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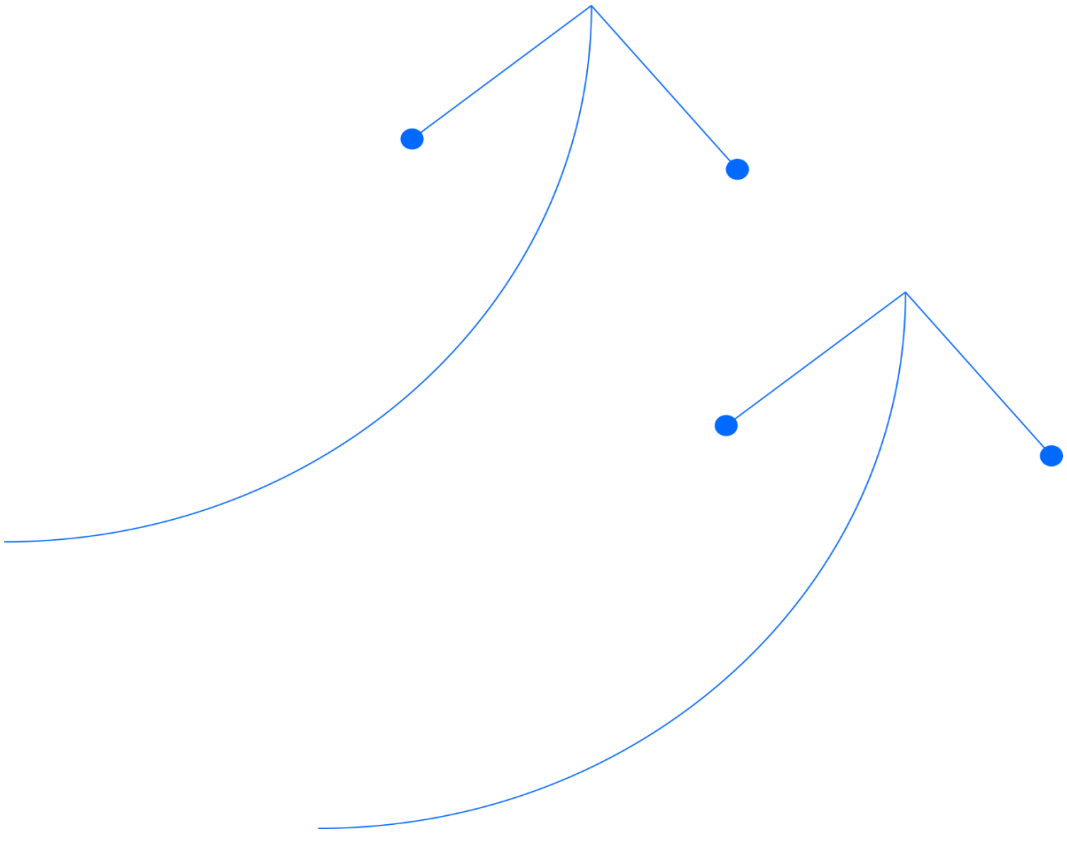
Santos

Monitoring and Verification Interim Update Report

Moomba CCS Project
Cooper-Eromanga Basin, South Australia
Gas Storage Licence 1, 2, 3 & 4 (AAL 298)

1 February 2025 to 31 July 2025



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Abbreviations

Item	Definition
1D / 2D / 3D / 4D	One / two / three / four dimensional
AAL	Associated activities licence
ACCU	Australian carbon credit unit
AS	Australian standard
BHP	Bottom hole pressure
CCS	Carbon capture and storage
CER	Clean Energy Regulator
CO2	Carbon dioxide
DEM	Department for Energy and Mining (South Australia)
DEW	Department for Environment and Water (South Australia)
DHG	Down-hole gauge
DN	Nominal diameter
EPA	Environment Protection Authority (South Australia)
EIR	Environment impact report
FDP	Field development plan
GIS	Geographic information system
GSL	Gas storage licence
H_2O	Water
H_2S	Hydrogen sulphide
InSAR	Interferometric synthetic aperture radar
ISO	International Organization for Standardization
JV	Joint venture
KPI	Key performance indicator
LOC	Loss of containment
M&V	Monitoring and verification
mD	Millidarcy
MD	Measured depth
mmscf	Million standard cubic feet
NGER	National greenhouse and energy reporting
P&A	Plugged and abandoned
PNL	Pulsed neutron log
PVT	Pressure, volume, temperature
SA	South Australia
SEO	Statement of environmental objectives
SGS	Static gradient survey
TEG	Tri-ethylene glycol
THP	Tubing head pressure
TVDSS	True vertical depth subsea

1. Introduction

This Monitoring and Verification (M&V) Interim Update Report details the work conducted within the Gas Storage Licences (GSL) 1, 2, 3 and 4 and Associated Activities Licence (AAL) 298 located in the South Australian Cooper and Eromanga Basins for the Moomba Carbon Capture and Storage (CCS) project. Covering the six month period 1 February 2025 to 31 July 2025, this report includes the Moomba CCS project activities and milestones required in accordance with the Moomba CCS project – Strzelecki and Marabooka Toolachee monitoring and verification plan (Santos, 2024) (M&V plan), as follows:

- Summary of major project activities and milestones.
- Summary of any containment incident reports.
- Summary and interpretation of M&V activities.
- Comparison of performance against M&V KPIs.
- CO2 injection rate and storage inventory.
- Update of containment risk assessment.

A significant flooding event in the Cooper Basin impacted Moomba gas production from April 2025, the source of CO2 for the Moomba CCS project. We refer to that impact throughout this report as being an impact on 'CO2 availability'. Subject to CO2 availability, well injection and reservoir injection performance continue to be in line with pre-project expectations. Operational and environmental assurance monitoring activities have been completed in line with the M&V plan schedule for the reporting period.

This report demonstrates that M&V plan KPIs have been met, the storage complex is behaving as expected, and injected CO2 is fully contained within the target storage reservoir. Containment risks have not changed with the new project data.

Santos Limited (**Santos**) together with Beach Energy Limited (**Beach**) are the registered title holders of GSLs 1, 2, 3 and 4, and AAL 298. This report has been prepared by Santos, as operator, for and on behalf of the registered title holders for the group.

All operational activity has been conducted using the standards, systems and procedures in alignment with all other Santos operated activities in the Cooper Basin. For further detail regarding Santos' standards, systems and procedures, refer to the Santos 2024 Sustainability Report and Corporate Governance Statement found in the Santos Limited 2024 Annual Report here.

Refer to a prior report, the first Moomba CCS project annual report covering the period 1 February 2024 to 31 January 2025 for a summary of project construction, commissioning, startup and early CO2 injection performance (Moomba CCS project – Strzelecki and Marabooka Monitoring and Verification Activities Report 31-January-2025.pdf).

2. Licence Summary

2.1. Licencees

Gas Storage Licences 1, 2, 3 and 4 were granted on 17 February 2022, with interests in the titles now defined as 66.6% and 33.4% shown in Table 1.

Historically, the Licences were held by the South Australian Cooper Basin Joint Venture (SACB JV). A Deed of Assignment and Assumption dated 23 May 2023 between Alliance Petroleum Australia Pty Ltd, Basin Oil Pty Ltd, Bridge Oil Developments Pty Limited, Reef Oil Pty Ltd, Santos (BOL) Pty Ltd, Santos (NARNL Cooper) Pty Lt, Santos Petroleum Pty Ltd, Vamgas Pty Ltd, Beach Energy (Operations) Limited, Delhi Petroleum Pty Ltd, Santos Limited and Beach Energy Limited was entered on the public register on 16 June 2023, that assigned Santos 66.6% interest and Beach 33.4% in GSLs 1 - 4 and AAL 298.

Table 1 Current title holders: GSL 1 - 4, AAL 298

Company Name	Percentage Interest (%)	ACN
Santos Limited	66.6 %	007 550 923
Beach Energy Limited	33.4 %	007 617 969

2.2. Location

The Group GSLs are located in the Cooper/Eromanga Basin, South Australia and cover approximately 556.6km^2 (Figure 1). The Moomba CCS project Storage Complex area is shown in blue on the map.

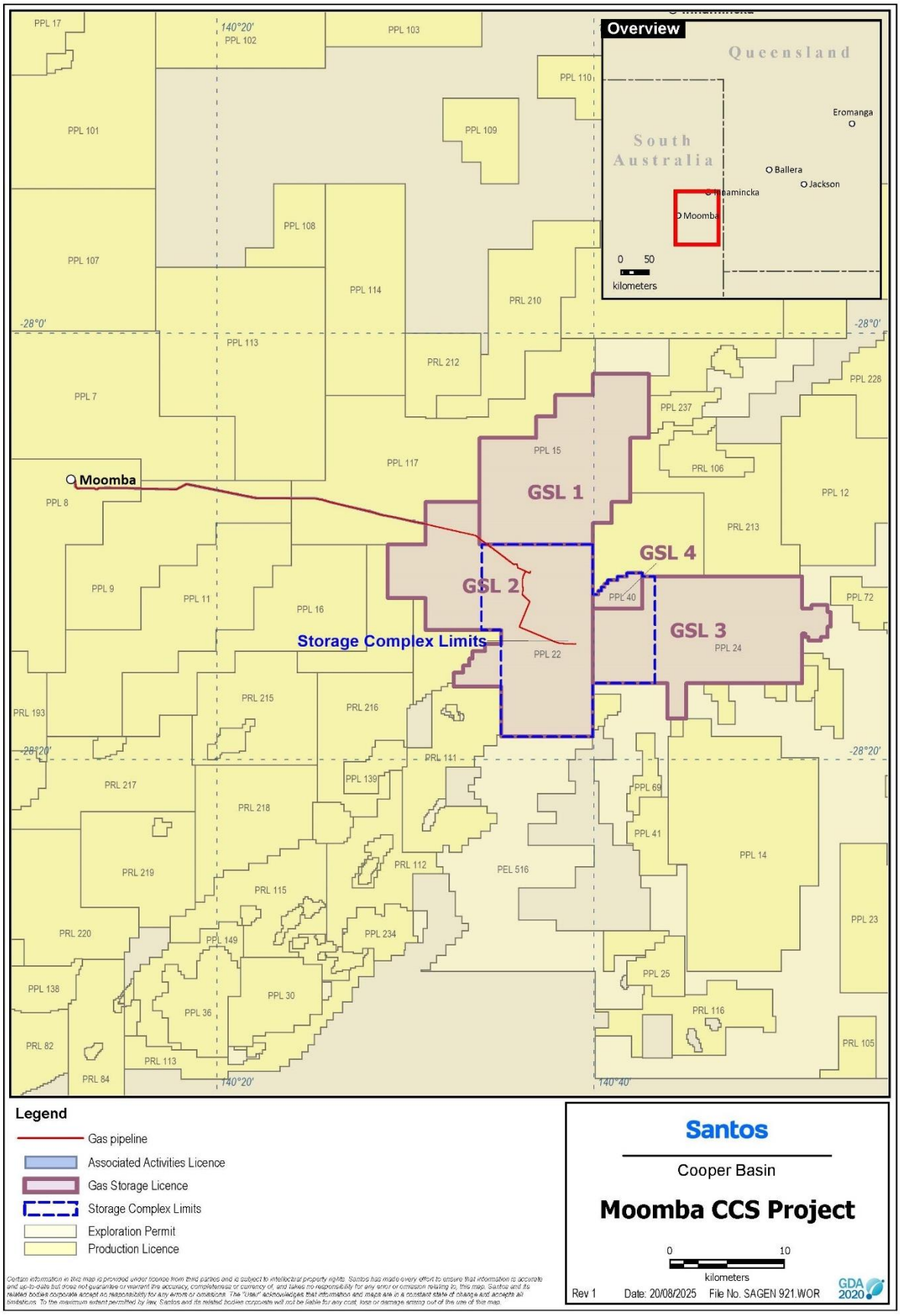

Figure 1 Location of group GSLs

3. Regulated Activities

During the reporting period, the regulated activities conducted included:

- Ongoing project appraisal and definition desktop studies.
- Seismic monitoring and calibrations.
- Cased hole activities associated with the M&V plan including well integrity.
- Monitoring of CO2 injection and reservoir surveillance activities in accordance with the M&V plan.

3.1. Geological and Geophysical Studies

Geological and geophysical desktop studies were undertaken during the reporting period to review and integrate early CO2 injection data.

3.2. Geochemical, Gravity, Magnetic and Other Surveys

No geochemical, gravity, magnetic or other surveys were undertaken during the reporting period.

3.3. Seismic Monitoring

During the reporting period, the seismic monitoring stations were online, assessing seismicity, and able to detect and geo-locate seismic events.

3.4. Major Activities

Major activities include facilities construction, drilling, completions, workover, well suspension, well abandonment, pipeline and lease construction, seismic data acquisition and processing. There have been no major activities during the reporting period.

3.5. Well Surveillance Activities

All well surveillance activities have been completed in accordance with the M&V plan schedule. Surveillance activities include cased hole wireline activities and well integrity activities as set out in the tables below.

Table 2 Cased hole wireline activities within GSL 2 & 3

Permit	Well Name	Date	Details
GSL 2	Marabooka 4	9 June 2025	S-line / Static Gradient Survey
GSL 3	Marana 2	10 June 2025	S-line / Static Gradient Survey
GSL 2	Nanima 1	11 June 2025	S-line / Static Gradient Survey
GSL 2	Wanara 1	12 June 2025	S-line / Static Gradient Survey
GSL 2	Strzelecki 10	16 June 2025	S-line / Static Gradient Survey
GSL 2	Strzelecki NE 1	20 June 2025	S-line / Static Gradient Survey

Well integrity monitoring and maintenance activities have been completed for all non-P&A wells within the storage complex in accordance with the M&V plan and well integrity management plans. These activities are set out in Table 3. All wells within GSL 2 and 3 that have been drilled through the Toolachee Formation are monitored except wells that have been plugged and abandoned. Strzelecki 12, which is a Hutton monitoring well, is not drilled to the Toolachee Formation but is added to this monitoring schedule.

Table 3 Well integrity activities within GSL 2 & 3

Well Name	Date Completed	Details
Strzelecki 16	24 January 2025	Pressure Survey
Strzelecki 29	24 January 2025	Pressure Survey
Marabooka 19	31 January 2025	Pressure Survey
Marabooka 5	31 January 2025	Pressure Survey
Nanima 2	31 January 2025	Pressure Survey
Strzelecki 12	31 January 2025	Pressure Survey
Strzelecki 24	31 January 2025	Pressure Survey
Strzelecki 34	31 January 2025	Pressure Survey
Strzelecki 35	31 January 2025	Pressure Survey
Strzelecki 36	31 January 2025	Pressure Survey
Strzelecki 37	31 January 2025	Pressure Survey
Marabooka 19	28 February 2025	Pressure Survey
Marabooka 5	28 February 2025	Pressure Survey
Nanima 2	28 February 2025	Pressure Survey
Strzelecki 12	28 February 2025	Pressure Survey
Strzelecki 24	28 February 2025	Pressure Survey
Strzelecki 34	28 February 2025	Pressure Survey
Strzelecki 35	28 February 2025	Pressure Survey
Strzelecki 36	28 February 2025	Pressure Survey
Strzelecki 37	28 February 2025	Pressure Survey
Strzelecki 16	16 March 2025	Pressure Survey
Strzelecki 16	16 March 2025	Well Integrity Check

Well Name	Date Completed	Details
Marabooka 19	31 March 2025	Pressure Survey
Marabooka 5	31 March 2025	Pressure Survey
Nanima 2	31 March 2025	Pressure Survey
Strzelecki 12	31 March 2025	Pressure Survey
Strzelecki 24	31 March 2025	Pressure Survey
Strzelecki 34	31 March 2025	Pressure Survey
Strzelecki 35	31 March 2025	Pressure Survey
Strzelecki 36	31 March 2025	Pressure Survey
Strzelecki 37	31 March 2025	Pressure Survey
Marabooka 3	09 April 2025	Pressure Survey
Marabooka 8	09 April 2025	Pressure Survey
Marana 2	09 April 2025	Pressure Survey
Nanima 1	09 April 2025	Pressure Survey
Strzelecki 1	09 April 2025	Pressure Survey
Strzelecki 10	09 April 2025	Pressure Survey
Strzelecki 14DW1	09 April 2025	Pressure Survey
Strzelecki 17	09 April 2025	Pressure Survey
Strzelecki 23	09 April 2025	Pressure Survey
Strzelecki 5	09 April 2025	Pressure Survey
Wanara 1	09 April 2025	Pressure Survey
Marabooka 19	30 April 2025	Pressure Survey
Marabooka 5	30 April 2025	Pressure Survey
Nanima 2	30 April 2025	Pressure Survey
Strzelecki 12	30 April 2025	Pressure Survey
Strzelecki 24	30 April 2025	Pressure Survey
Strzelecki 34	30 April 2025	Pressure Survey
Strzelecki 35	30 April 2025	Pressure Survey
Strzelecki 36	30 April 2025	Pressure Survey
Strzelecki 37	30 April 2025	Pressure Survey
Strzelecki 15	23 May 2025	Pressure Survey
Strzelecki 25	23 May 2025	Pressure Survey
Strzelecki 3	23 May 2025	Pressure Survey
Strzelecki 32	23 May 2025	Pressure Survey
Strzelecki 33	23 May 2025	Pressure Survey
Strzelecki Northeast 1	23 May 2025	Pressure Survey
Marabooka 2	24 May 2025	Pressure Survey
Marabooka 4	24 May 2025	Pressure Survey
Marabooka 6	24 May 2025	Pressure Survey

Well Name	Date Completed	Details
Marabooka 19	31 May 2025	Pressure Survey
Marabooka 5	31 May 2025	Pressure Survey
Nanima 2	31 May 2025	Pressure Survey
Strzelecki 12	31 May 2025	Pressure Survey
Strzelecki 24	31 May 2025	Pressure Survey
Strzelecki 34	31 May 2025	Pressure Survey
Strzelecki 35	31 May 2025	Pressure Survey
Strzelecki 36	31 May 2025	Pressure Survey
Strzelecki 37	31 May 2025	Pressure Survey
Marabooka 2	6 Jun 2025	Pressure Survey
Marabooka 3	6 Jun 2025	Pressure Survey
Marabooka 4	6 Jun 2025	Pressure Survey
Marabooka 6	6 Jun 2025	Pressure Survey
Marana 1	6 Jun 2025	Pressure Survey
Strzelecki 13	6 Jun 2025	Pressure Survey
Strzelecki 20	6 Jun 2025	Pressure Survey
Strzelecki 25	6 Jun 2025	Pressure Survey
Strzelecki 27	6 Jun 2025	Pressure Survey
Strzelecki 33	6 Jun 2025	Pressure Survey
Strzelecki 7	6 Jun 2025	Pressure Survey
Strzelecki 9	6 Jun 2025	Pressure Survey
Strzelecki Northeast 1	6 Jun 2025	Pressure Survey
Marana 2	10 Jun 2025	Pressure Survey
Nanima 1	10 Jun 2025	Pressure Survey
Strzelecki 16	10 Jun 2025	Pressure Survey
Strzelecki 19	10 Jun 2025	Pressure Survey
Strzelecki 21	10 Jun 2025	Pressure Survey
Strzelecki 22	10 Jun 2025	Pressure Survey
Strzelecki 23	10 Jun 2025	Pressure Survey
Strzelecki 28	10 Jun 2025	Pressure Survey
Strzelecki 6	10 Jun 2025	Pressure Survey
Wanara 1	10 Jun 2025	Pressure Survey
Marabooka 19	30 Jun 2025	Pressure Survey
Marabooka 5	30 Jun 2025	Pressure Survey
Nanima 2	30 Jun 2025	Pressure Survey
Strzelecki 12	30 Jun 2025	Pressure Survey
Strzelecki 24	30 Jun 2025	Pressure Survey
Strzelecki 34	30 Jun 2025	Pressure Survey

Well Name	Date Completed	Details
Strzelecki 35	30 Jun 2025	Pressure Survey
Strzelecki 36	30 Jun 2025	Pressure Survey
Strzelecki 37	30 Jun 2025	Pressure Survey
Marabooka 19	31 Jul 2025	Pressure Survey
Marabooka 5	31 Jul 2025	Pressure Survey
Nanima 2	31 Jul 2025	Pressure Survey
Strzelecki 12	31 Jul 2025	Pressure Survey
Strzelecki 24	31 Jul 2025	Pressure Survey
Strzelecki 34	31 Jul 2025	Pressure Survey
Strzelecki 35	31 Jul 2025	Pressure Survey
Strzelecki 36	31 Jul 2025	Pressure Survey
Strzelecki 37	31 Jul 2025	Pressure Survey

4. Injection Well Performance

4.1. Injection Data Reporting

The monthly injected CO2 volumes for the Moomba CCS project are totalled below in Table 4 and Table 5. Variations in totals are due to operational requirements and facilities optimisation.

Table 4 Mass of total injected CO2 stream (thousand tonnes)

Month	Marabooka 19	Strzelecki 34	Strzelecki 35	Strzelecki 36	Strzelecki 37	Total
Feb 2025	36.2	14.4	21.5	19.6	21.7	113.4
Mar 2025	26.0	11.1	18.1	16.0	15.1	86.2
Apr 2025	32.5	7.6	24.8	22.2	22.2	109.2
May 2025	20.0	7.2	21.8	20.4	20.2	89.5
Jun 2025	21.2	11.8	23.7	21.0	21.2	98.9
Jul 2025	20.4	14.9	21.7	18.1	18.0	93.1

Table 5 Volume of total injected CO2 stream (mmscf)

Month	Marabooka 19	Strzelecki 34	Strzelecki 35	Strzelecki 36	Strzelecki 37	Total
Feb 2025	690.6	273.4	409.3	373.5	413.7	2,160.6
Mar 2025	495.4	211.7	344.3	305.8	287.1	1,644.3
Apr 2025	620.3	144.3	472.8	424.3	423.4	2,085.0
May 2025	382.6	137.8	415.7	388.7	385.5	1,710.3
Jun 2025	404.6	226.1	452.9	401.7	404.2	1,889.6
Jul 2025	389.5	284.0	413.7	345.2	343.7	1,776.1

Monthly injection stream composition data is set out in Table 6 below. The Moomba CCS facilities have delivered a high-quality CO2 stream with all components meeting the compositional operating envelope requirements of the M&V plan.

Table 6 CO2 injection stream composition (monthly average mole%)

Month	CO2	CH4	C2 to N2 *	H2S	H2O
Feb 2025	99.23	0.68	0.09	<0.01	<0.01
Mar 2025	98.99	0.92	0.09	<0.01	<0.01
Apr 2025	98.89	1.02	0.09	<0.01	<0.01
May 2025	98.57	1.35	0.08	<0.01	<0.01
Jun 2025	98.80	1.12	0.08	<0.01	<0.01
Jul 2025	99.02	0.89	0.09	<0.01	<0.01

*(C2 to N2) = C2, C3, C4+ and N2

4.2. Well Injectivity

The Moomba CCS project commenced injection into the wells and reservoir at low rates on 30 September 2024, then ramped up quickly in early October 2024 to project nameplate capacity of 84 mmscf/d (1.7 million tonnes per annum of CO2-equivalent) and has been consistently injecting at stabilised rates since that date, limited only by CO2 availability. Figure 2 compares CO2 injected into the reservoir ('Capture Rate') vs available CO2 since injection start up. The green line in this figure ('Well Injection Capacity') represents the estimated maximum total project injection rate potential of all five wells. Injection capacity increased in the early stages of the project as injected CO2 displaced formation fluids and improved the relative permeability of the reservoir in the near-wellbore region. Injection capacity is currently high due to the low pressure of the depleted storage reservoir but will slowly decrease over the coming months and years as reservoir pressure increases in line with reservoir model forecasts. Total available CO2 volumes reduced during the reporting period due to a significant flooding event in the Cooper Basin that impacted Moomba gas production, the source of CO2 for the Moomba CCS project. The impact can be seen commencing in April 2025 on Figure 2 below. Successful production recovery actions are underway and a small increase in CO2 volumes is evident at the end of the reporting period. Available CO2 volumes have continued to increase beyond the reporting period.

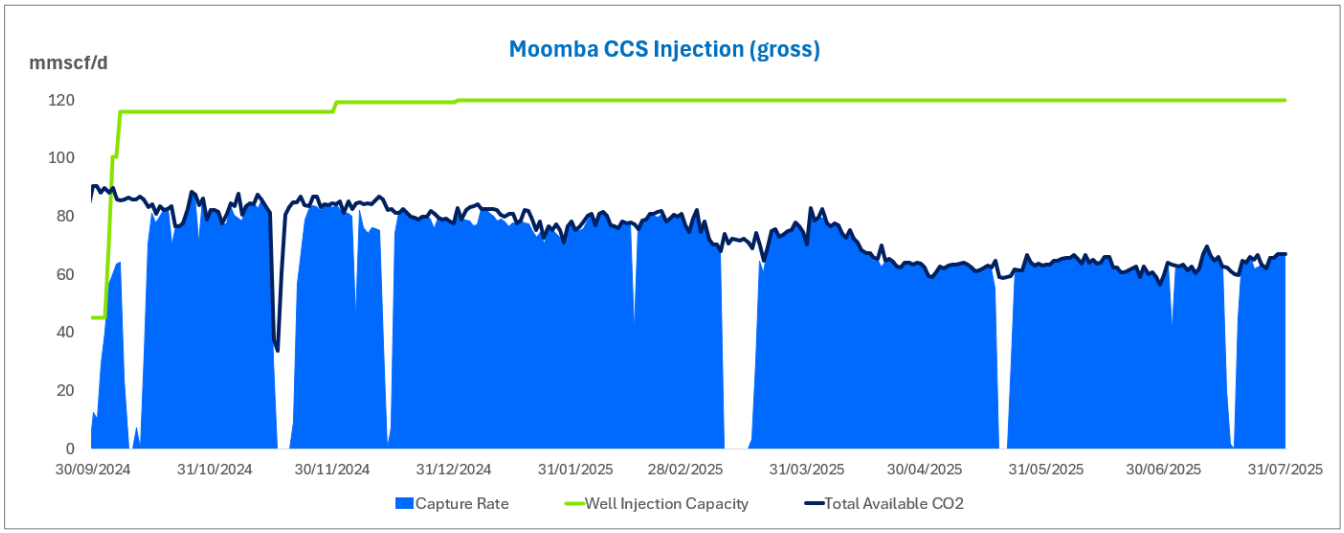

Figure 2 Moomba CCS project injection performance

The following figures show well performance for each injection well, including injection rate, bottomhole pressure (BHP), tubing head pressure (THP) as well as operating envelope for BHP and THP constraints. The data are presented on a daily average basis since start of injection until the end of July 2025. Well injection rates were varied during the project commissioning, startup and initial injection phases in response to well and reservoir injectivity, but in the later part of the reporting period changes in well injection rates are related to surface facilities optimisation, pipeline operational considerations and CO2 availability, not well injection constraints.

The bottomhole pressure constraint for the wells is calculated from a pressure gradient of 0.54 psi/ft at the top of the perforation depth and is based on a Geomechanics study as outlined in the M&V plan. The THP constraint for all wells is a constant value of 2,120 psi (also set out in the M&V plan).

Figure 3 shows the injection performance of Strzelecki 34. This well been selected as a 'swing well' since the well displays good injectivity at relatively low BHP and the flow control valve on the lease skid has been sized to allow low rate. As such, the well is choked back to reduce injection rate when required and this can be seen in the figure.

The average BHP for the reporting period is 1,530 psi, which is approximately 1,500 psi within the maximum pressure constraint. The average THP for the corresponding period is 690 psi, approximately 1,400 psi below the constraint. The highest daily pressures reached during the reporting period for BHP and THP are 2,350 psi and 1,330 psi respectively, each well below the maximum allowable. The well injection rate peaked to 22 mmscf/d and was injecting at approximately 10 mmscf/d at the end of the reporting period. The lower rate is due to reduced CO2 availability and is unrelated to well or reservoir injectivity.

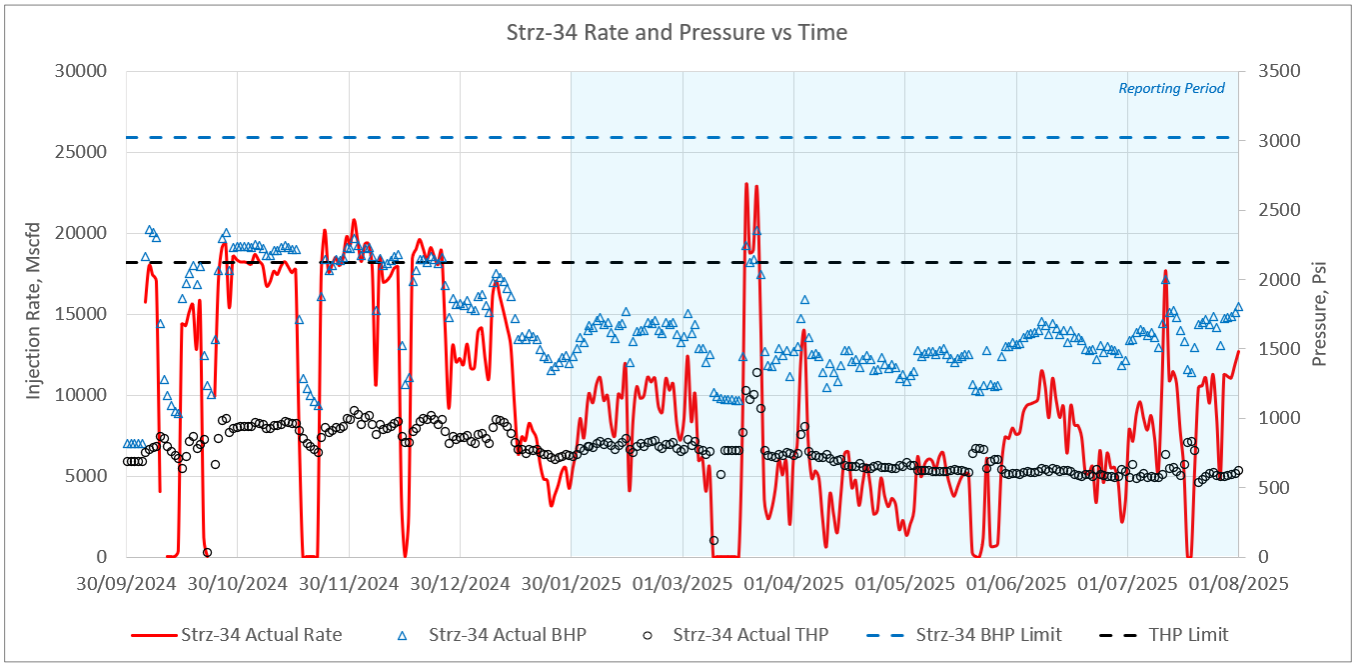

Figure 3 Strzelecki 34 injection performance chart

Figure 4 outlines the injection performance for Strzelecki 35 which is the best injection well in Strzelecki in terms of injectivity. The peak injection rate in this well since project startup was approximately 28 mmscf/d in October with minimal change in bottomhole pressure. The peak injection rate in this well during the reporting period was approximately 19 mmscf/d in April. Overall, the well has been operating in a stabilised manner throughout the reporting period and was injecting at approximately 15 mmscf/d at the end of the reporting period, with rate being managed to operational requirements. As can be seen in the data, the BHP in this well is not as sensitive as other Strzelecki wells to injection rate which is an indication of the good quality reservoir encountered by the well. The average BHP for the reporting period is 2,457 psi, which is approximately 580 psi within the maximum pressure constraint. The average THP for the corresponding period is 1,070 psi, approximately 1,050 psi below the constraint. The highest daily pressures reached during the reporting period for BHP and THP are 2,535 psi and 1,375 psi respectively, each well below the maximum allowable.

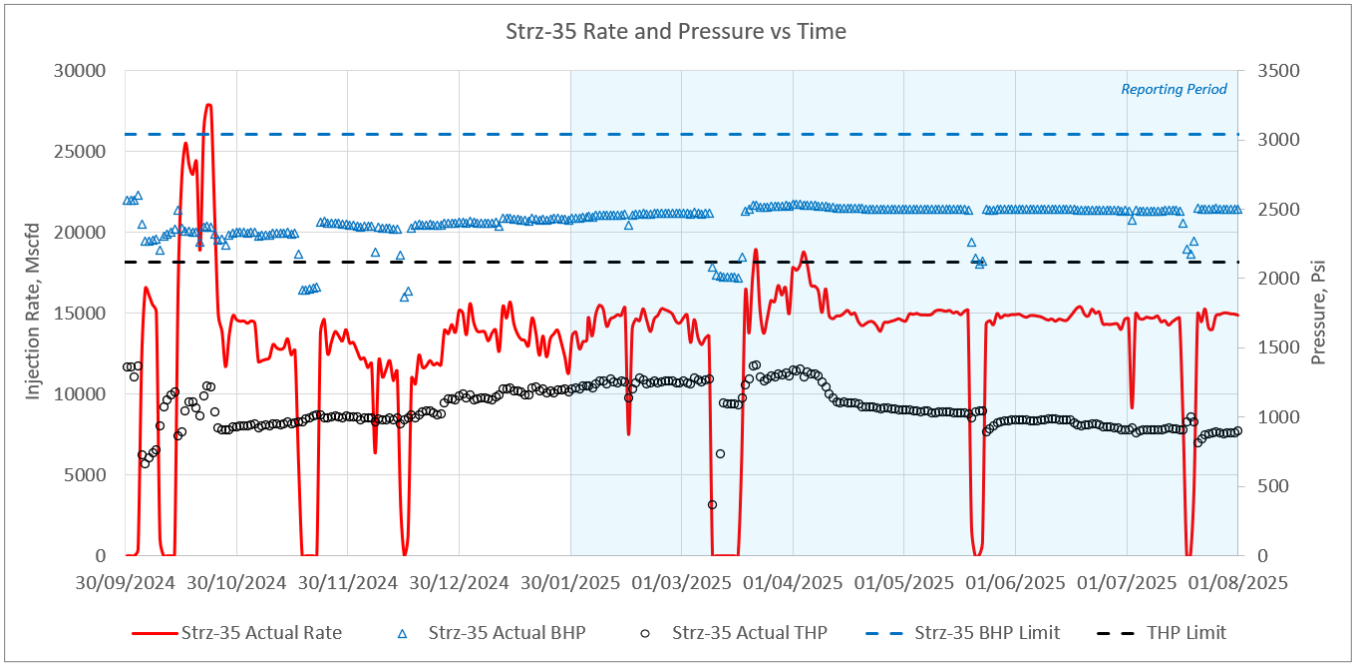

Figure 4 Strzelecki 35 injection performance chart

Figure 5 shows injection performance in Strzelecki 36. This well has the lowest injection rates amongst the five wells, however injectivity is increasing with injected CO2 volume. This can be observed in the injection performance data, as BHP is reducing with minimal change in rate. The maximum injection rate for this well during the reporting period was 14 mmscf/d in May, and the rate at the end of the reporting period was approximately 12 mmscf/d. The average BHP for the reporting period is 2,308 psi, which is approximately 780 psi within the maximum pressure constraint. The average THP for the corresponding period is 1,005 psi, approximately 1,115 psi below the constraint. The highest daily pressures reached during the reporting period for BHP and THP are 2,709 psi and 1,382 psi respectively, each well below the maximum allowable.

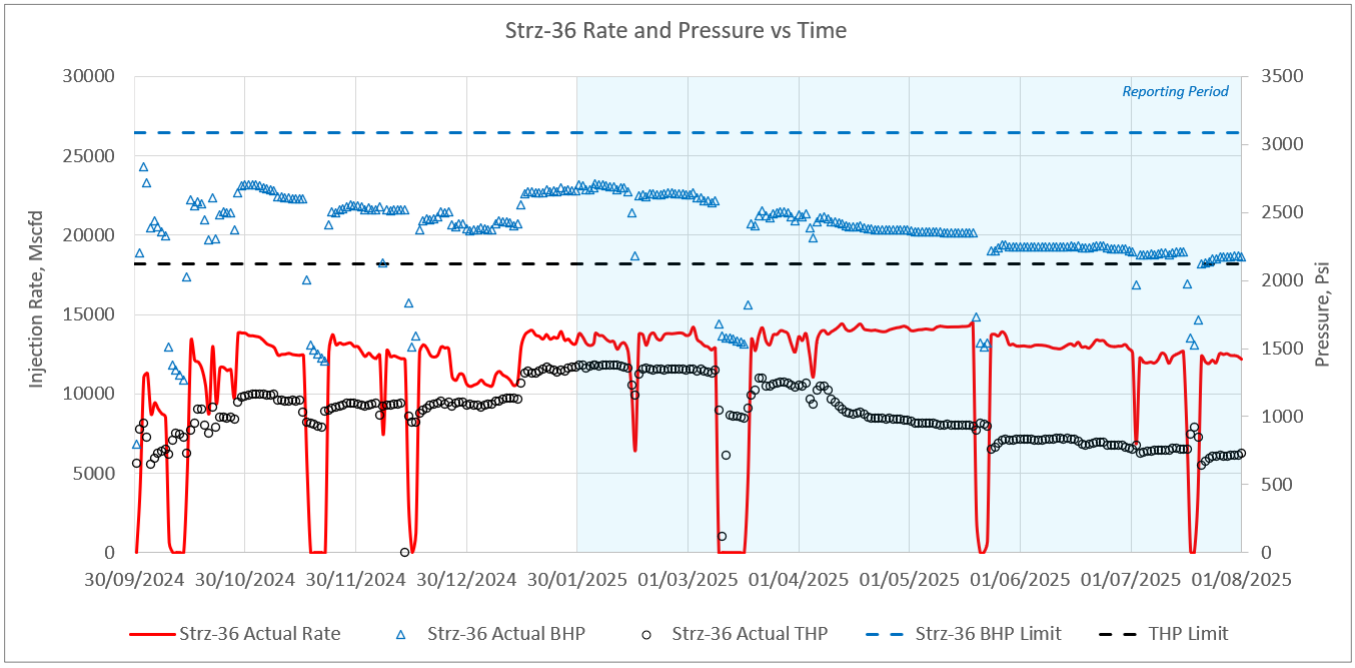

Figure 5 Strzelecki 36 injection performance chart

Strzelecki 37 has been injecting under stabilised conditions throughout the reporting period (Figure 6). Peak rate during the reporting period was approximately 16 mmscf/d in February and the injection rate at the end of the reporting period was approximately 12 mmscf/d. The average BHP for the reporting period is 2,308 psi, which is approximately 720 psi within the maximum pressure constraint. The average THP for the corresponding period is 1,022 psi, approximately 1,100 psi below the constraint. The highest daily pressures reached during the reporting period for BHP and THP are 2,540 psi and 1,350 psi respectively, each well below the maximum allowable. There is an unperforated interval in Strzelecki 37 (Toolachee Lower) that can be added later in the life of the well to improve the injectivity when reservoir pressure has increased.

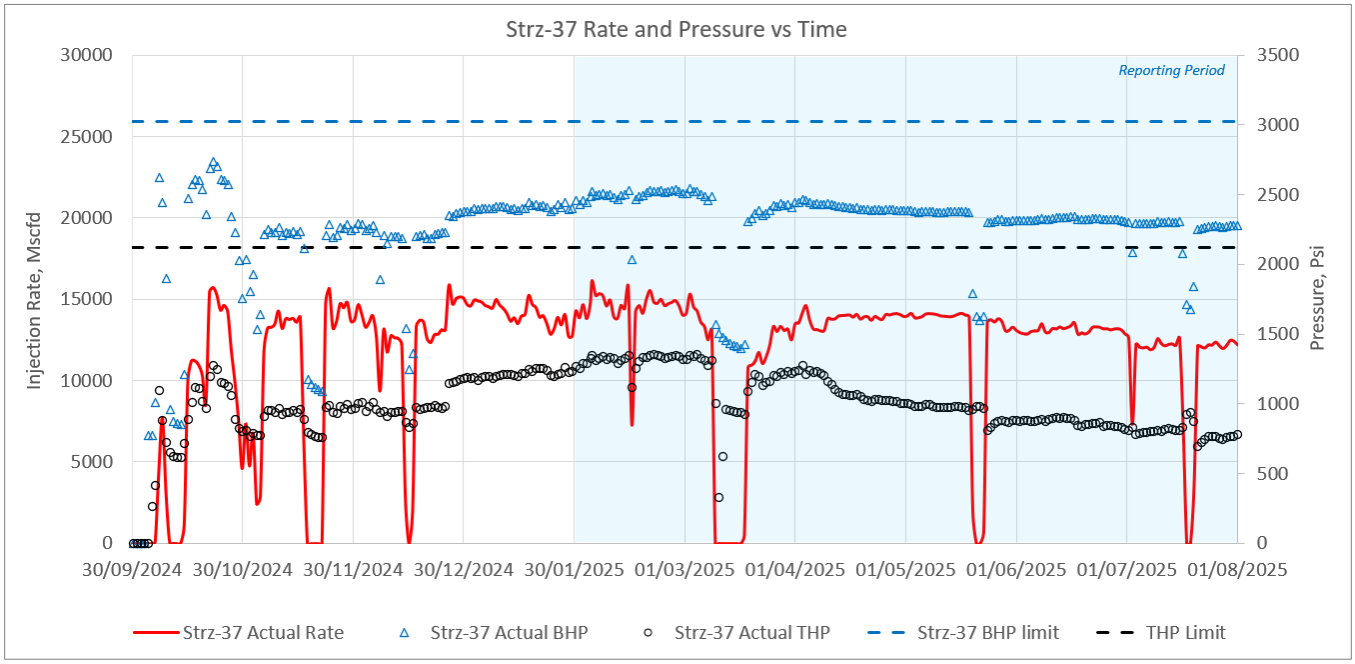

Figure 6 Strzelecki 37 injection performance chart

Marabooka 19 is the best injector amongst the five wells. The well's peak injection rate has been managed to a maximum of 30 mmscf/d due to tubing velocity constraints, although the well is capable of higher rate (Figure 7). The average BHP for the reporting period is 1,588 psi, which is approximately 1,570 psi within the maximum pressure constraint. The average THP for the corresponding period is 800 psi, approximately 1,320 psi below the constraint. The highest daily pressures reached during the reporting period for BHP and THP are 1,682 psi and 1,244 psi respectively, each well below the maximum allowable. Like Strzelecki 34, the well has been selected as a swing well where injection rates may be reduced when required, and this can be seen in the injection performance chart for the months of May, June and July 2025.

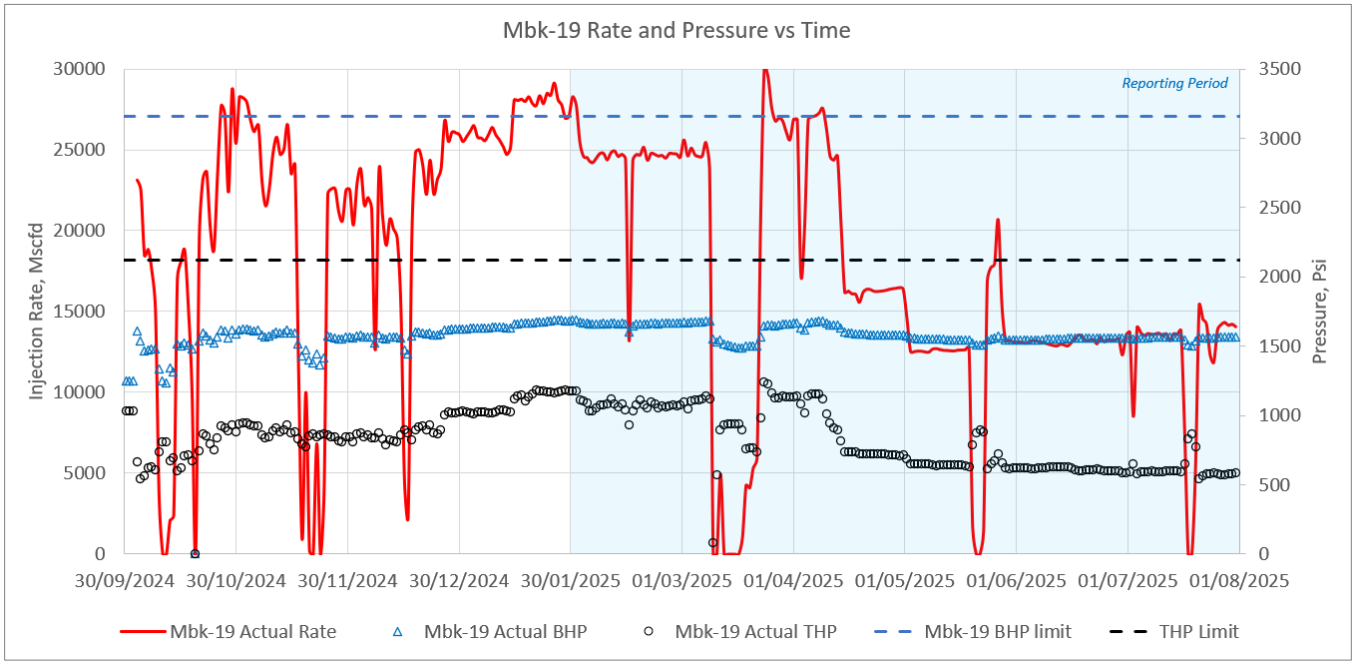

Figure 7 Marabooka 19 injection performance chart

4.3. Well Temperature

The temperature of CO2 at surface and bottomhole conditions for all five injector wells are shown in Figure 8 and Figure 9 respectively for the duration of the reporting period. Surface temperature of CO2 is continuously measured on the lease skid, upstream of the choke and is shown as a solid line in Figure 8, for example "Mbk-19 inlet". Wellhead temperatures downstream of the choke are measured regularly on site and these are shown as discrete data points in the figure, for example "Mbk-19 WH". The figure shows wellhead temperatures are consistently between 10 and 30°C lower than inlet temperatures, as a function of rate and wellhead pressure. Wellhead temperature data are well within the minimum and maximum constraint range specified in the M&V plan (-29 and 65°C respectively).

Marabooka 19 inlet temperature (Figure 8) is higher than other injection wells since the well is located closer to the Moomba CCS Compression Facility. The CO2 experiences a small temperature drop as it travels between Marabooka 19 and the Strzelecki wells. A seasonal trend can be seen in the surface data for all wells as ambient temperatures cool in the Cooper Basin between January and August.

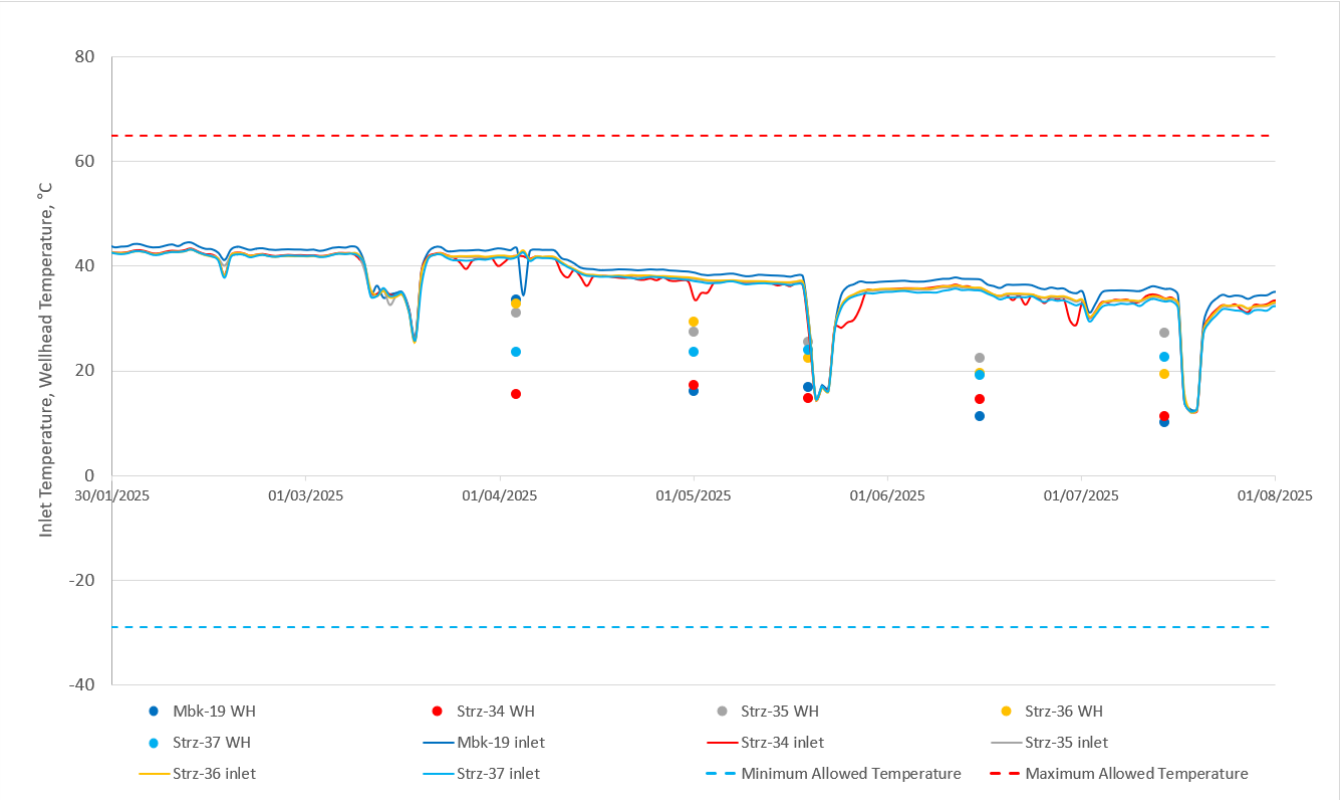

Figure 8 Surface temperature all injection wells

Permanent downhole gauges installed in each injector well are continuously measuring bottomhole temperature and these data are shown in Figure 9. As can be seen in the plot, the temperatures in all wells are well above the minimum bottom hole temperature specified in the M&V plan (0°C) throughout the reporting period. Short duration temperature increases in March, May and July are related to surface facility shutdowns and associated cessation of well injection. Strzelecki 34 variations are due to injection rate changes since the well is being used as a swing well – refer section 4.2.

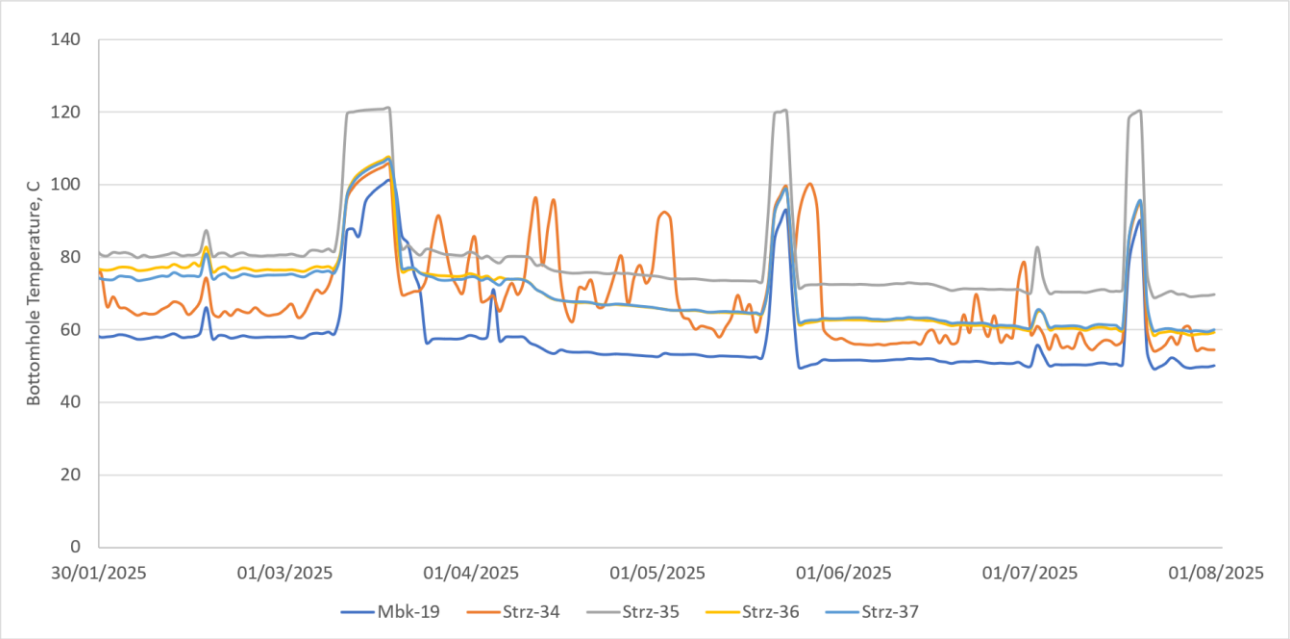

Figure 9 Bottomhole temperature in all injection wells

4.4. Modelling Update

Overall, wells and reservoir injection performance are within the range of reservoir model predictions and monitoring well pressure responses to CO2 injection are consistent with expectations at this stage of the project.

A fully integrated reservoir model workflow was completed for Strzelecki and Marabooka fields prior to the execution phase of the Moomba CCS project. This model has been updated during the reporting period with the integration of new data. This includes injector well logs, sand-by-sand pressure data, injected CO2 volumes and monitoring and surveillance data. The preliminary results of the updated reservoir model are set out in this section.

The five new injector wells encountered greater variability than initially predicted. Variations were observed in fluid contacts and reservoir distribution relative to the original reservoir model. To improve characterisation of this variability and contact movement in the model, it was updated to include a finer layering scheme and more lateral heterogeneity. Figure 10 below shows a section through the static model comparing original against updated model to illustrate the observations and changes summarised above.

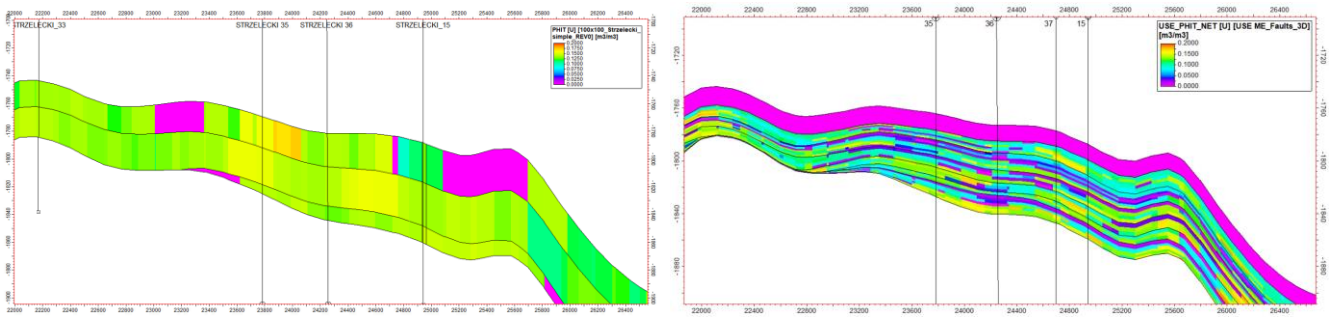

Figure 10 reservoir static model cross-section schematic showing porosity – original pre-execution model (LHS) and new preliminary model (RHS)

The reservoir model has been updated and history matched to the original Strzelecki and Marabooka raw gas production and pressure data, CO2 injected volumes and monitoring well pressure data. The history match is good with minimal modifications, which gives confidence in the predictions of the model, however the model is preliminary only at this stage.

Reservoir model forecast injector well bottom hole pressures are compared to actual well data in Figure 11. There is good agreement which further supports the preliminary model predictive accuracy. Forecasts are denoted "_Model" and are based on a total project injection rate of 84 mmscf/d and maximum bottom hole pressure constraint of 3,300 psi. Strzelecki 34 actual data is lower than forecast since this well has been used as a swing well to date, with reduced injection to account for the overall reduced total project rate due to Cooper Basin floods impact. Total project CO2 injection rates are increasing thanks to successful flood recovery efforts and Strzelecki 34 injection rate is forecast to increase accordingly.

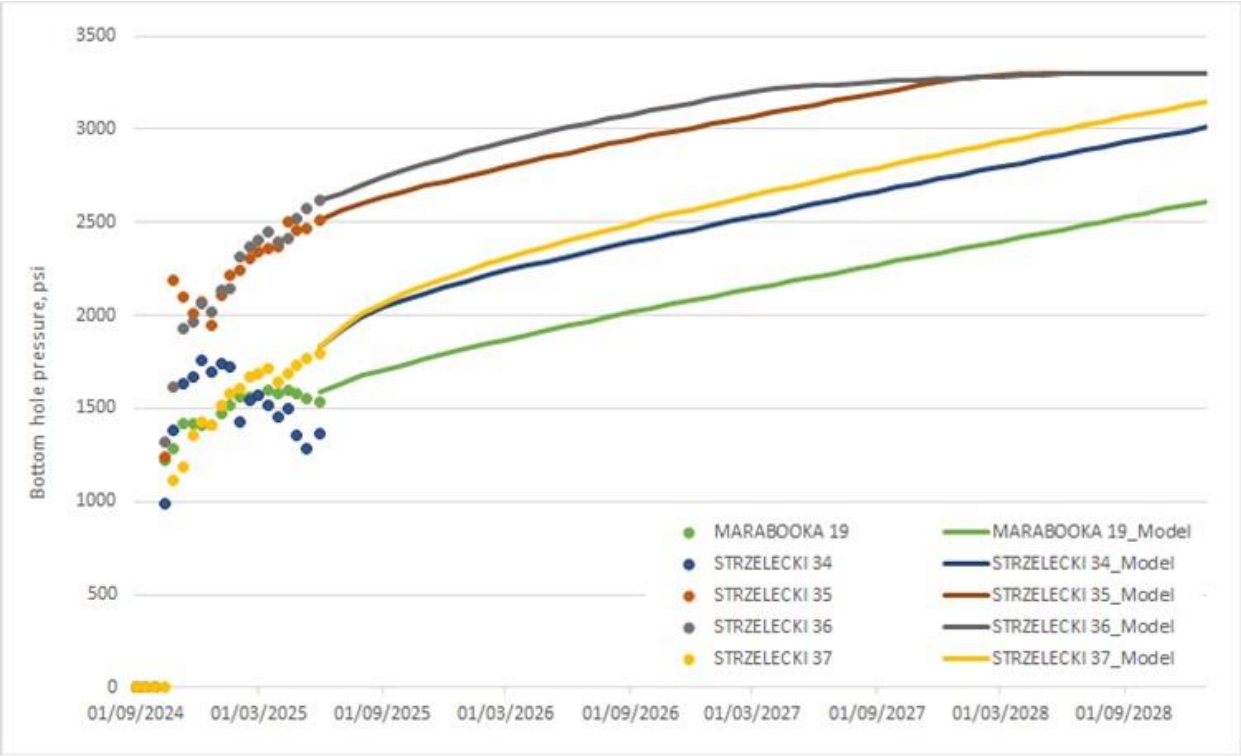

Figure 11 reservoir model predicted vs actual bottom hole pressure data

Furthermore, actual measured bottom hole pressures at operational monitoring wells (section 5.2) are in line with the range of reservoir pressures forecast by the preliminary model.

The Moomba CCS project reached a key milestone of 1.0 million tonnes CO2e injected in June 2025 after approximately 9 months of continuous CO2 injection, and this can be seen in Figure 12 below showing the summed average CO2 mole fraction for all reservoir model layers. As expected at this stage of the project the CO2 plume extent is limited and remains proximal to the injector wells. The lighter colour blue in the image is the remaining small volumes of original raw gas in the Toolachee depleted reservoir, for which the CO2 mole fraction was 7%.

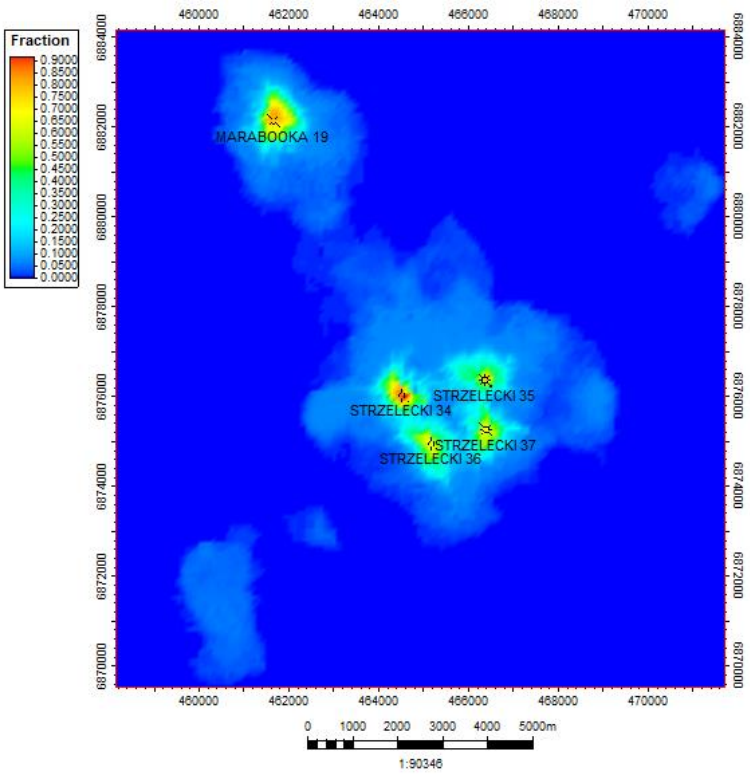

Figure 12 reservoir model 1.0 million tonnes CO2e injected

The new preliminary reservoir model was used to simulate a full project life scenario: 8 years of CO2 injection followed by a post-injection closure period. Figure 13 shows the CO2 plume concentration in 2040 following the closure period. The model confirms all injected CO2 remains permanently stored within the storage complex and the predicted plume extent is consistent with the CO2 polygon area set out in the M&V plan. In line with the original model, some spill of CO2 is expected into the Marana accumulation immediately east of Strzelecki. No spill is anticipated into the Nanima and Wanara accumulations, which lie south-west of Strzelecki and on the migration path out of the greater storage complex.

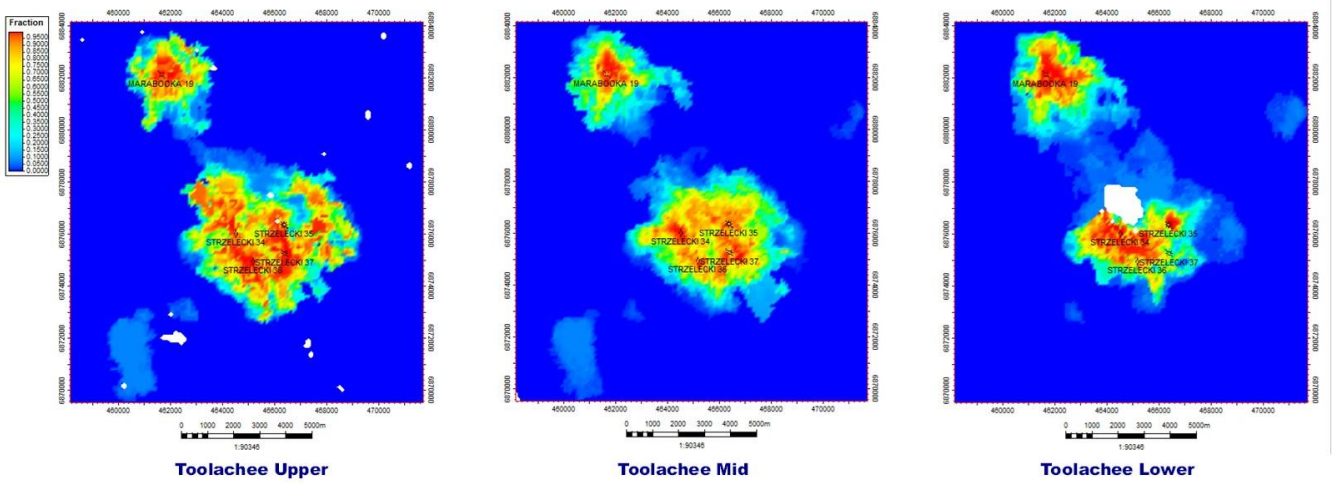

Figure 13 reservoir model visualisation showing CO2 plume in 2040 (mole fraction of CO2)

In summary, the new preliminary reservoir model confirms full containment of CO2 within the target storage reservoir. The model is planned to be finalised and a summary update provided in the next reporting period.

5. Compliance Summary

5.1. Containment Incidents

No loss of containment incidents occurred during the reporting period. The storage complex is behaving as expected and injected CO2 is fully contained within the target storage reservoir.

Any incidents, such as near-misses, injuries or environmental spills to grade, associated with the Moomba CCS project are included in the annual licence report; "*Cooper-Eromanga Basin, South Australia, Gas Storage Licence 1, 2, 3 & 4 (AAL 298)"* in accordance with "*South Australia – Moomba. Statement of Environmental Objectives: Carbon Storage (March 2021)"*.

5.2. M&V Operational Monitoring and Performance KPIs

As required by the M&V plan, an Annual Report must contain:

"Comparison of performance against M&V KPIs; CO2 injection rate and storage inventory; Summary and interpretation of M&V activities"

Operational monitoring is required to quantify volume of CO2 stored in the subsurface, verify location of CO2 within the target storage reservoir and inform ongoing storage reservoir modelling.

Operational monitoring comprises the following elements:

- Injection telemetry – gathering surface flow, pressure and temperature data during CO2 injection;
- Reservoir surveillance – gathering subsurface reservoir data and conducting modelling to monitor the movement of the CO2 and confirm location of CO2 within the storage complex; and
- Well integrity – inspection of surface equipment and gathering downhole data to monitor the integrity of wells which intersect the storage complex.

All operational monitoring activities have been completed during the reporting period, in line with the M&V plan schedule.

5.2.1. M&V Performance Targets

Key performance indicators (KPIs) are defined in the M&V plan. The KPIs have been selected to clearly focus on the most important aspects of M&V plan performance (Table 7).

All KPIs have been satisfied, and containment thresholds remain at 'green' levels for the reporting period.

Table 7 Key performance indicators for the M&V plan

KPI number	KPI name	Definition	Compliance
1	Measurement accuracy	The maximum uncertainty in total flow rate measurement is not greater than ±1.5%.	Satisfied
2	Operating envelope	Operate within the composition limits (section 1.2 of M&V plan) and injection condition limits (section 9.1 of M&V plan) at least 99% of the time.	Satisfied
3	Vertical containment	CO2 stays contained within the target Toolachee injection reservoir. Containment threshold remains at 'green' level, as defined in section 3.5 of M&V plan.	Green
4	Lateral containment	CO2 stays contained within the target Toolachee injection reservoir. Containment threshold remains at 'green' level, as defined in section 3.5 of M&V plan.	Green
5	Monitoring activity schedule	Monitoring and verification activities will be at least 90% compliant with the planned activity schedule, as defined in section 5.4 of M&V plan	Satisfied

Measurement accuracy has satisfied the requirements of the M&V plan and KPI number 1 has been met. Santos has demonstrated in section 5.2.3 of this report that Coriolis meters are calibrated and verified to show a high level of accuracy and the continuous gas analyser is operating within the prescribed limits.

The project has been operating within the required operating envelope and KPI number 2 has been met. Refer section 4 outlining injection wells flowrate, pressure and temperature, and measured CO2 stream composition.

Vertical containment is confirmed. The threshold remains at 'green' level and KPI number 3 has been met, as evidenced by the Hutton Sandstone pressure measurement at Strzelecki 12 (section 5.3.2).

Lateral containment is confirmed. The threshold remains at 'green' level and KPI number 4 has been met. Pressure observations seen at monitoring wells are in line with expectations and the reservoir model (section 5.2). The CO2 plume lateral extent is likely to be proximal to the injection wells at this early stage of the project.

KPI number 5 has been met. Monitoring activities have been completed in compliance with M&V plan requirements and are summarised in Table 8.

5.2.2. Operational Monitoring

A summary of operational monitoring activities is set out in Table 8. As can be seen in the table, the project has met the operational requirements of the M&V plan; all downhole gauges are installed and fully functioning, all baseline logging, pressure acquisition and other activities are complete and the data is of good quality, and well integrity status shows a high level of compliance well above the 90% requirement. These activities are further analysed in detail in the following sections.

Table 8 Schedule of monitoring activities

No.	Location	Type	Activity	Zone	Status of activity during the Reporting Period
1	Marabooka 19	I	Downhole P/T gauge	TO	Continuously monitoring
			Injection telemetry	TO	Continuously monitoring
2	Strzelecki 34	I	Downhole P/T gauge	TO	Continuously monitoring
			Injection telemetry	TO	Continuously monitoring
3	Strzelecki 35	I	Downhole P/T gauge	TO	Continuously monitoring
			Injection telemetry	TO	Continuously monitoring
4	Strzelecki 36	I	Downhole P/T gauge	TO	Continuously monitoring
			Injection telemetry	TO	Continuously monitoring
5	Strzelecki 37	I	Downhole P/T gauge	TO	Continuously monitoring
			Injection telemetry	TO	Continuously monitoring
6	Marabooka 4	O	SGS	TO	New data acquired
7	Marabooka 5	O	Downhole hole P/T gauge	TO	Continuously monitoring
			PNL	TO	No new data in this period, consistent with M&V plan
8	Strzelecki 10	O	SGS	TO	New data acquired
			PNL	TO	No new data in this period, consistent with M&V plan
9	Strzelecki 24	O	Downhole P/T gauge	TO	Continuously monitoring
10	Strzelecki 33	O	PNL	TO	No new data in this period, consistent with M&V plan
11	Strzelecki NE 1	O	SGS	PA	New data acquired
12	Marana 2	O	SGS	TO	New data acquired
			PNL	TO	No new data in this period, consistent with M&V plan
13	Nanima 2	O	Downhole P/T gauge	TO	Continuously monitoring
			PNL	TO	No new data in this period, consistent with M&V plan
14	Wanara 1	O	SGS	TO	New data acquired
			PNL	TO	No new data in this period, consistent with M&V plan
15	Field	F	InSAR surface displacement study		No new data in this period, consistent with M&V plan
16	Field	F	Induced seismicity monitoring		Continuously monitoring
17	All wells	W	Annulus pressure monitoring		98% activities completed
18	All wells	W	Well integrity inspection		100% activities completed
19	Risk based, 1-3 wells	W	Cement evaluation		No new data in this period, consistent with M&V plan
20	Risk based, 1-3 wells	W	Casing / tubing evaluation		No new data in this period, consistent with M&V plan

Type:

- I = injection well
- O = observation well
- W = general well
- F = field wide
- G = groundwater

Zone:

- TO = Toolachee Formation
- HU = Hutton Sandstone
- PA = Patchawarra Formation
- PO = Poolowanna Formation
- SU = surficial aquifer

5.2.3. Metering and Measurement Accuracy

The following points give confidence that the Moomba CCS metering is working within the prescribed measurement accuracy of +/-1.5%:

- The two Coriolis flow meters used for custody transfer measurement at the capture point were factory calibrated prior to installation on 30 April 2024 and the calibration results are within the uncertainty limits.
- A 3-monthly accuracy verification test was completed satisfactorily on 24 June 2025.
- CO2 stream gas samples are routinely taken at the capture point and compositional analysis completed for all components. These samples confirm the accuracy of the continuous gas analyser is within the prescribed limits.

5.2.4. Seismicity Monitoring

An eight geophone micro-seismic array has been continuously monitoring for seismic activity throughout the reporting period. During the reporting period, no events have been detected within the storage complex associated with injection activities.

The geophones record all ground movements, including minor movements associated with surface activities such as drilling rig or heavy equipment activity. Ground movements that trigger three or more sensors are processed to validate the movement and filter out noise. All processed and validated ground movements are analysed, and seismic events of interest are geo-located to establish if they originated within the storage complex.

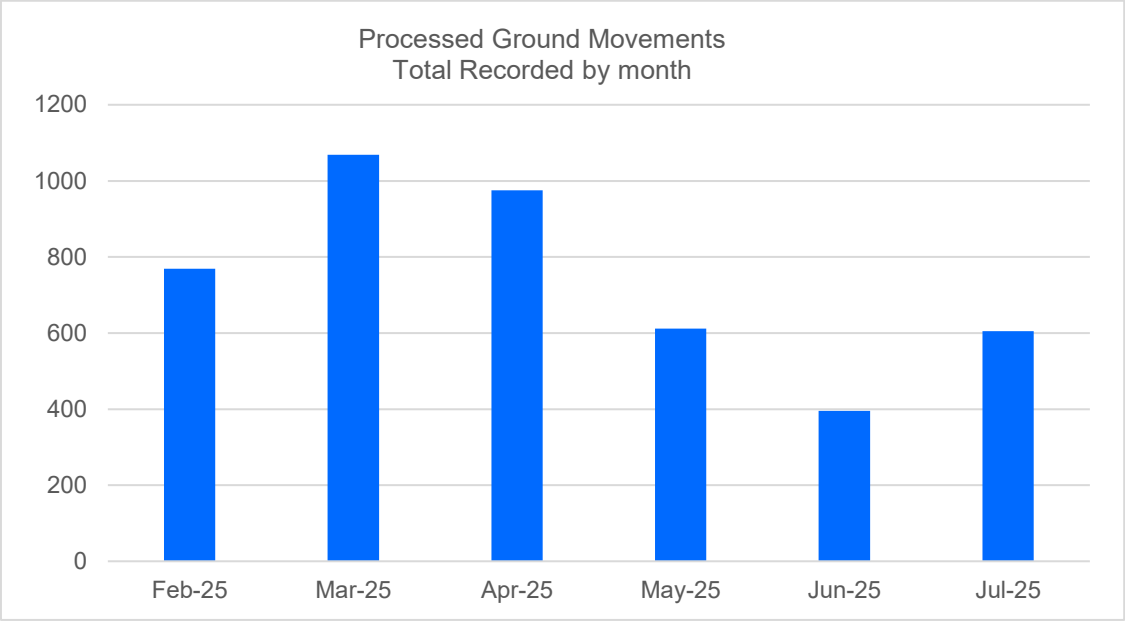

Figure 14 Processed Ground Movements – total movements recorded each month by the monitoring array

During this reporting period, a seismic event was detected that met the detection criteria[1]. This event was geolocated below the storage complex at an estimated depth of 3,773 m TVDSS. This event was detected by the monitoring array on 12 May 2025 with a moment magnitude of 1.1 Mw and geolocated to a mapped lineament within the basement. A second seismic event was detected on 12 May 2025 with a moment magnitude of 0.6 Mw. This event was geolocated to the same mapped lineament within the basement (estimated depth 3,246 m TVDSS). The locations of these events are shown in Figure 15 relative to the monitoring array and Figure 16 relative to the mapped basement lineament below the storage complex. The two events were detected well below the target storage reservoir and are not related to CO2 injection.

[1] Mw 1.0 is the defined detection limit threshold (M&V plan)

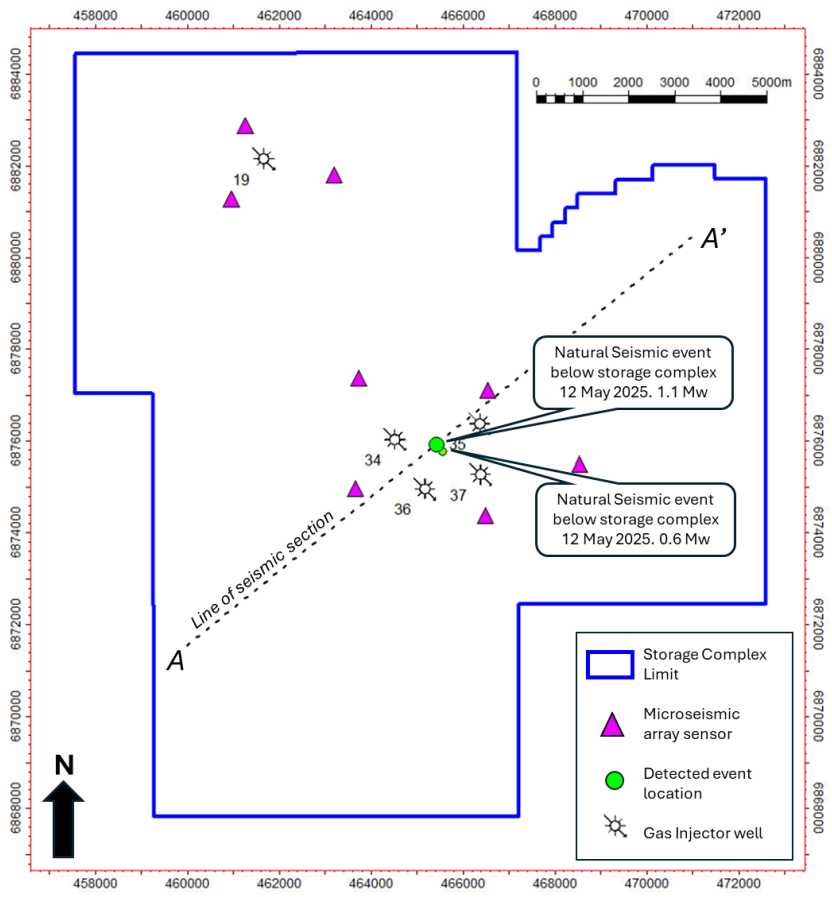

Figure 15 Detected events within the limits of the monitoring array for the report period 1 February 2025 – 31 July 2025

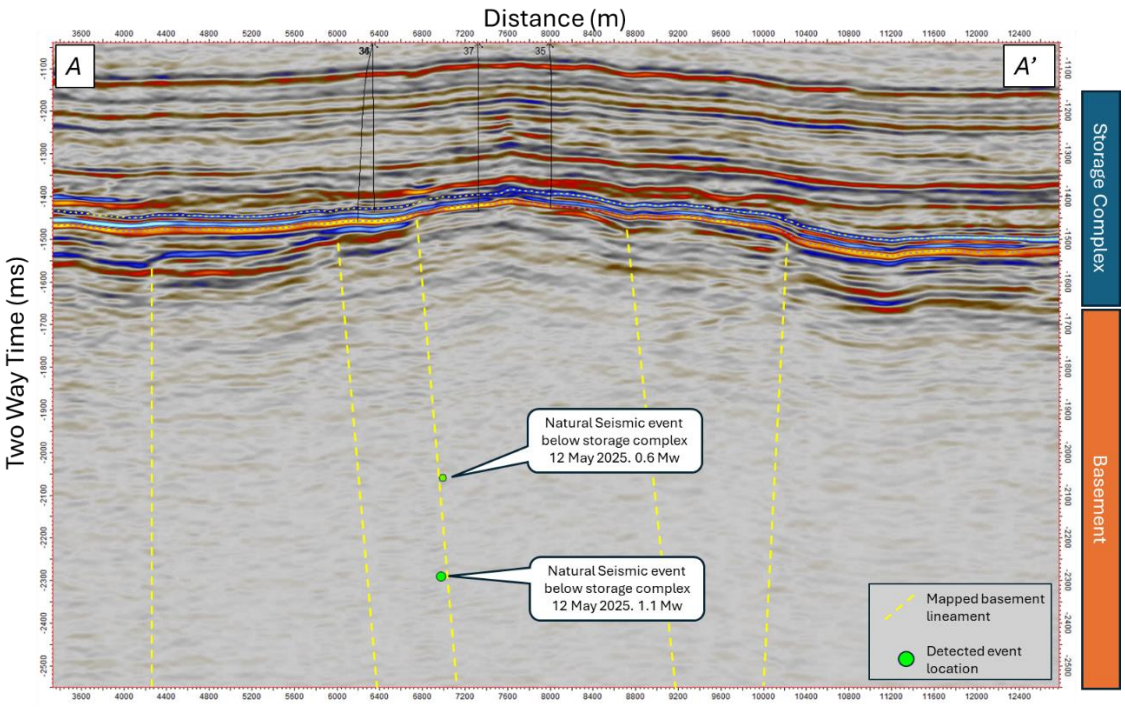

Figure 16 Seismic section highlighting position of detected events on a mapped basement lineament below the storage complex

During the reporting period, a further 21 validated seismic events were detected far from the storage complex and not associated with the Moomba CCS project. Of these events, 16 have been geolocated as distant events associated with tectonic events outside of Australia, and five have been geolocated as regional events within Australia at distances of 90 to 700 km to the monitoring array. These detected events show good correlation to events detected on the Geoscience Australia passive seismic array.

Given the information recorded to date, Santos is confident the array is performing to expectation and can detect any significant events within the storage complex which may result from injection activities.

5.2.5. Pulsed Neutron Logs

No pulse neutron logs were acquired in this reporting period, in line with the M&V schedule.

5.2.6. Downhole Gauges (DHG)

Reservoir pressure surveillance is a key part of the M&V plan. Downhole gauges have been installed at selected monitoring wells in Strzelecki and Marabooka to continuously monitor the Toolachee reservoir pressure. These data will be used to monitor the extent of the CO2 plume within the storage reservoir and to update the reservoir model throughout the life of the project. A further gauge has been installed at Nanima to monitor for lateral containment of CO2.

The gauges have continued to function accurately during the reporting period. Pressures are responding to injected CO2 in line with expectations and consistent with full containment of CO2 within the Toolachee storage reservoir. Lateral containment remains at 'green' level as defined in the M&V plan.

A summary of the downhole gauges is provided in Table 9 and gauge data is presented in the following figures.

Table 9 List of wells with downhole gauge and Toolachee target monitoring zone

Well Name	Monitoring Zone	Comments
Marabooka 5	Toolachee	DHG continuously monitoring throughout the reporting period
Strzelecki 24	Toolachee	DHG continuously monitoring throughout the reporting period
Nanima 2	Toolachee	DHG continuously monitoring throughout the reporting period

Figure 17 shows the measured Toolachee reservoir pressure at Marabooka 5 since end July 2024. The period of baseline pressure data prior to the commencement of CO2 injection shows a small trend of reservoir pressure increase. This increase is an indication of reservoir recharge due to broader field pressure support since the field was shut-in in 2024, and cross flow between Toolachee sands of varying pressure. In December 2024, an additional small change in the rate of pressure increase can be seen, approximately 8 weeks after the commencement of injection. This later pressure increase is the observed pressure response to CO2 injection into the adjacent injection well, Marabooka 19, and the pressure response is in line with expectation and the reservoir model.

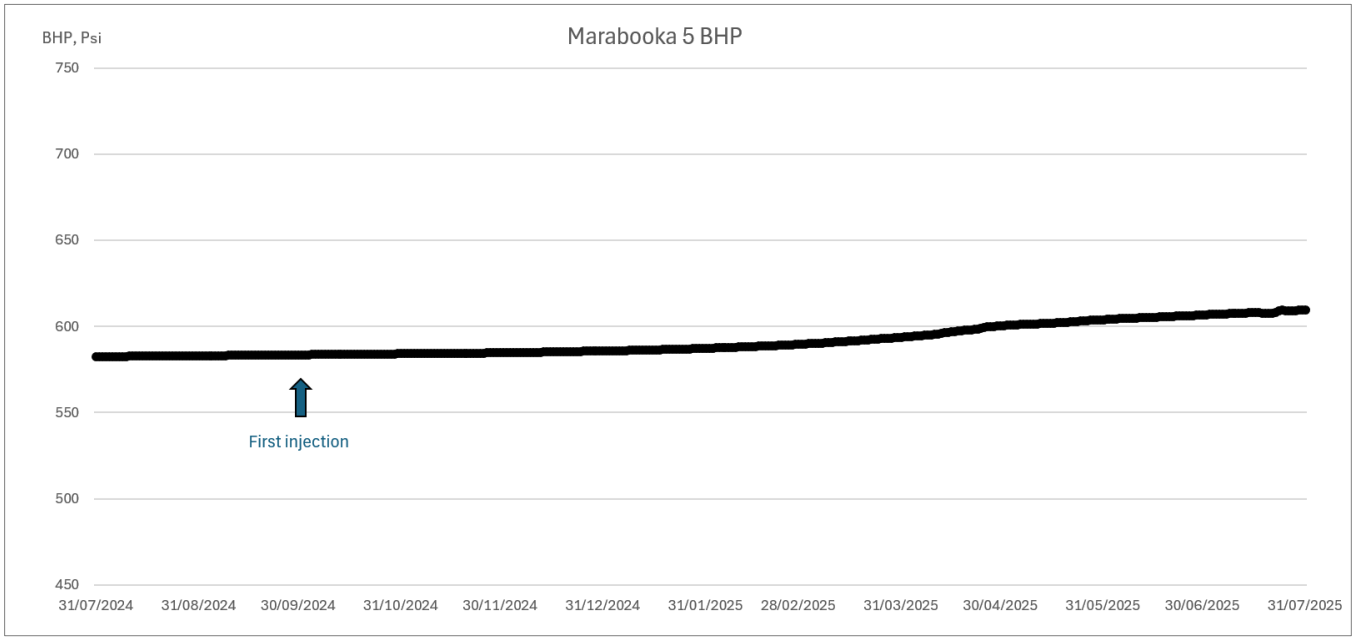

Figure 17 Marabooka 5 monitoring well, DHG showing Toolachee pressure

The Strzelecki 24 monitoring well shows no indication of Toolachee pressure increase due to CO2 injection at the Strzelecki injector wells (Figure 18). This is consistent with expectation since Strzelecki 24 is some distance from the injectors, with a fault mapped between the well and the main part of the field. The history-matched reservoir model predicts the well will see a pressure response from injected CO2 later in the life of the project.

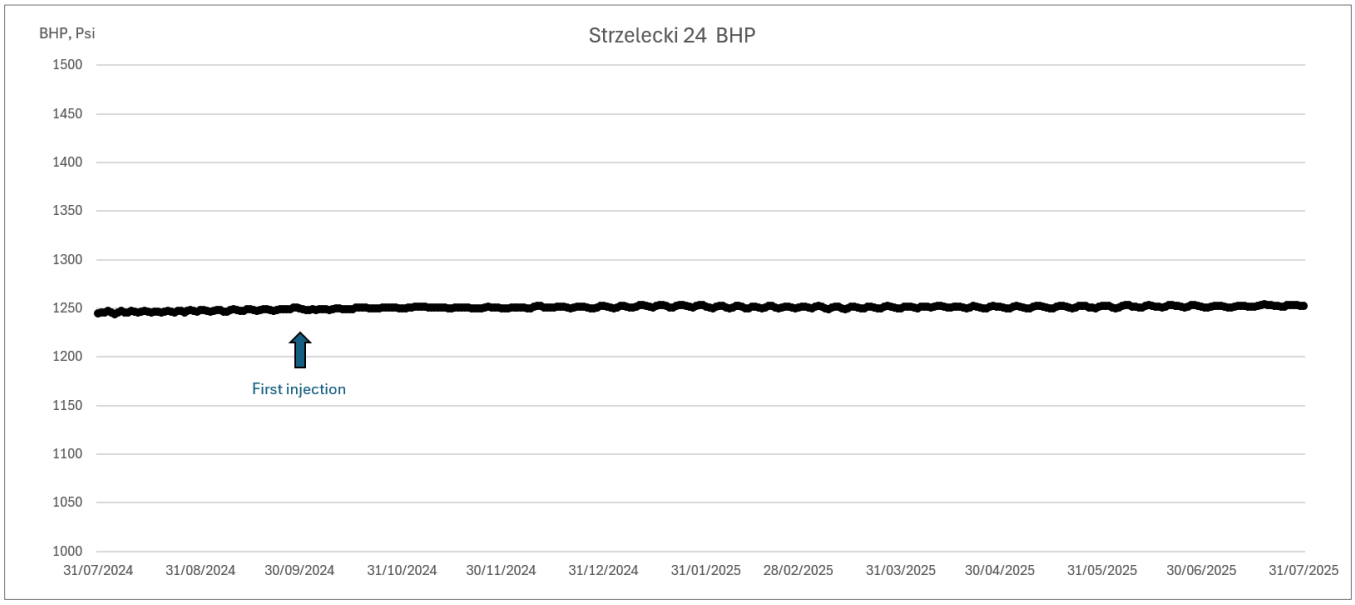

Figure 18 Strzelecki 24 monitoring well, DHG showing Toolachee pressure

Nanima 2 is a key monitoring well located in a small structural high on the migration pathway out of the main Strzelecki structure, and outside the estimated maximum extent of the CO2 plume. If CO2 were to spill laterally out of closure, it would be expected to accumulate at this location.

Consistent with the other monitoring wells, a small level of reservoir recharge is evident in the baseline pressure data (Figure 19). There has been no change in pressure at Nanima 2 due to CO2 injection, which is evidence of lateral containment within the target storage reservoir.

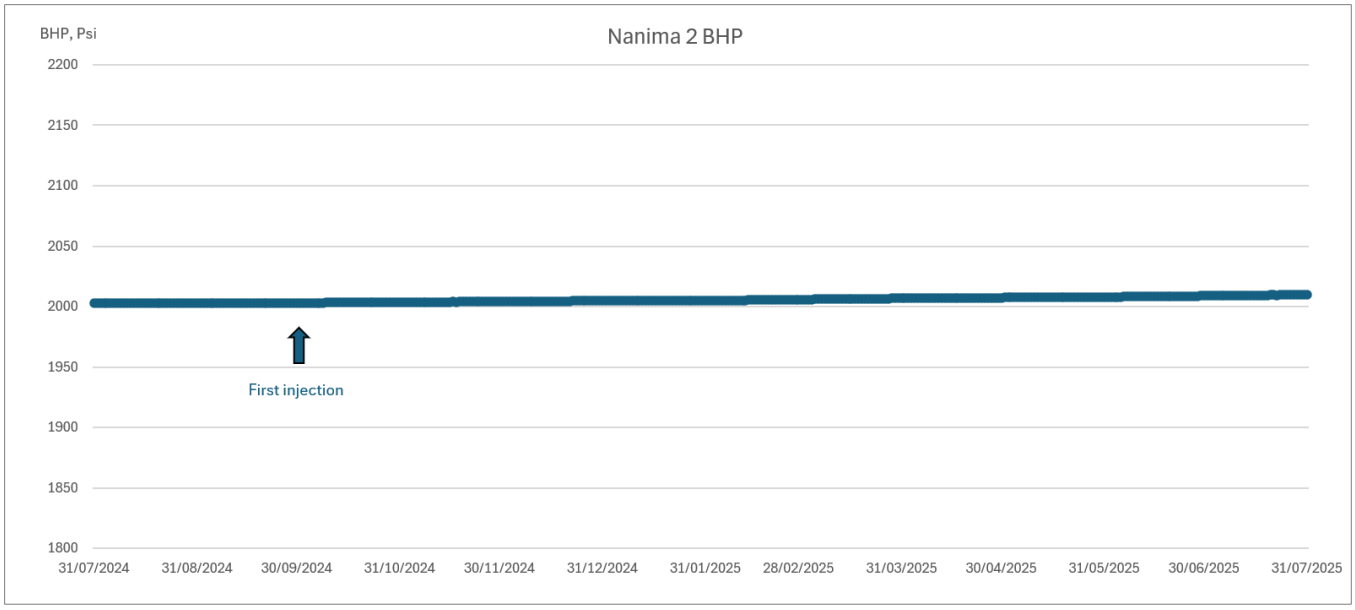

Figure 19 Nanima 2 monitoring well, DHG showing Toolachee pressure

5.2.7. Static Gradient Survey (SGS)

Reservoir pressure surveillance is conducted at other designated monitoring wells using slickline-conveyed static gradient surveys (SGS). New operational monitoring pressure data have been successfully acquired during the reporting period at the following wells in accordance with the M&V plan: Marabooka 4, Strzelecki 10, Strzelecki Northeast 1, Wanara1 and Marana 2. The pressures are compared against baseline in Table 10 and Table 11 below.

The Marabooka 4 measured pressure correlates well with FMT data acquired at Marabooka 19 in equivalent sands prior to the commencement of CO2 injection. A small level of depletion is evident when compared against baseline pressure, likely due to cross flow between Toolachee sands of varying pressure. There is no evidence of pressure increase due to injected CO2 at the Marabooka 4 well location.

Strzelecki 10 and Wanara 1 pressures are lower than baseline indicating cross flow between Toolachee sands of varying pressure and no evidence of pressure change due to CO2 injection at those well locations.

At Marana 2 the measured SGS pressure is higher than the baseline survey. This increase is an indication of reservoir recharge due to broader field pressure support since the field was shut-in in 2024 and is not related to injected CO2 volumes.

All measured operational monitoring SGS pressure data are within the range of reservoir model pressure forecasts and consistent with expectations.

Table 10 List of wells with SGS surveys in Toolachee

Well	Baseline survey date	Operational survey date	Baseline pressure at datum depth (psi)	Operational pressure at datum depth (psi)	Variance (psi)	Comments
Marabooka 4	10/09/2024	9/06/2025	1,667	1,647	-20	Cross flow between Toolachee sands of varying pressure
Strzelecki 10	18/05/2023	16/06/2025	1,178	1,168	-10	No evidence of pressure change due to CO2 injection.
Wanara 1	18/07/2023	12/06/2025	2,269	2,253	-16	No evidence of pressure change due to CO2 injection
Marana 2	20/07/2024	10/06/2025	831	867	+36	Reservoir recharge and field pressure support

Operational monitoring pressure data has been successfully acquired at Strzelecki Northeast 1, it provides a Patchawarra pressure data point for the northeast sector of the Strzelecki field (Table 11). The measured pressure is higher than the baseline survey due to ongoing reservoir pressure support since gas production was shut-in in 2024 and is not related to injected CO2 volumes at this stage of the project.

Table 11 List of wells with SGS surveys in Patchawarra

Well	Baseline survey date	Operational survey date	Baseline pressure at datum depth (psi)	Operational pressure at datum depth (psi)	Variance (psi)	Comments
Strzelecki Northeast 1	22/07/2024	20/06/2025	1,814	1,836	+22	Reservoir recharge and field pressure support

5.2.8. Casing and Tubing Monitoring

No casing or tubing corrosion logs were acquired in this reporting period, in line with the M&V schedule.

5.2.9. Cement Bond Logs

No cement bond logs were acquired in this reporting period, in line with the M&V schedule.

5.2.10. Well Integrity and Annulus Monitoring

Well annulus monitoring has been completed at all non-P&A wells within the storage complex for the reporting period in accordance with the M&V plan and well integrity management plans.

Annulus monitoring includes:

- Continuous remote monitoring of the production and surface casing annulus pressure for all injection wells.
- Continuous remote monitoring of the surface casing annulus pressure for specified monitoring wells.
- At least one manual survey of annulus pressure every six months for all non-P&A wells that are not continuously monitored within the storage complex.
- Well integrity visual inspections are undertaken at least once every year as per Santos Onshore Well Integrity Management Procedures (OWIMP). Inspections cover the general condition of the wellhead, surface casing and cellar.

Annulus pressure changes have been within the expectations of ambient or wellbore thermal effects for the duration of the reporting period.

Table 12 List of wells with continuous annulus monitoring

Permit	Well Name	Details
GSL 2	MARABOOKA 19	Injection well – Continuous monitoring of surface and production casing pressures
GSL 2	STRZELECKI 34	Injection well – Continuous monitoring of surface and production casing pressures
GSL 2	STRZELECKI 35	Injection well – Continuous monitoring of surface and production casing pressures
GSL 2	STRZELECKI 36	Injection well – Continuous monitoring of surface and production casing pressures
GSL 2	STRZELECKI 37	Injection well – Continuous monitoring of surface and production casing pressures
GSL 2	MARABOOKA 5	Monitoring well – Continuous monitoring of surface casing pressure
GSL 2	NANIMA 2	Monitoring well – Continuous monitoring of surface casing pressure
GSL 2	STRZELECKI 12	Monitoring well – Continuous monitoring of surface casing pressure
GSL 2	STRZELECKI 24	Monitoring well – Continuous monitoring of surface casing pressure

5.3. M&V Environmental Assurance Monitoring

As required by the M&V plan, an Annual Report must contain:

"Summary and interpretation of M&V activities"

Environmental assurance monitoring is required to demonstrate containment within the storage complex has been achieved.

Environmental assurance monitoring comprises the following elements:

- Groundwater quality monitoring – in response to other monitoring data that indicates a subsurface loss of containment may have occurred.
- Monitoring of the overlying geological formations – gathering data to confirm that CO2 has not migrated into formations above the target storage reservoir.

All environmental assurance monitoring activities have been completed during the reporting period, in line with the M&V plan schedule.

5.3.1. Groundwater Quality Monitoring

Santos submitted the *Baseline Groundwater Quality Report, Moomba Carbon Capture and Storage Project (June 2025)* to the Department for Energy and Mining (DEM) on 1 July 2025. On 3 July 2025 DEM notified Santos the *Baseline Groundwater Quality Report, Moomba Carbon Capture and Storage Project (June 2025)* satisfied the reporting requirements of the M&V Plan.

The M&V plan includes a commitment to continue ongoing annual monitoring of the Shallow Aquifer bores throughout the injection period. The first annual monitoring event is scheduled for Q3 2025, outside of the reporting period of this report, and will be reported in the next M&V annual report.

5.3.2. Downhole Gauge (DHG)

A downhole gauge has been installed in Strzelecki 12 to monitor the pressure at the top of the Hutton Sandstone, the first permeable formation above the target storage reservoir. Accumulation of CO2 at the crest of the Hutton would produce a pressure increase in combination with a wellbore pressure gradient that would be an early indicator of CO2 leakage from the storage reservoir into the Hutton.

Table 13 List of wells with downhole gauge with Hutton target monitoring zone

Well Name	Monitoring Zone	Comments
Strzelecki 12	Hutton	DHG continuously monitoring throughout the reporting period

The gauge was installed prior to the commencement of injection to obtain a reliable baseline dataset. Continuous measurement of downhole pressure throughout the reporting period shows the trend has remained steady and there is no indication of pressure increase (Figure 20). This supports full containment of CO2 within the Toolachee storage reservoir. Vertical containment threshold remains at 'green' level for the reporting period, as defined in the M&V plan.

The downhole gauge failed two weeks after the start of injection and a new replacement gauge was promptly mobilised and installed in December 2024. There was a small step change in bottom hole pressure after the gauge replacement that is a function of a slight change in setting depth for the new downhole gauge and completion fluid density used to maintain well control while replacing the downhole gauge.

Figure 20 Strzelecki 12 monitoring well, DHG showing Hutton pressure

5.3.3. Static Gradient Survey (SGS)

Nanima 1 is located southwest of the Strzelecki storage reservoir and near the crest of Poolowanna Formation. The well was selected to monitor Poolowanna pressure for any change over the life of the project which could indicate CO2 migration outside the target storage reservoir. An SGS survey was acquired during the reporting period and the pressure measurement is comparable to the baseline survey (Table 14). This data confirms CO2 is contained within the target storage reservoir and there is no evidence of CO2 leakage into the overlying geological formation.

Table 14 Nanima 1 SGS survey, Poolowanna pressure

Well	Baseline survey date	Operational survey date	Baseline pressure at datum depth (psi)	Operational pressure at datum depth (psi)	Variance (psi)	Comments
Nanima 1	15/10/2024	11/06/2025	2,483	2,486	+3	No change

5.3.4. Pulsed Neutron Logging (PNL)

No pulse neutron logs were acquired in this reporting period, in line with the M&V schedule.

5.4. Containment Risk Assessment

This section summarises the risks associated with containment of CO2 within the target storage reservoir. Further details are outlined in the M&V plan.

Operational and environmental assurance monitoring activities have been completed in line with the M&V plan schedule and all observations support full containment and storage of CO2 within the target storage reservoir. Since monitoring activities conform to the plan and there has been no deviation from expected reservoir performance at this stage of the project, there will be no change to the project containment risk assessment. Containment residual risks ratings are set out in Table 15 below.

Table 15 Containment residual risk ratings

Number	Risk name	Rating	Category
1	Poor cement – old well	Low	Well integrity
2	Poor cement – new well	Low	
3	Degradation of cement – old well	Low	
4	Degradation of cement – new well	Low	
5	Casing corrosion – old well	Low	
6	Casing corrosion – new well	Low	
7	Tubing / packer failure – old well	Low	
8	Tubing / packer failure – new well	Low	
9	Wellhead seal failure – old well	Very Low	
10	Wellhead seal failure – new well	Very Low	
11	Capillary failure of primary seal	Very Low	Geological
12	Fault reactivation	Low	
13	Induced fracture through primary seal	Low	
14	Natural seismicity	Very Low	
15	Natural fracture through primary seal	Very Low	
16	Degradation of primary seal from exposure to CO2	Low	
17	Stratigraphic pathway through primary seal	Very Low	
18	Lateral migration	Low	
19	Third party interference	Very Low	Other

6. Future Work Program

The following regulated activities are proposed for the ensuing period:

- Civil works where required (road, track, borrow pit and well lease construction, road and access track maintenance).
- Well repair activities where required, for example in the case of gauge failure.
- Well rigless monitoring and surveillance activities, including logging activities and well integrity activities.
- Seismicity monitoring.
- Ongoing operation and maintenance of the wells and associated infrastructure.
- Ongoing operation of the CCS facility.
- Monitoring of CO2 injection and reservoir surveillance activities in accordance with the M&V plan.

In addition, desktop appraisal and future CCS project definition will continue over the broader licence area.

7. Forecasted Storage Volumes

The project is able to capture up to 1.7 million tonnes per annum of CO2 equivalent. While this is the nameplate capacity, ultimate storage volumes are primarily determined by the availability of CO2 for injection, and also project maintenance activities and reliability. Given CO2 availability is determined by production, forecast annual storage cannot be provided due to implications for production guidance.

APPENDIX 1 – Summary of compliance with the Strzelecki and Marabooka Toolachee Monitoring and Verification Plan (July 2024)

Obligation	Measurement Criteria	Compliance Status	Performance
Injection telemetry monitoring	Continuous measurement of CO2 injection parameters.	Achieved	To continuously monitor reservoir pressure across the Moomba CCS project as reservoir pressure rises with the injection of CO2, several downhole gauges have been installed. These gauges have been allocated to different wells across several structures and targets to create a comprehensive monitoring and verification network to measure the change in reservoir pressure over the life of the project. All gauges were installed prior to injection to provide a historical baseline. Sections 4 and 5 of this report address this obligation.
Reservoir surveillance	Regular pressure and saturation measurements.	Achieved	Pulsed Neutron Logging (PNL) surveys enable the detection of a gas column in the formation adjacent to the well, through the casing and cement. Baseline PNL data was acquired at 8 wells in the Strzelecki and Marabooka area in the preceding reporting period, the data is of good quality and can be used for comparison against future PNL operational logging to evaluate migration of CO2 for the life of the project. PNLs were not required to be acquired in this reporting period, in line with the M&V schedule.
Well integrity monitoring and management	Conduct casing/tubing evaluations, cement bond logs.	Achieved	Cement evaluation logs, casing and tubing evaluation logs were not required to be acquired in this reporting period. Well annulus monitoring has been undertaken for all non-P&A wells in accordance with well integrity management plans. Sections 3.5 and 5.2.10 provide further detail on how this obligation was achieved.
Environmental assurance monitoring	Monitor groundwater chemistry and CO2 migration indicators.	Not yet triggered.	Based on geochemical evaluation and statistical assessment completed in accordance with Appendix B of the M&V plan, the environmental thresholds developed are sufficiently sensitive to detect a material change to groundwater chemistry if a release of CO2 into groundwater at the monitored locations occurs. Refer to the *Baseline Groundwater Quality Report, Moomba Carbon Capture and Storage Project (June 2025)*. Groundwater monitoring is scheduled to be undertaken in Q3 2025 to fulfill the annual Shallow Aquifer monitoring obligation and will be reported in the next

Obligation	Measurement Criteria	Compliance Status	Performance
			M&V Plan annual report.
Compliance with operational monitoring schedule	Minimum 90% adherence to planned activity schedule.	Achieved	All operational monitoring data has been acquired as per the M&V plan requirements. Section 5.2 provides further detail on how this obligation was achieved.
Annual reporting to DEM	Submission of project status report detailing major activities, incident reports, and containment assessment.	Achieved	The first Moomba CCS project annual report covering the period 1 February 2024 to 31 January 2025 summarised project construction, commissioning, startup and early CO2 injection performance (Moomba CCS project – Strzelecki and Marabooka Monitoring and Verification Activities Report 31-January-2025.pdf). The next Moomba CCS project annual report is scheduled to be provided at the end of March 2026.
Incident reporting	Report serious and reportable incidents in accordance with Carbon Storage SEO.	Achieved	There were no loss of containment incidents during the reporting period. The storage complex is behaving as expected and injected CO2 is fully contained within the target storage reservoir.
Closure monitoring activities	Continued monitoring of downhole gauges, pressure analysis, and CO2 migration verification.	Not yet triggered	No closure activities have been undertaken for this project. Monitoring programs will be established for decommissioned CCS assets as they arise.
Operating envelope compliance	Maintain CO2 injection parameters within approved limits.	Achieved	Section 4, injection well performance, demonstrates that pressure, temperature and injected CO2 concentration conforms to the operating envelope.
Compliance with Carbon Credit Methodology	Adhere to Clean Energy Regulator requirements for ACCUs.	Achieved	Santos has a robust method for quantifying and reporting emissions, including fugitive emissions, which adheres to the requirements of the National Greenhouse and Energy Reporting (NGER) Scheme. This established process will form the basis of the methodology for Santos measuring, generating and reporting ACCUs. The M&V plan meets the requirements of the CER guidelines with focus on safe long-term containment of stored CO2. It sets out all measurement and surveillance activities necessary to ensure geological storage. Other emissions caused by project activity and calculations of net abatement are not part of the M&V plan.

Obligation	Measurement Criteria	Compliance Status	Performance
Groundwater monitoring for CO2 migration	Conduct baseline and periodic groundwater sampling.	Achieved	Based on geochemical evaluation and statistical assessment completed in accordance with Appendix B of the M&V plan, the environmental thresholds developed are sufficiently sensitive to detect a material change to groundwater chemistry if a release of CO2 into groundwater at the monitored locations occurs. Refer to the *Baseline Groundwater Quality Report, Moomba Carbon Capture and Storage Project (June 2025)*. Groundwater monitoring is scheduled to be undertaken in Q3 2025 to fulfill the annual Shallow Aquifer monitoring obligation and will be reported in the next M&V Plan annual report.
Environmental response plan activation	Implement remedial actions upon detecting containment loss indicators.	Not triggered	Santos maintains the Emergency response Plan – Moomba Plant (0005-210-ERP-0001) for its Moomba Plant and CCS activities. No containment loss indicators requiring remedial actions were triggered during the reporting period.