# UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF SAFETY AND ENVIRONMENTAL ENFORCEMENT GULF OF MEXICO REGION -

#### **ACCIDENT INVESTIGATION REPORT**

### For Public Release

OCCURRED	
DATE:	STRUCTURAL DAMAGE
17-AUG-2014 TIME: 0830 HOURS	CRANE
	OTHER LIFTING DEVICE
<del>-</del>	
	X INCIDENT >\$25K Damage to the lower
	H2S/15MIN./20PPM annular-
	DECLITED MIGHED
	REQUIRED MUSTER SHUTDOWN FROM GAS RELEASE
I BBBI IIONE .	OTHER
OPERATOR/CONTRACTOR REPRESENTATIVE/SUPERVISOR	OTHER
ON SITE AT TIME OF INCIDENT:	6. OPERATION:
	o. OPERATION.
	☐ PRODUCTION
LEASE: <b>G27259</b>	X DRILLING
AREA: MC LATITUDE: 28.926889 -	WORKOVER
BLOCK: 79 LONGITUDE: -88.231556 -	COMPLETION
	HELICOPTER
PLATFORM:	MOTOR VESSEL PIPELINE SEGMENT NO.
RIG NAME: SEADRILL SEVAN LOUISIANA	OTHER
A CHILLIAN TO THE COLUMN (COLUMN)	_ OTHER
	8. CAUSE:
DEVELOPMENT/ PRODUCTION -	_
	EQUIPMENT FAILURE
THISTORIC INTERV	X HUMAN ERROR - EXTERNAL DAMAGE
	SLIP/TRIP/FALL
	WEATHER RELATED
_ I I	LEAK
	UPSET H2O TREATING
RW/JT (>3 days)	OVERBOARD DRILLING FLUID
Other Injury	OTHER
FATALITY	9. WATER DEPTH: 3868 FT.
POLLUTION	
FIRE	10. DISTANCE FROM SHORE: 49 MI.
EXPLOSION	
LWC   HISTORIC BLOWOUT	11. WIND DIRECTION: WSW
UNDERGROUND	SPEED: 14 M.P.H.
SURFACE	
DEVERTER	12. CURRENT DIRECTION: SW
SURFACE EQUIPMENT FAILURE OR PROCEDURES	SPEED: 1 M.P.H
COLLISION   HISTORIC   >\$25K   <=\$25K	
	13. SEA STATE: FT.
	DATE:  17-AUG-2014 TIME: 0830 HOURS  OPERATOR: LLOG Exploration Offshore, L.L.C. REPRESENTATIVE: TELEPHONE: CONTRACTOR: Seadrill Limited- REPRESENTATIVE:- TELEPHONE:-  OPERATOR/CONTRACTOR REPRESENTATIVE/SUPERVISOR ON SITE AT TIME OF INCIDENT:  LEASE: G27259 AREA: MC LATITUDE: 28.926889- BLOCK: 79 LONGITUDE: -88.231556-  PLATFORM: RIG NAME: SEADRILL SEVAN LOUISIANA  ACTIVITY: X EXPLORATION (POE) DEVELOPMENT/PRODUCTION- (DOCD/POD) -  TYPE:  HISTORIC INJURY- REQUIRED EVACUATION LTA (>3 days) RW/JT (1-3 days) RW/JT (1-3 days) RW/JT (1-3 days) RW/JT (>3 days) Other Injury  FATALITY POLLUTION FIRE EXPLOSION  LWC HISTORIC BLOWOUT UNDERGROUND SURFACE DEVERTER SURFACE EQUIPMENT FAILURE OR PROCEDURES

MMS - FORM 2010 PAGE: 1 OF 5

EV2010R 22-OCT-2014-

On August 17, 2014, an incident occurred that resulted in significant damage to the lower annular. The lower annular operating chamber was prepared for pressure testing on the surface. The target pressure for this test was 3000 psi. Once the lower annular was prepared, the Subsea Engineer started applying pressure to the operating chamber using a test pump. At this time, with the pump still running the Subsea Engineer decided to put away some tools, leaving the test pump unit unmanned. The Subsea Supervisor arrived at the test unit to find the test pump unattended. He then left the testing area to look for the other Subsea Engineer. He found the Subsea Engineer in their shop and informed him that the test pump should never be left unattended. The Task Based Risk Assessment did not address the monitoring of the running pump. The Subsea Supervisor also informed the crew they should be testing the upper annular operating chamber and not the lower annular operating chamber. At this time a loud bang was heard coming from the testing area and the test pump was then immediately shut down. Further investigation by rig personnel found that the lower annular operating chamber that has a (MAWP) Maximum Allowable Working Pressure of 3000 psi, was overpressurized to at least 10,000 psi.

- 18. LIST THE PROBABLE CAUSE(S) OF ACCIDENT:
  - 1) Poor communication between all personnel involved in the testing procedure.
  - 2) Leaving the test pump running while unattended allowing the component being tested to over pressurize.
  - 3) Nothing notated in the Task Based Risk Assessment about leaving the test pump running without properly trained personnel monitoring the pressure.
  - 4) The Subsea Supervisor failed to secure the test pump prior addressing the Subsea Engineer about leaving pump running and unattended.
- 19. LIST THE CONTRIBUTING CAUSE(S) OF ACCIDENT:
  - 1) Miscommunication and not being focused on the task at hand. -
  - 2) Initial documentation showed the upper annular operating chamber should have been tested and not the lower annular operating chamber.
  - 3) Not double-checking with Subsea Supervisor prior to commencing testing.
- 20. LIST THE ADDITIONAL INFORMATION:

21. PROPERTY DAMAGED:

NATURE OF DAMAGE:

MMS - FORM 2010 PAGE: 2 OF 5-

Lower annular (Cost has not yet been determined.)

Sheared inner cylinder studs. Pusher plate blown out of annular housing. Broken shuttle valve on choke isolation valve. Also support ring and inner piston dislodged due to over pressurization causing significant damage to lower annular.

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ESTIMATED AMOUNT (TOTAL):

22. RECOMMENDATIONS TO PREVENT RECURRANCE NARRATIVE:

The New Orleans District has no recommendations at this time.

- 23. POSSIBLE OCS VIOLATIONS RELATED TO ACCIDENT: YES
- 24. SPECIFY VIOLATIONS DIRECTLY OR INDIRECTLY CONTRIBUTING. NARRATIVE:

A G-110 (W) 250.107(A) was issued at the time investigation was conducted. - Narrative: At the time of inspection (investigation), documentation showed that during the surface test of the lower annular the test pump was left running and not-manned causing lower annular to overpressure to 10,000-psi. This caused significant-damage to annular.

NOTE: Test should have been conducted to 3,000 psi.

- \*Operator test was to test the open side seals and functionality of the annular.
- \*3,000 psi rating. -
- 25. DATE OF ONSITE INVESTIGATION:

19-AUG-2014

26. ONSITE TEAM MEMBERS:

Earl Roy /

29. ACCIDENT INVESTIGATION PANEL FORMED: NO

OCS REPORT:

30. DISTRICT SUPERVISOR:

David Trocquet

APPROVED

DATE: 17-OCT-2014

#### INJURY/FATALITY/WITNESS ATTACHMENT

	OPERATOR REPRESENTATIVE	INJURY	
~	TODY 0040		 

MMS - FORM 2010 PAGE: 3 OF 5-

EV2010R 22-OCT-2014 -

#### INJURY/FATALITY/WITNESS ATTACHMENT

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CONTRACTOR REPRESENTATIVE OTHER	FATALITY  WITNESS	
NAME:		
HOME ADDRESS:		
CITY:	STATE:	
WORK PHONE:	TOTAL OFFSHORE EXPERIENCE:	Y
EMPLOYED BY:		
BUSINESS ADDRESS:		
CITY:	STATE:	
ZIP CODE:		
CONTRACTOR REPRESENTATIVE OTHER	FATALITY WITNESS	
NAME:		
HOME ADDRESS:		
CITY:	STATE:	
	TOTAL OFFSHORE EXPERIENCE:	Y
WORK PHONE:	TOTAL OFFSHORE EXPERIENCE:	
WORK PHONE: EMPLOYED BY:	TOTAL OFFSHORE EXPERIENCE.	
	TOTAL OFFSHORE EXPERIENCE.	
EMPLOYED BY:	STATE:	

MMS - FORM 2010 PAGE: 4 OF 5-

#### INJURY/FATALITY/WITNESS ATTACHMENT

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OPERATOR REPRESENTATIVE CONTRACTOR REPRESENTATIVE OTHER	INJURY  FATALITY  WITNESS	
NAME: HOME ADDRESS: CITY: WORK PHONE: EMPLOYED BY: BUSINESS ADDRESS: CITY:	STATE: TOTAL OFFSHORE EXPERIENCE:	YEARS
ZIP CODE:	STATE:	
OPERATOR REPRESENTATIVE  CONTRACTOR REPRESENTATIVE  OTHER	INJURY  FATALITY  WITNESS	
NAME: HOME ADDRESS:		
CITY:	STATE:	
WORK PHONE:	TOTAL OFFSHORE EXPERIENCE:	YEARS
EMPLOYED BY:		
BUSINESS ADDRESS:		
CITY:	STATE:	
ZIP CODE:		

MMS - FORM 2010 PAGE: 5 OF 5-