

### Certificate of Test

Freudenberg Oil & Gas Technologies' 13 5/8" x 5,000 psi NBR 162 Ultra annular packing unit was successfully tested for low temperature design validation at or under 40°F in accordance with API 16A, Fourth Edition, section 4.7.3.27 PR2 procedures and acceptance criterion.

### Product Details: FOGT 13 5/8" x 5,000 psi Ultra Annular Packing Unit NBR 162

Manufacturer:	Freudenberg Oil & Gas Technologies
Part Number:	10108521-33
Batch Number:	2013-2020/201144
Compound Description:	NBR 162 Elastomer

### Test Parameters

Validation Test Standard:	API 16A Fourth Edition PR2, Low Temperature Test		
BOP Type:	Annular, 13 5/8" x 5,000 psi		
BOP Model:	BOP Products Series 800 13-5/8" 5K		
BOP Serial Number:	B263-19/BR-008		
Wellbore Temperature, maximum:	4.3 °C	39.8 °F	
Temperature Class:	F	40 °F	
Wellbore Pressure, minimum:	347 bar	5028 psi	
Closing Pressure, maximum:	104 bar	1502 psi	
Test Medium:	Ethylene glycol/water 50/50		
Hold Duration:	10 minutes		
FOGT Work Order:	2020 072		

### Test Details

Test Performed by	Freudenberg Oil & Gas Technologies
Test Location	Materials Development & Product Testing Lab 4535 Brittmoore Rd. Houston, TX 77041
Internal Test Procedures	SOP-00128/1, in accordance with API 16A Fourth Edition, PR2
Test Completion Date	June 15, 2020
Test Results	No leakage during the hold period

### Authorized by:

Michael LoGiudice



Manager, HOU LAB Facility