

7,500 kPa is the pressure value that indicates the change from supercritical CO<sub>2</sub> to gaseous CO<sub>2</sub> in the subsurface. CO<sub>2</sub> is generally supercritical in the Halfway south of this line. The temperature exceeds 31°C and the TVD is greater than 800m over the Halfway map area.

Peejay-Weasel Aquifer  
Effective CO<sub>2</sub> Storage Potential  
(% of Theoretical CO<sub>2</sub> Storage Potential)  
P10 (0.5%) 7.6 Mt; P50 (2.0%) 30.3 Mt; P90 (5.4%) 81.8 Mt

Fireweed-Martin Aquifer  
Effective CO<sub>2</sub> Storage Potential  
(% of Theoretical CO<sub>2</sub> Storage Potential)  
P10 (0.5%) 5.6 Mt; P50 (2.0%) 22.5 Mt; P90 (5.4%) 60.8 Mt

Flatrock-Monias Aquifer  
Effective CO<sub>2</sub> Storage Potential  
(% of Theoretical CO<sub>2</sub> Storage Potential)  
P10 (0.5%) 11.6 Mt; P50 (2.0%) 46.3 Mt; P90 (5.4%) 125.1 Mt

CO<sub>2</sub> Storage Pool Candidates\*

CO<sub>2</sub> Phase

- Gas  
Supercritical

Effective CO<sub>2</sub> Storage Potential (Mt)

- 0.0 - 1.0  
1.1 - 2.5  
2.6 - 5.0  
5.1 - 10.0  
10.1 - 25.0  
25.1 - 44.6

CO<sub>2</sub> Storage Pool Non-Candidates

Flatrock-Monias Aquifer

- Supercritical

Peejay-Weasel Aquifer

- Supercritical

Fireweed-Martin Aquifer

- Supercritical

CO<sub>2</sub> Storage Key Transitions

- Pressure 7,500 kPa

\*Pool storage candidates are depleted or nearly depleted pools whose TVDs are greater than 800m and/or are east of the Mesozoic deformation front.

NEBC Geological Carbon Capture and Storage Atlas



Halfway  
Aquifer and Pool Candidates  
Effective CO<sub>2</sub> Storage Potential

Filename: GBCS\_HALFWAY\_EFF\_STORAGE\_POTENTIAL

Figure

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Geology

Halfway Edge

Mesozoic Deformation Front

0 5 10 20 30 40 50 Km

Projection: UTM Zone 10; Central Meridian -123; NAD 1983

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