
aphyric to moderately oliv-phyric basalt
carbonate shell fragment?
294
basaltic hyaloclastite
(polymict, dominantly aphyric basalt clasts)
295
aphyric basalt
load casts?
296
basaltic hyaloclastite



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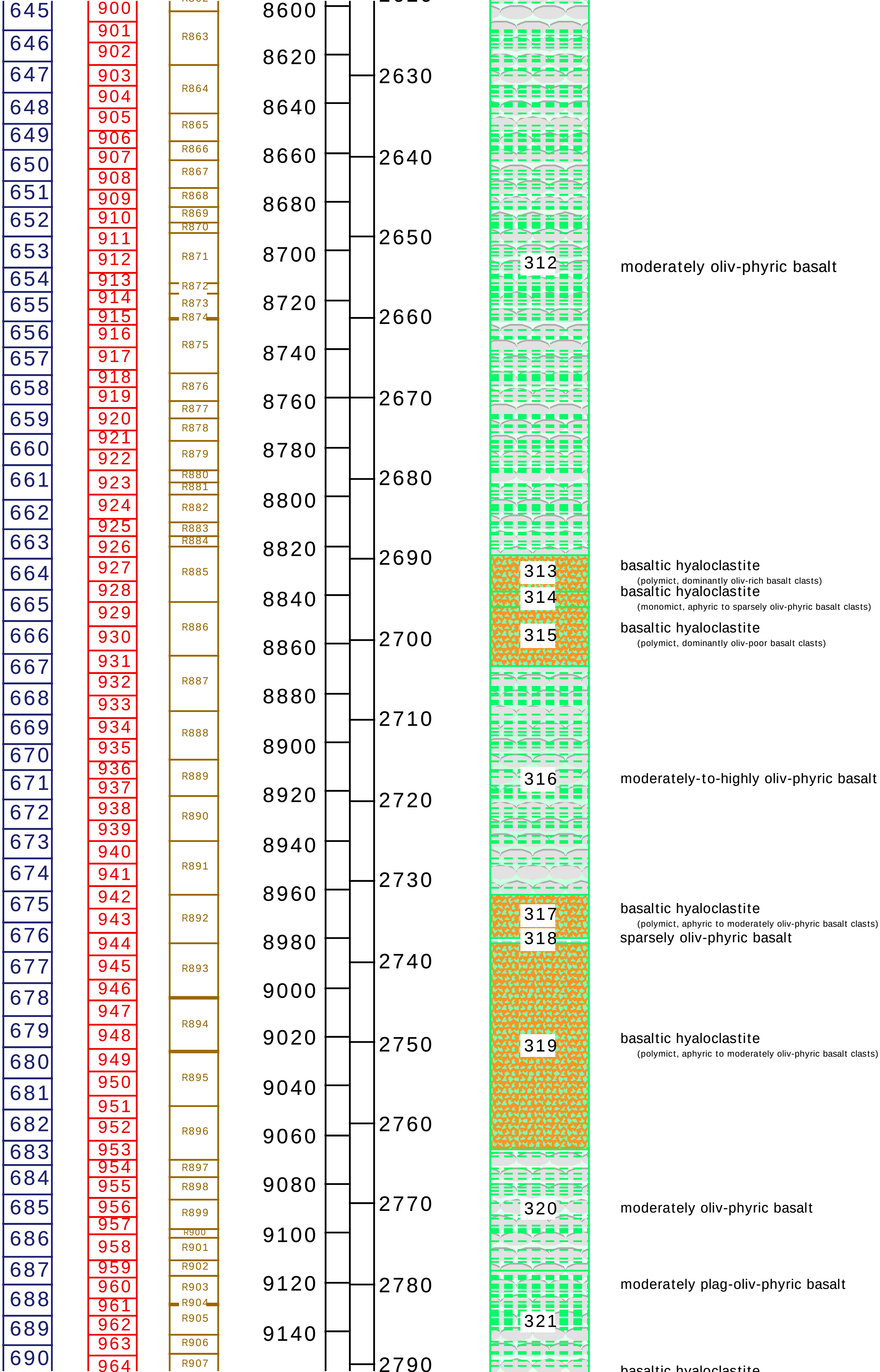
aphyric basalt
load casts?
296
basaltic hyaloclastite
(polymict, dominantly sparsely oliv-phyric basalt clasts)
297
basaltic hyaloclastite
(polymict, dominantly oliv-phyric basalt clasts)
298
aphyric basalt
299
basaltic hyaloclastite
(polymict, dominantly moderately oliv-phyric basalt clasts)
300
moderately oliv-phyric basalt
301
basaltic hyaloclastite
(monomict, moderately oliv-phyric basalt clasts)
302
highly oliv-phyric basalt
303
basaltic hyaloclastite
(polymict, dominantly oliv-poor basalt clasts)
304
aphyric basalt
305
basaltic hyaloclastite
(polymict, dominantly oliv-poor basalt clasts)
306
basaltic hyaloclastite (with silty intervals)
307
aphyric to sparsely oliv-phyric basalt
308a
basaltic hyaloclastite (308a-d)
(polymict, oliv-poor basalt clasts)
308b
309a
sparsely oliv-phyric basalt (309a-g)
309b
carbonate shell fragment?
308c
309c
308d
310b
310a - moderately oliv-phyric basalt (310a-e)
309f
309e
309d
310d
309g
310c
sandy sediment layers
310e
311
sandstone



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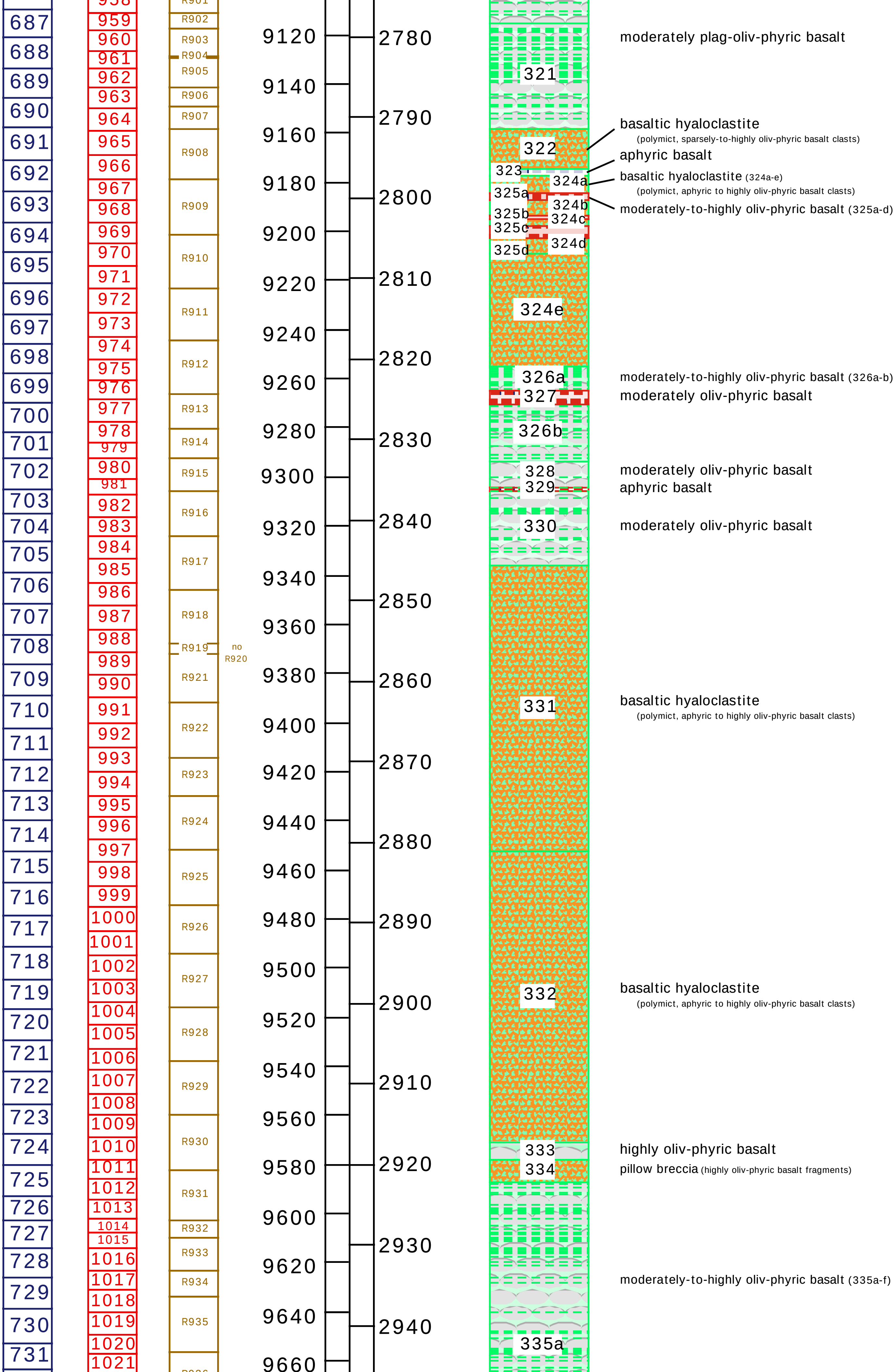
moderately oliv-phyric basalt
313
basaltic hyaloclastite
(polymict, dominantly oliv-rich basalt clasts)
314
basaltic hyaloclastite
(monomict, aphyric to sparsely oliv-phyric basalt clasts)
315
basaltic hyaloclastite
(polymict, dominantly oliv-poor basalt clasts)
316
moderately-to-highly oliv-phyric basalt
317
basaltic hyaloclastite
(polymict, aphyric to moderately oliv-phyric basalt clasts)
318
sparsely oliv-phyric basalt
319
basaltic hyaloclastite
(polymict, aphyric to moderately oliv-phyric basalt clasts)
320
moderately oliv-phyric basalt
moderately plag-oliv-phyric basalt
321
basaltic hyaloclastite



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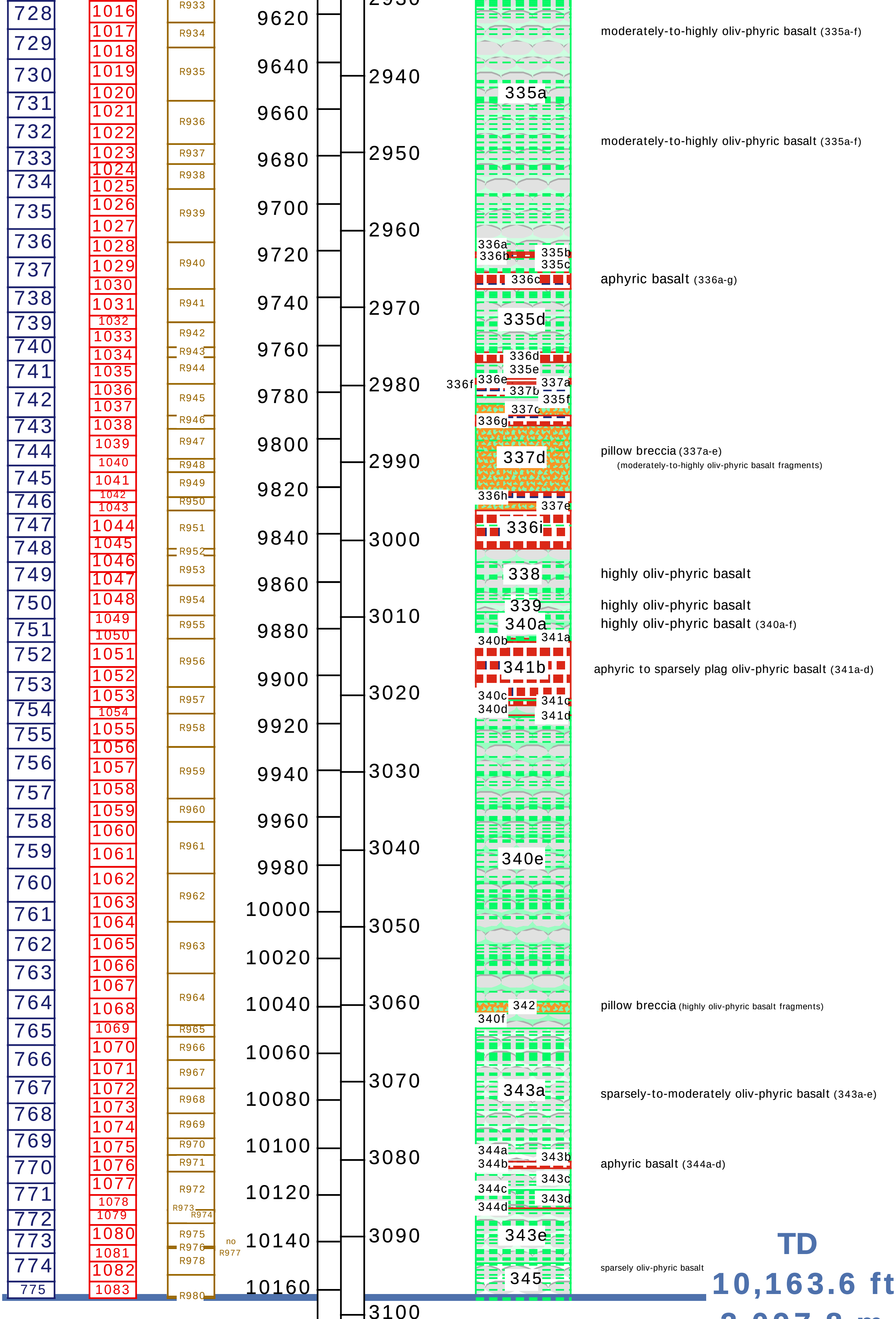
321
moderately plag-oliv-phyric basalt
322
basaltic hyaloclastite
(polymict, sparsely-to-highly oliv-phyric basalt clasts)
323
aphyric basalt
324a
basaltic hyaloclastite (324a-e)
(polymict, aphyric to highly oliv-phyric basalt clasts)
325a 325b 325c 325d
moderately-to-highly oliv-phyric basalt (325a-d)
324b 324c 324d 324e
326a
moderately-to-highly oliv-phyric basalt (326a-b)
327
moderately oliv-phyric basalt
326b
328
moderately oliv-phyric basalt
329
aphyric basalt
330
moderately oliv-phyric basalt
331
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
332
basaltic hyaloclastite
(polymict, aphyric to highly oliv-phyric basalt clasts)
333
highly oliv-phyric basalt
334
pillow breccia (highly oliv-phyric basalt fragments)
moderately-to-highly oliv-phyric basalt (335a-f)
335a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341c
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342
340f
343a
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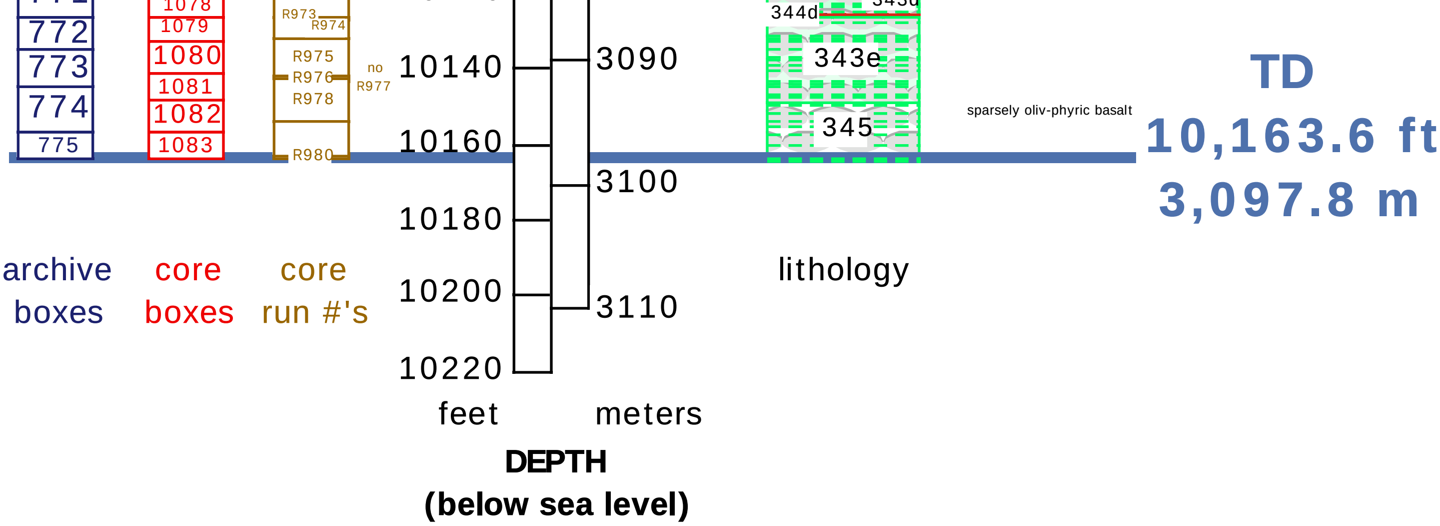
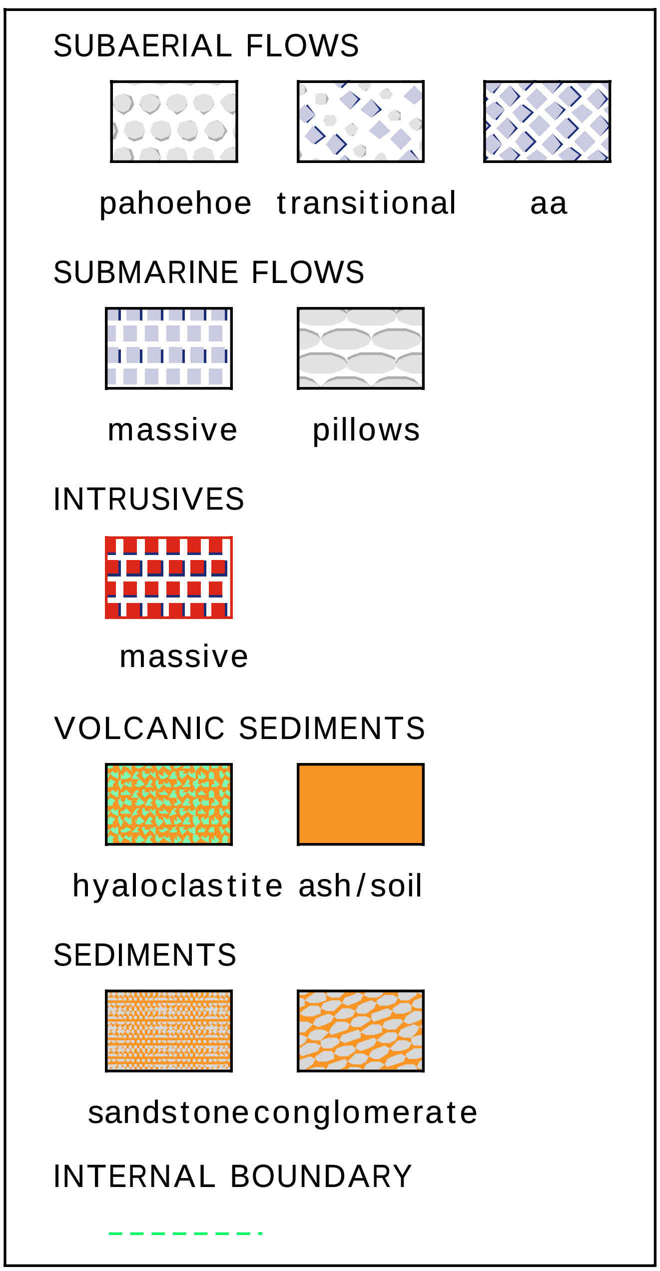
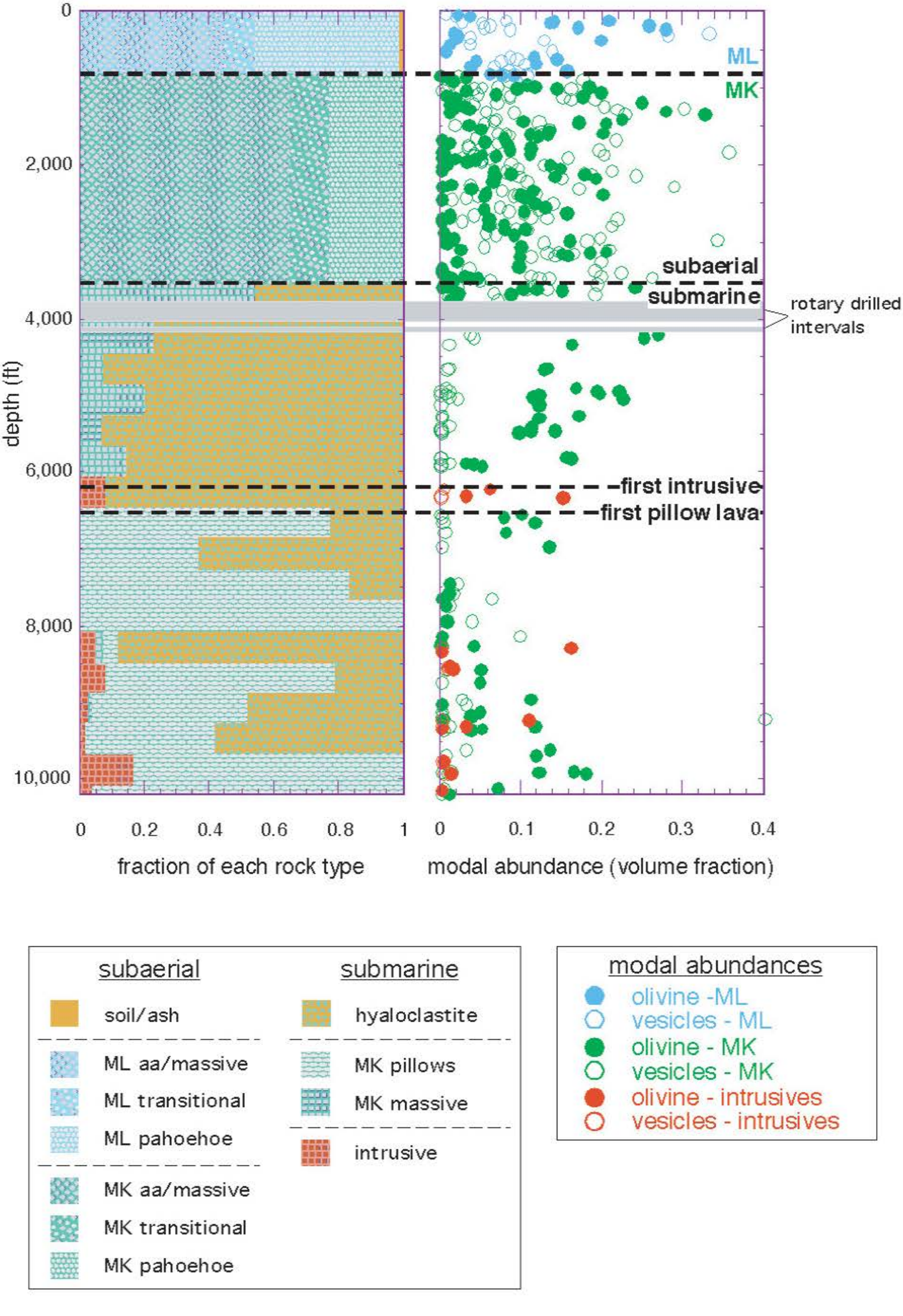
344d
343e
345
moderately-to-highly oliv-phyric basalt (335a-f)
moderately-to-highly oliv-phyric basalt (335a-f)
aphyric basalt (336a-g)
pillow breccia (337a-e)
(moderately-to-highly oliv-phyric basalt fragments)
highly oliv-phyric basalt
highly oliv-phyric basalt
highly oliv-phyric basalt (340a-f)
aphyric to sparsely plag oliv-phyric basalt (341a-d)
pillow breccia (highly oliv-phyric basalt fragments)
sparsely-to-moderately oliv-phyric basalt (343a-e)
aphyric basalt (344a-d)
sparsely oliv-phyric basalt
TD
10,163.6 ft



HSDP preliminary results
10/30/99





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2,000
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depth (ft)
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fraction of each rock type
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0.1
0.2
0.3
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modal abundance (volume fraction)
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MK
subaerial
submarine
rotary drilled intervals
first intrusive
first pillow lava
subaerial
soil/ash
ML aa/massive
ML transitional
ML pahoehoe
MK aa/massive
MK transitional
MK pahoehoe
submarine
hyaloclastite
MK pillows
MK massive
intrusive
modal abundances
olivine -ML
vesicles - ML
olivine - MK
vesicles - MK
olivine - intrusives
vesicles - intrusives

Site Photos

1. book covers
    - -volume 1 cover
    - -volume 1 original photo
    - -volume 2 cover
    - -volume 2 original photo
    - -volume 3 cover
    - -volume 3 original photos—core pieces 1, 2, 3, 4, 5, 6, 7, 8, 9, and 10
    - -volume 4 cover
    - -volume 4 original photo
2. setting up
    - -the drill site before any equipment had arrived
    - -drilling crew making frame for concrete slab
    - -Don Thomas building frame for concrete slab
    - -drilling crew pouring cement slab for drill rig
    - -drilling a water well
    - -Les Wallace making core trays
    - -Fran Coloma making core trays
    - -Frank Krysiak with the core scanner boxes
    - -David Whilldin and Les Wallace building the deck between geology offices
    - -Les Wallace putting insulation on drying sheds
    - -the rig waiting to be erected
    - -erecting the drill rig
    - -blessing the site
    - -drilling has begun…
3. drilling
    - -mud mixing tank
    - -tricone drill bit
    - -adding pipe to the drill string
    - -threading drill pipe
    - -used coring bit—first bit that drilled over 2000 feet
    - -line-up of used coring bits
    - -blow-out protector
    - -borehole vlave
    - -breaking a 20-foot core barrel
    - -drilling engineers Bruce Howell and Marshall Pardey on the rig floor
    - -moving pallets with the fork lift
    - -Bruce Howell, core driller Ron Fierbach, and Marshall Pardey oversee core drilling
    - -cement mixing tubs
    - -driller placing core in core tray
    - -new coring bit
    - -top of core barrel
    - -pulling up a 20-foot core barrel
    - -driller on the monkey bar
    - -Don Thomas displaying a tricone bit
    - -mixing cement for casing
    - -rotary drilling
    - -emptying core barrel
    - -row of core trays
    - -“fishing” tools
    - -Fran Coloma showing driller Mark Hiatt some core in boxes
    - -Fran Coloma standing next to top drive
    - -Gene, the “fishing” specialist
    - -picking up the kelly
    - -the top drive tilted up to make a core run
    - -hydraulic pump

-drillers connecting pipe
-a “wet trip”
-pulling up the last coring bit
-reaming bit
-the drill rig during hole opening
-Ron Fierbach and driller Shorty use power tongs to unthread pipe
-Ron Fierbach listens for the core barrel to latch (screwdriver method)
-Ron Fierbach listens for the core barrel to latch (high-tech method)
-Angie Roach, Caroline Seaman, and Helene Tolliver look at rotary drill bits
-core catcher
-the top drive during core drilling
-the well head (close-up)
-the well head
-the wireline spool

4. core
-intrisive contact (September 2, 1999)
-pillow basalt (September 2, 1999)
-sediments between pillows (September 2, 1999)
-core with zeolites and blue coating on fracture surface (August 30, 1999)
-brecciated core with altered, bluish green, clayey matrix (September 12, 1999)
-amorphous silica on fracture surface
-intrusive finger of aphyric basalt (September 20, 1999)
-auto-brecciated(?) rim of pillow basalt (August 17, 1999)
-carbonate-rich bedded sediment (July 23, 1999)
-carbonate-rich sediment between pillows (August 12, 1999)
-charcoal fragment
-small cubic pyrite crystals (September 7, 1999)
-secondary minerals filling fracture
-highly vesicular, broken, glassy pillow rims (August 14, 1999)
-pillow basalts with glassy margins (August 15, 1999)
-core with bluish green, altered matrix (August 19, 1999)
-highly fractured core (August 24, 1999)
-intrusive contact (September 2, 1999)
-last piece of core from the hole (September 23,1999)
-pele’s hair filling vug (May 4, 1999)
-another view of pele’s hair filling vug (May 4, 1999)
-ropey pahoehoe
-more pillow basalt (August 16, 1999)
-calcite-filled pipe vesicle in hyaloclastite fragment
-pipe vesicles(?) at base of pillow basalt (August 4, 1999)
-possible algae
-possible lichen
-tree root mold (April 28, 1999)
-extensive secondary mineralization (September 16, 1999)
-segregation vesicle (March 3, 1999)
-segregation vein (May 4, 1999)
-xenolith (March 31, 1999)
-zeolites on fracture surface (September 1, 1999)

5. core processing
-Eric Haskins, Fran Coloma, and Maureen Feineman preparing a 20-foot core run
-creating an unrolled core scan on the core scanner
-Angie Roach and Don DePaolo marking core
-Louise Bolge, Jo Bind, and Angie Roach marking and drying a core run
-Angie Roach making notes on a batch of core while Eric Haskins looks on
-Les Wallace building core trays
-Arno Buyusch, Caroline Seaman, and Don Thomas discussing core

-Caroline Seaman driying core with a heat gun
-Caroline Seaman sawing a piece of core
-Caroline Seaman slabbing core into working and archive portions
-Caroline Seaman taking samples for the reference suite
-Marc Hesse, Eric Haskins, Jo Bind, and George Doughty marking and boxing core
-core in trays waiting to be transported to the core processing area
-David Whilldin and Jo Bind cutting bubble wrap to pack up archive boxes
-David Whilldin and Les Wallace measuring core
-David Whilldin working at the core scanner
-David Whilldin and Ralf Messbacher slabbing core
-David Whilldin and Jo Bind pulling the core trailer back to the drill rig
-David Whilldin marking orientation lines on the core
-Don DePaolo marking core
-Don Thomas examining core in core trays
-drying shed
-Dylan Ahern and Fran Coloma marking core
-Dylan Ahern scanning slabbed core
-Eric Haskins slabbing core
-working boxes on pallets, ready to be shipped to the mainland
-packing up working boxes
-the geology crew admiring the first core after the 6000' reaming and casing interval
-Fran Coloma examining core under the microscope
-Fran Coloma drying core with a heat gun
-Fran Coloma washing core
-George Doughty marking a core box
-George Doughty at the microscope
-George Doughty sticking labels on archive core boxes
-George Doughty taking a digital photograph of a working core box
-Jo Bind marking core
-Les Wallace packs up the last pallet of archive core
-Les Wallace and Kelly Okano wrapping a pallet of working core boxes
-Les Wallace packing a box of working core for shipment
-Les Wallace slabbing core
-Angie Roach and Caroline Seaman displaying extraordinarily long pieces of unfractured core
-the geology crew making up a batch of working boxes
-Toby Hewitt remarking the slabbed faces of the archive split
-a trailer of core is delivered to the core processing area
-using a heat gun to melt shrink wrap
-putting core in shrink wrap
-Julie Bryce, George Doughty, and Mike Garcia putting core into working boxes
-David Whilldin, Fran Coloma, Les Wallace, and Jo Bind reconditioning used working boxes
-Steve Quane slabs core
-Steve Quane and David Whilldin pack up working boxes
-the geology crew processes one of the first batches of core

6. core logging
-a pahoehoe flow
-Allen Dodson logging a box of core
-an example of an archive box and a working box
-Caroline Seaman and Rachel Ellisor logging core
-Caroline Seaman examining core with a hand lens
-Debra Pardee and George Doughty logging core
-Eric Haskins logging core on his last day at the drill site
-Julie Bryce and Mike Garcia discussing core logging
-Lisa Hammersley and Debra Pardee logging core

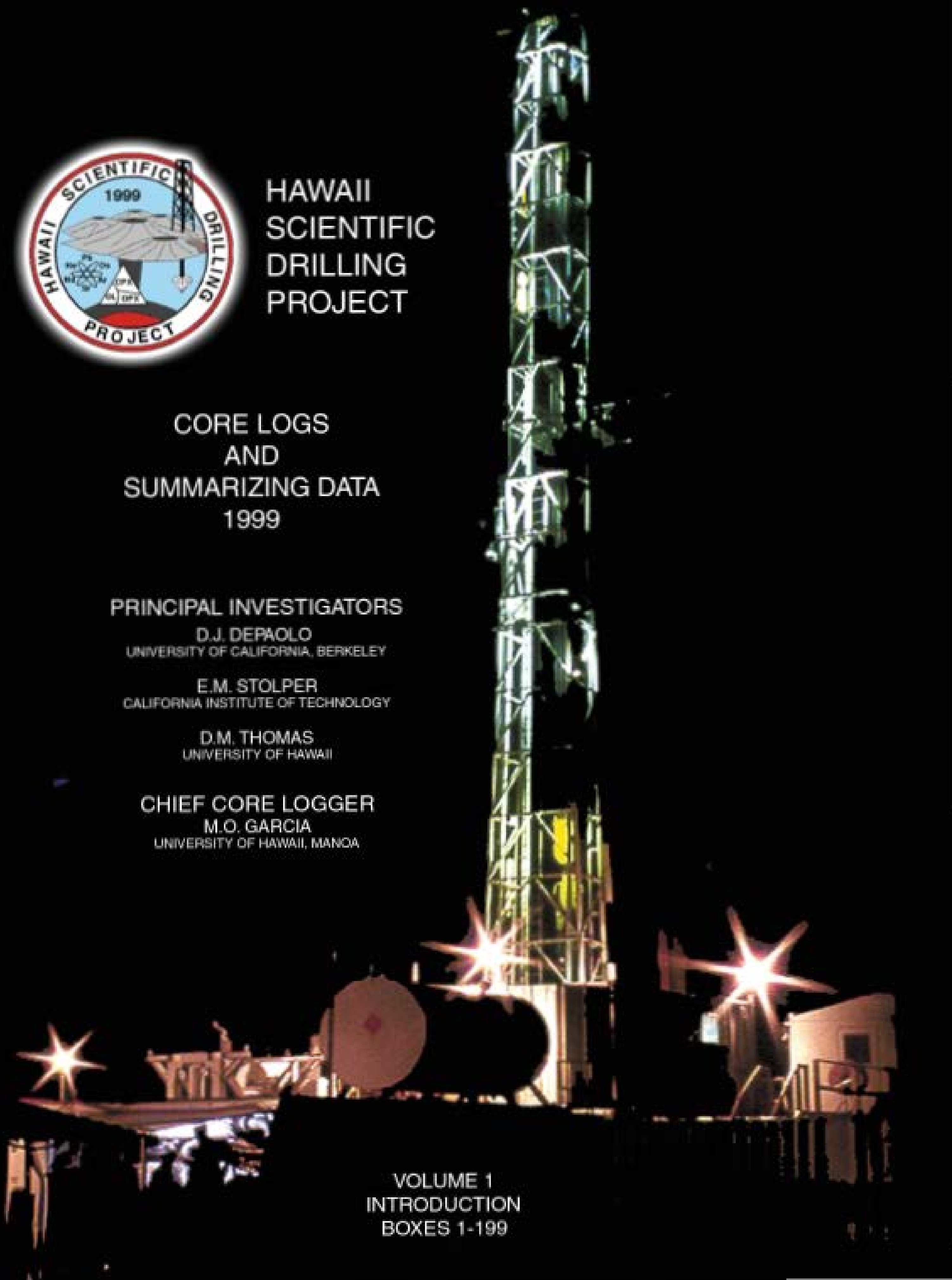
-core boxes at the Mauna Loa/Mauna Kea transition
-George Doughty logging the very last box!

7. site views
    - aerial view of the site looking toward airport and Hilo Bay
    - aerial view of the drill site looking south
    - Lake Thomas
    - drill pipe
    - drill pipe on trailer
    - project sign on airport road
    - reflection of the drill rig in a puddle after a big Hilo rainstorm
    - the drill rig after tripping out the drill string
    - casing on the rig waiting to be set in the hole
    - the drill rig at night
    - view of the rig from the HSDP overlook
    - the water tank
    - the well head
    - a view down the drill hole
8. Well logging
    - Grit Dannowski, Roy Wilkens and Dick Hodges stand around the drill hole
    - Roy Wilkens and Dick Hodges pack up the logging tools
    - Grit Dannowski and Kemal Erbas prepare to perform well logs
    - Grit Dannowski holding a temperature logging tool
    - Jorg working with logging equipment
    - Grit and driller Kehei
    - looking inside the logging trailer
    - magnetometer
    - Retrieving the resistivity meter
    - Roy Wilkens hard at work
    - the logging set-up at night
    - boxes of logging tools waiting to be unpacked
    - the logging trailer in action
    - the borehole televiewer
    - another view of the borehole televiewer
9. 10,000 feet!
    - Caroline Seaman and her grandparents posing with the 10,000-foot core
    - David Whilldin and the 10,000-foot rock
    - the drilling crew with the 10,000-foot tray
    - 10,000 “feet”
    - Fran Coloma posing with the 10,000-foot core
    - Kelly Okano and the 10,000-foot core
    - Les Wallace and the 10,000-foot core
    - the drillers and the 10,000-foot rock
10. the geology crew
    - Caroline Seaman explaining core processing procedures to volunteer Nick Teanby
    - Ed Stolper entering corrections into the database
    - Caroline Seaman, Helene Tolliver, and Ed Stolper discussing sampling strategy
    - Kelly Okano looking up minerals
    - Mike Garcia and Jim Moore leading a core logging discussion
    - Mike Garcia checking over core logs
    - the geology crew having a group discussion
    - the full-time geology crew on the last day of drilling
    - the geology crew posing in front of the project sign
    - everyone wants a look at the core!
11. volunteers and visitors
    - Allen Dodson at the beach
    - Caroline Seaman, Mike Garcia, and Doug Hutcheon (behind box)

-Daniel Stolper making archive boxes
-Doug Hutcheon slabbing core
-Maureen Feineman and Ethan Baxter making funny faces
-Ethan Baxter and Eric Haskins strapping pallets of boxes
-George Doughty and Matt Fantle marking core
-Ralf Messbacher and George Doughty slabbing core
-Helene Tolliver and the geology crew
-Helene Tolliver moving boxes
-Helene Tolliver kicking back
-Julie Bryce logging core
-Ralf Messbacher and Les Wallace taking a break from slabbing core
-Lisa Hammersley packing archive boxes
-Lisa Hammersley and Debbie Pardee logging core
-Louise Bolge displaying a piece of core
-Marc Hesse marking core
-Margaret Millman moving boxes
-Rachel Ellisor logging core
-Ralf Messbacher opening a coconut
-Ralf Messbacher demonstrating his sawing technique
-Ronit Kessel waving a magic cloth
-Mike Garcia and Sujoy Mukopadhyay marking core
-Sarah Kubiak washing core
-Nick Teanby spraying down the core
-Allen Dodson working at the microscope
-Arno Buysch marking a piece of core

12. Packing up

-folding down the monkey bar
-lowering the mast of the drill rig
-David Whilldin packing away the core scanner
-drillers doing a pipe inventory
-Fran Coloma and Les Wallace paint tables
-Les Wallace sanding down a table
-loading the drill rig
-Marshall Pardey spraying down the top drive
-putting the cement tanks in a shipping container
-packing the top drive in a shipping container
-the drill rig driving away
-the empty drill site
-the drill rig tower halfway down



HAWAII SCIENTIFIC DRILLING PROJECT

CORE LOGS AND SUMMARIZING DATA 1999

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CHIEF CORE LOGGER
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VOLUME 1
INTRODUCTION
BOXES 1-199

HAWAII SCIENTIFIC DRILLING PROJECT

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1999

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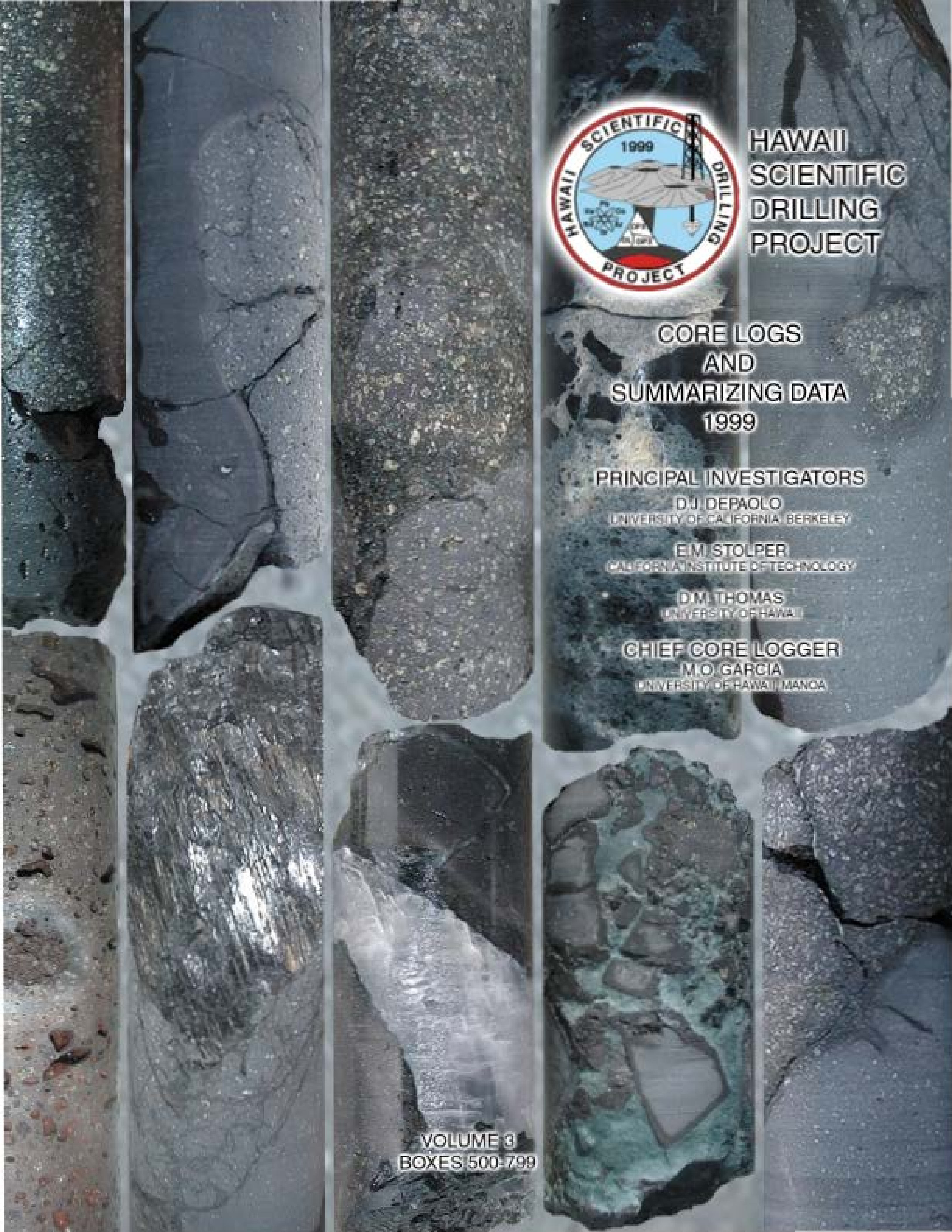
VOLUME 2
BOXES 200-499



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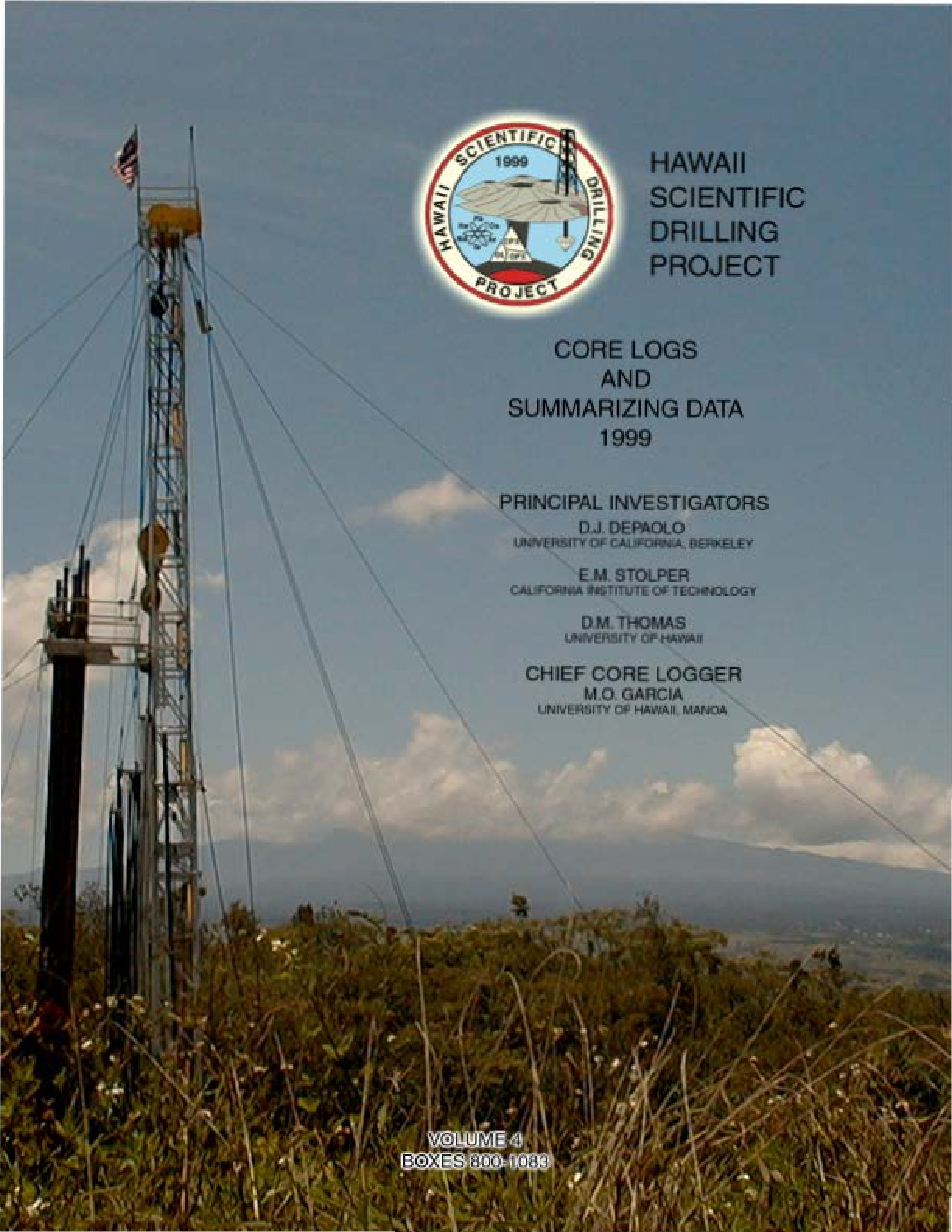
VOLUME 3
BOXES 500-799



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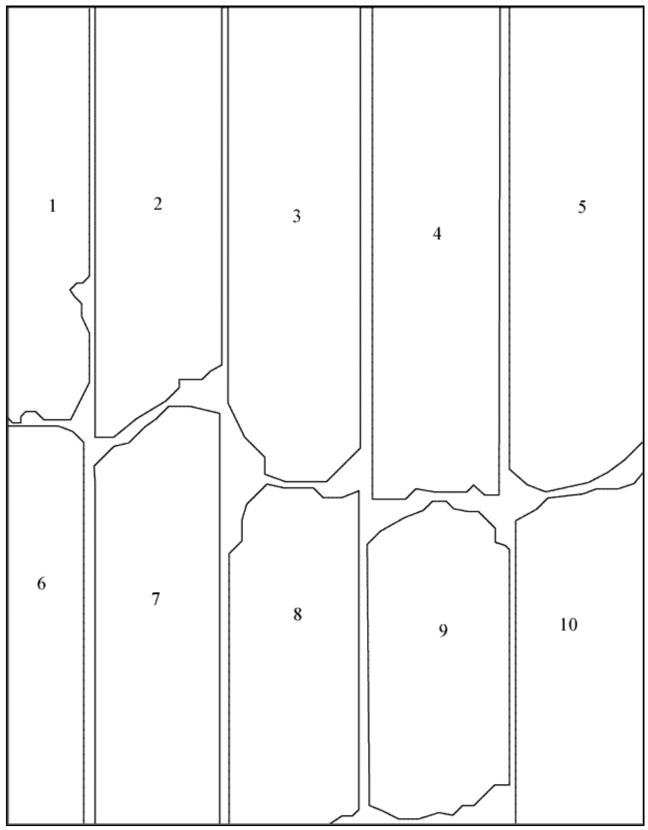
VOLUME 4
BOXES 800-1083

VOLUME 1
Drilling continued through the night at the HSDP drill site. The cover photograph shows the illuminated drill rig as seen from the geology offices.

VOLUME 2
A morning's work for the science crew. The cover photograph shows a batch of drill core laid out in trays, waiting to be washed, marked, and stored in boxes. The brightly colored ends of the core trays indicate the "up orientation" of the core. This photo was taken by the HSDP science team, and the original version can be seen on the CD-ROM accompanying this book.

VOLUME 3



The cover of this volume is a composite image of 10 different core photographs. The original photographs can be found on the CD-ROM Disc 1 accompanying these volumes. 1) a submarine flow contact between highly olivine-phyric basalt and aphyric basalt; 2) an intrusive contact between highly olivine-phyric basalt and aphyric basalt—note the thin margin of fine-grained matrix in the aphyric basalt at the contact; 3) hyaloclastite with highly olivine-phyric clasts--this type of poorly sorted, well indurated hyaloclastite is very common in the lower parts of the submarine section; 4) highly altered and slightly brecciated (?) hyaloclastite from the edge of and intrusive contact; 5) an inclusion of highly olivine-phyric basalt within a sparsely olivine-phyric basalt; 6) an inclusion in an aa flow is probably a scoriaceous autolith; 7) slickensides on a fracture surface of a submarine basalt—tiny pyrite crystals give the surface a metallic luster; 8) a spectacular gypsum crystal fills a gap between two pillow basalts—note the glassy margins of the pillows on either side of the gypsum; 9) the matrix of this hyaloclastite has been replaced with a bluish green mineral (possibly gypsum?); 10) an intrusive contact between a highly olivine-phyric basalt and a sparsely olivine-phyric basalt.

VOLUME 4
The cover photograph is a view looking northwest from the HSDP drill rig to Mauna Kea in the background. The drill site lies east of the city of Hilo, about 1 km from the 1993 pilot hole. This photograph was taken by Caroline Seaman from the HSDP overlook.