

Morning Report PNR1z				
Management System:		HSE	File Name:	010-PNR1z-17.10.2018-RMR
Approver:		Senior Geoscientist	Version No:	1
Reviewer:		Fracture Manager	Date of Issue:	18 th October 2018
Author:		Senior Geoscientist	Proposed date of Review:	n/a
Version	Section	Revision Information	Date	Reviser
0.1	All	Draft Publication	18/10/2018	Senior Geoscientist
<i>Documents are reviewed as per proposed review date, or sooner if a significant change to the operation has taken place, to ensure relevance to the systems and process that they define.</i>				

PRIVATE & CONFIDENTIAL

1.0 Summary

Overview of day's operations:

- 1x Diagnostic injection test performed
- 1x Hydraulic fracture injection stage performed with proppant
- Flow back performed – 24.92 m³
- No Induced seismicity or any red line boundary breached

2.0 Injection Summary

Stage 02

Injection Depth m (RT)	Volume (m ³)	Fluid System	Additives (type, mass kg)
3339.17 M MDRT	21.4 m ³	Slickwater	B528 FR. 6 kg
2282.96 M TVDRT			

Stage 02

Injection Depth m (RT)	Volume (fluid m ³ , proppant tonne)	Proppant (mesh size, tonne)	Fluid System	Additives (type, mass kg, volume m ³)
3339.17 M MDRT	296.7m ³	100 mesh	Slickwater	B528 FR. 76 kg
2282.96 M TVDRT		22.38		HCL 10% 1m ³

PRIVATE & CONFIDENTIAL

3.0 Injection Chart

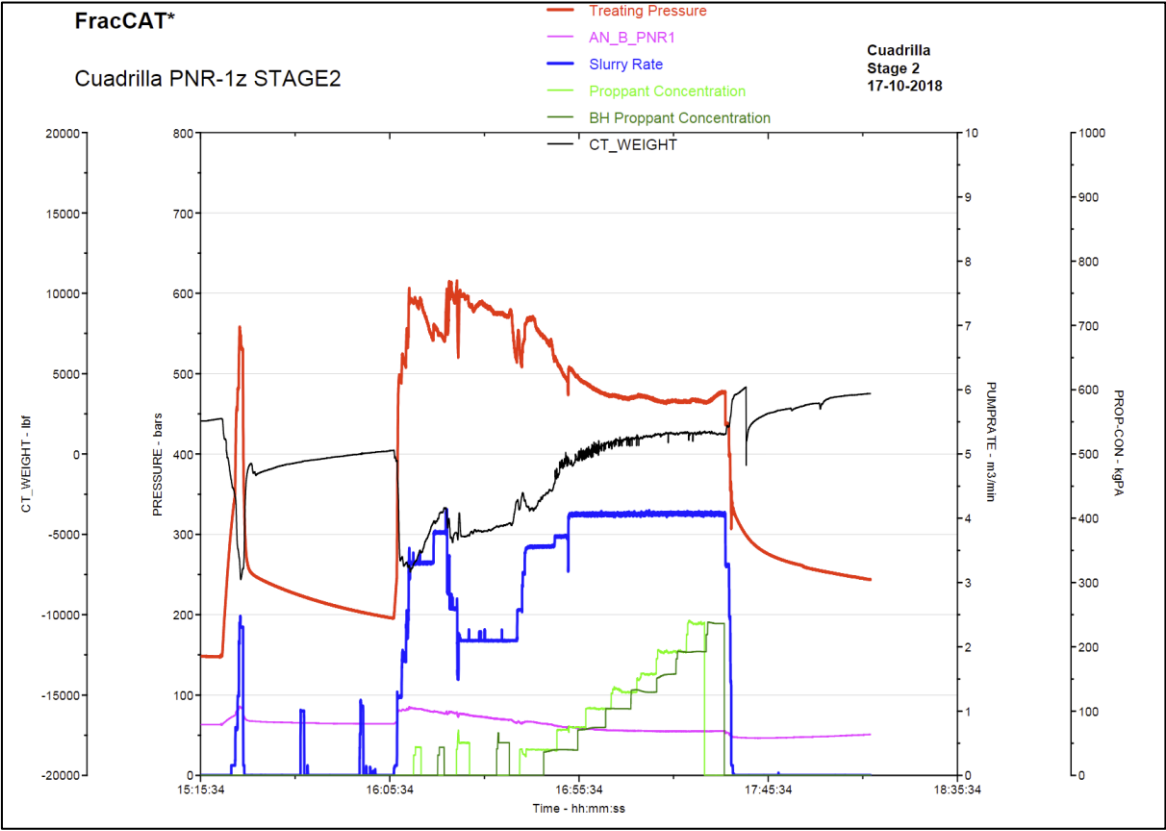


Figure 1. Diagnostic injections test chart

4.0 Fracture Growth

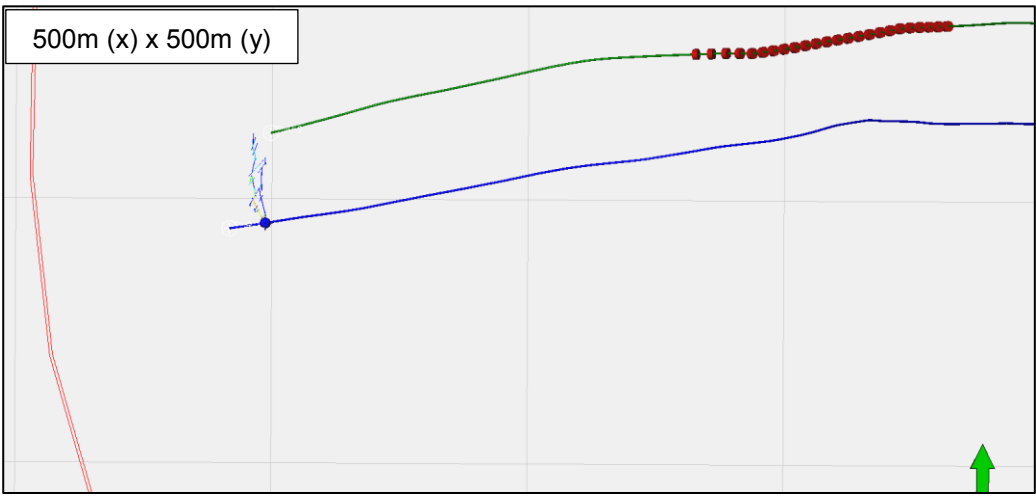


Figure 2. Map View (Grid box 500m by 500m).

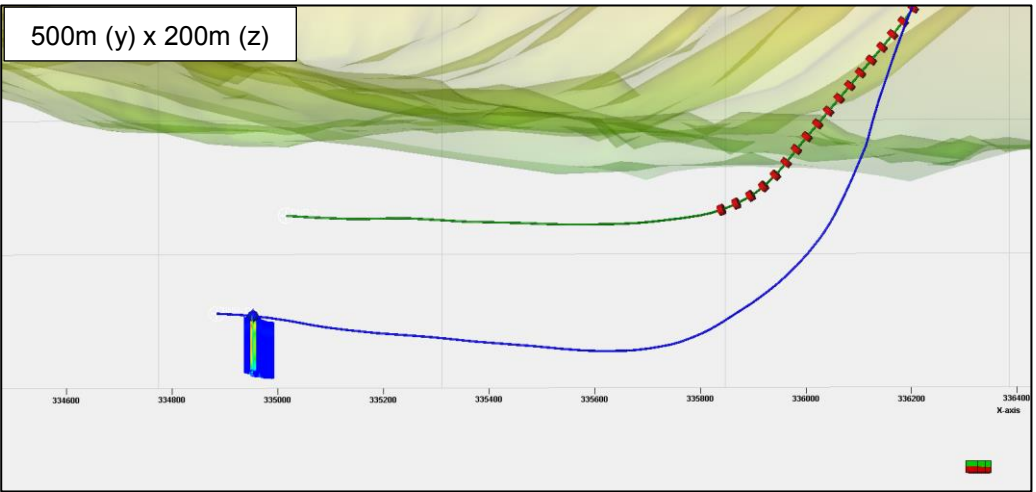


Figure 3. X-section due north (Depth box 500m by 200m).

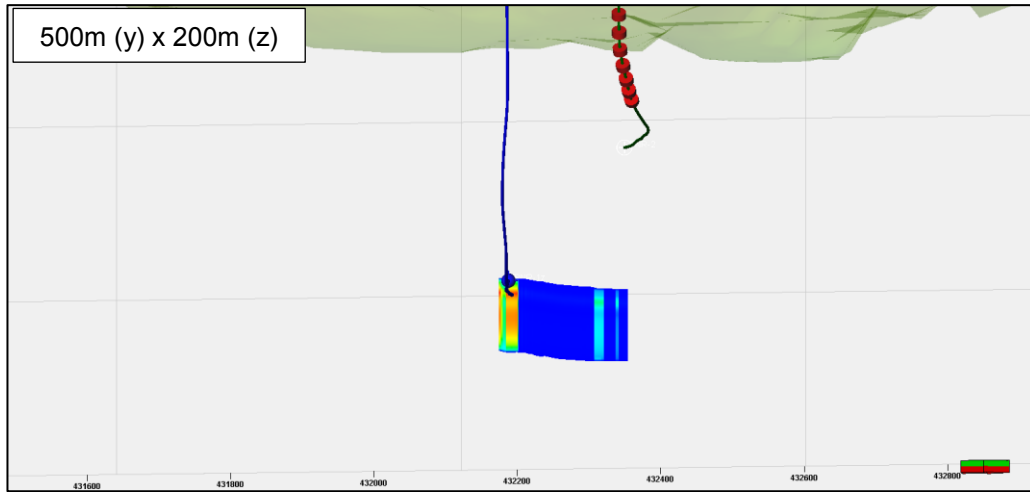


Figure 4. X-section due east (Depth box 500m by 200m).

- Max hydraulic frac half length: 191.5 m
- Hydraulic frac height at well: 96.8 m

5.0 Well Integrity Status

- No change

Induced Seismicity of Note

- No induced seismicity of note

Update to Stress Magnitude

No update to stress magnitude as closure was not observed

- $S_{Hmin} = 0.0152 \text{ MPa/m}$

PRIVATE & CONFIDENTIAL