

Chikyu DAILY MORNING REPORT

Mission No. : CK18-04

Exp. No. : Exp 358

Report No. : 85

Site Name C0002 Hole Name C0002R Lat. 33° 18.0507'N Long. 136° 38.2029'E Seabed Depth : 1,967.5 mBRT RT-MSL : 28.5 m Report Date : 31/Dec/2018

Depth : @24:00 4,963.0 mBRT 2995.5 mbsf Progress : 0.0 m Drilling/Coring/Underreaming Hrs. : 0.00 hrs Last BOP PT: 2018/12/14 Next BOP PT: 2019/01/04

Depth : @06:00 4,963.0 mBRT 2995.5 mbsf LAST CASING : 11-3/4" x 2,922.50 mbsf(4,890.0 mBRT) Last BOP FT: 2018/12/29 Next BOP FT: 2019/01/05

Summary of Operation on 30-Dec : LO Kick Off BHA. MU & RIH 2nd 8-1/2" Kick Off BHA to 4.472mBRT. Slip & Cut drill line. Last Glycol 35gal Inj. 2018/12/25

Present Operation @ 06:00 on 31-Dec : Ream down at 4.867mBRT. mBRT: meter below rotary table mbsf: meter below sea floor

Time Breakdown (00:00 - 24:00 on 30-Dec)

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 1: 0:00 to 1:15, TRIP, 4,963.0, Lay out 8-1/2" kick off BHA. Lay out Telescope and Mud motor. Motor stabilizer gauge: In gauge. 8-1/8" Stabilizer gauge: 1/16 undergauge.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 2: 1:15 to 2:15, RS, 4,963.0, Rig service. Concurrently download Telescope memory data on deck. Total shock count 1,300 - good. Be able to re-run.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 3: 2:15 to 6:45, TRIP, 4,963.0, RIH 8-1/2" kick off BHA from surface to 256mBRT. Pick up 8-1/2" XR+N. Pick up new A675XP motor. Check motor bearing 2mm gap between with and without slack off. Adjust motor bent angle 1.50deg. Install 8-3/8" motor sleeve stabilizer. Check 8-1/4" stabilizer OD above motor: 8-1/4". Pick up and run Telescope675 (S/N: B0540, 500rpm setting, used) and 6-1/2" jar (S/N: 1760-5031, used). Measure the offset angle between Telescope tool face and motor high side. Motor high side 315deg clockwise from Telescope tool face. Check the length for jar mandrel: 18-3/16". D+I sensor offset from bit: 18.00m. (6:00-6:30) Clean up elevator with high pressure washer and grease up as open/close function not functional well.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 4: 6:45 to 10:45, TRIP, 4,963.0, RIH 8-1/2" kick off BHA from 256mBRT to 1,892mBRT. (7:30-8:00) Perform MWD shallow test at 522mBRT using mud pump #1. Test failed in first and second test due to bad signal. Good test on third test at 380g. Fill the string every 15 stands. Boost riser at 450gpm.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 5: 10:45 to 17:15, RS, 4,963.0, Slip and cut 41m of drill line. Replace HPS Motor B encoder due to the connection failure: OK

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 6: 17:15 to 24:00, TRIP, 4,963.0, Resume RIH 8-1/2" kick off BHA from 1,892mBRT to 4,472mBRT. Fill the string every 15 stands. Boost riser at 450gpm. Observe no excess drag with CMC on while pass through 11-3/4" Liner hanger. Change shaker screens to API120 from API170, API230, 4 x API270, on going. Install geolograph. Offline. Complete cleaning strainers on #1, #2 & #3 mud pump and conduct fluid end inspection.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 7: 24:00 to 00:00, TRIP, 4,963.0, Ditch magnet: 0.0kg (Total 81.5kg for Kick off hole)

* The data on 00:00 - 06:00 is unofficial.

Time Breakdown (00:00 - 06:00 on 31-Dec)

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 1: 0:00 to 1:00, TRIP, 4,963.0, Continue to RIH 8-1/2" kick off BHA from 4.472mBRT to 4.748mBRT. Boost riser at 450gpm. Change shaker screens to API120 from API170, API230, 4 x API270.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 2: 1:00 to 2:00, TRIP, 4,963.0, Take SCRs. Take parameters. Pick up / Slack off weight w/o rotation: 3,060kN / 2,870kN. Pick up / Slack off / Rotating weight w/ 30rpm: 2,960kN / 2,920kN / 2,960kN. Free rotating torque: 10-11kNm w/ 30rpm, 12-13kNm w/ 60rpm.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 3: 2:00 to 5:00, W&R, 4,963.0, Wash and ream down from 4.748mBRT to 4.862mBRT. Wash down from 4.748mBRT to 4.796mBRT at 300gpm. Take weight <100kN at 4.796mBRT. Ream down from 4.796mBRT to 4.862mBRT. Take weight at following sections. 4.796 - 4.798mBRT: WOB 0-50kN, 10-35rpm, 10-16kNm, 300-400gpm, 7-13MPa. 4.836 - 4.82mBRT: WOB 0-70kN, 15-60rpm, 10-32kNm, 400gpm, 13-15MPa. Stall out at 4.854mBRT.

Table with columns: From, To, Hrs, Code, Depth(mBRT), Detail of Operation. Row 4: 5:00 to 6:00, W&R, 4,963.0, Continue reaming down from 4.862mBRT to 4.867mBRT with slower speed due to taking weight down and high torque.

Bit Record @24:00

Table with columns: Bit No., Size (in), MFR, Type, IADC Code, S/No., Nozzles, Depth (mBRT), Meter-age, Hrs., WOB (kN), rpm, Total Rev. (krev), ROP (m/hr), Dull Condition (Inner, Outer, Dull, Loc., B, G, O.D., RP).

BHA Record @24:00

Table with columns: #, Size (in), Type, Description. Row 1: #18, 8-1/2" KO BHA, 8-1/2" Bit x A675XP PDM with 1.15" bent x 8-1/8" Stab (SLB) x Float Sub w/ Non-ported float valve (SLB) x 6-3/4" Pony NMDC x XO #1 x Telescope 675 x XO #2 x 6-3/4" NMDC x 6-3/4" DC (3 stds) x 6-1/2" Jar x 6-3/4" DC (2 stds) x XO #3 x 5-8" HWDP (3 stds) x XO #4 x 5-1/2" DP S-140 (25 stds) x XO #5 x 5-1/2" DP S-150 (65 stds) x XO #6 x 6-5/8" DP Z-140 (22 stds) x 6-5/8" DP UD-165.

Mud Properties @24:00

Table with columns: Mud Type, Time, Depth (mBRT), MW, VIS, PV, YV, 6rpm, Gel St. (10", 10'), API, Cake, pH, Pf, Cl-, Sand, Oil, Solid, MBC, Temp (In, Out), K+, n, K, LGS, FIT 20/40 (mm), 0 min, 5min.

Mud Pumps - 14-P-220

Table with columns: No., Liner Size, SPM, GPM, Press. (MPa), Ann. Vel. (m/min). Row 1: 1, 6", 38, 190, 7.1, 40.32.

Geologic Information @24:00

Table with columns: From, To, Lithology of cuttings. Row 1: Telnite, 2.

Shale Shaker @24:00

Table with columns: No., 30, 120, No.4, 30, 120, No.1, off. Row 1: No.1, 30, 120, No.4, 30, 120, No.1, off.

Materials Stock on Board @24:00

Table with columns: Item, Unit, Stock, Used, Received. Row 1: Fresh Water, m3, 280.0, 101.5, 142.5.

Boat Information @24:00

Table with columns: Boat Name, Status, Time @Chikyu (Departed, Arrived). Row 1: #8 Meiji-maru, Chikyu, Departed, Arrived.

Weather Information

Table with columns: Time, Weather, Temp. (degC), Barometer, Wind (Speed (m/s), Dir. (deg), Gust (m/s)), Wave (Height (m), Dir. (deg), Period (s)), Current (Speed (knt), Dir. (deg)), Visibility (km).

Today's Schedule: Ream down to 4,963mBRT. Drill 8-1/2" kick off hole.

Hook Wt. (knt) @24:00 4,472.0 mBRT

Table with columns: Hook Load, BHA, Below HWDP, below Jar, HPS & Traveling block, Hook + RRT, Hook block.

Jar Rotating time 24S/N: 1760-5031

Table with columns: Today, 0.00, Total, 65.01, hrs.

Cutting skip @24:00

Table with columns: Empty, Full, Total. Row 1: 14, 0, 14.

ROV @24:00

Table with columns: Status, On deck, Last Dive, 2018/12/29, Injection Skid, Dive w/135 gal skid.

Heli Information @24:00

Table with columns: Flt. No., Arrived, Time, Departed, Passenger (Are., Dept.). Row 1: 1, Arrived, Time, Departed, Passenger.

Safety (HSE) and other information

Table with columns: Incident, Last Incident, No. LTA. Row 1: Incident, Last Incident, No. LTA.

Remarks

Perform weekly fire drill.

Marine Information @24:00

Table with columns: Heave (m), Pitch (deg), Roll (deg), Vessel Heading (deg), Riser Tension (kN), V.D. Load (ton), Max Draught (m), Thruster (kW).

Reported by : T. Yokoyama / A. Suzuki

Approved by : T. Ikawa / K. Takase