

CTSCo's appraisal well at its EPQ10 CO<sub>2</sub> storage location in the southern part of the Surat Basin

## BACKGROUND

Glencore has been a long term supporter of Carbon Capture Use and Storage (CCUS) technology as a means to reduce emissions from fossil fuels and also service the hydrogen economy.

Glencore's CTSCo Project is aiming to demonstrate CCUS on an industrial scale in Queensland. It is Australia's most advanced onshore CCUS project and is focused on:

- Capturing CO<sub>2</sub> from a coal-fired power station, and
- Permanently storing the CO<sub>2</sub> deep underground in the southern Surat Basin, about 230 kilometres west of Toowoomba.



The Millmerran Power Station, site of the proposed CO<sub>2</sub> capture plant, located about 100 kilometres south-west of Toowoomba

## KEY ISSUES

CTSCo holds one of the largest land-based CCUS tenements (EPQ10) in Australia and the project is intended to be a material step toward an integrated CCUS hub in the Surat Basin, with emissions from multiple coal generators and other industrial sources – including gas, hydrogen, cement and chemicals – being captured and safely stored.

- CTSCo has the potential store significant volumes of CO<sub>2</sub> in the region, which can: deliver the critical infrastructure to reduce and remove existing and future sources of industrial emissions
- Enable the three youngest coal power stations in Australia (Kogan Creek, Millmerran and Tarong B) to continue operating past 2050
- Improve energy security for the National Electricity Market
- Maintain and grow jobs in regional Queensland
- Enable future industries including hydrogen production
- Contribute to national and state governments' climate and emission reduction goals.

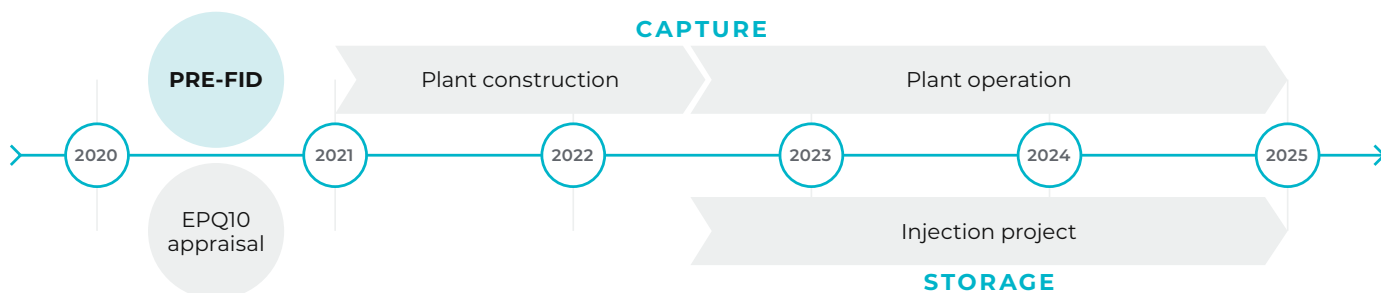
### PROJECT STATUS – CAPTURE

CTSCo has continued its partnership with the China Huaneng Group (CHG), shareholders in the Millmerran Power Station, on the development of CO<sub>2</sub> capture technology for existing power stations.

We have completed Feasibility and Front End Engineering Design (FEED) studies towards the undertaking of an

integrated post-combustion capture (PCC) plant at the Millmerran power station in Queensland.

The plant would capture 110,000 tonnes of CO<sub>2</sub> per year and transport this some 100 kilometres to our tenement for permanent underground storage.



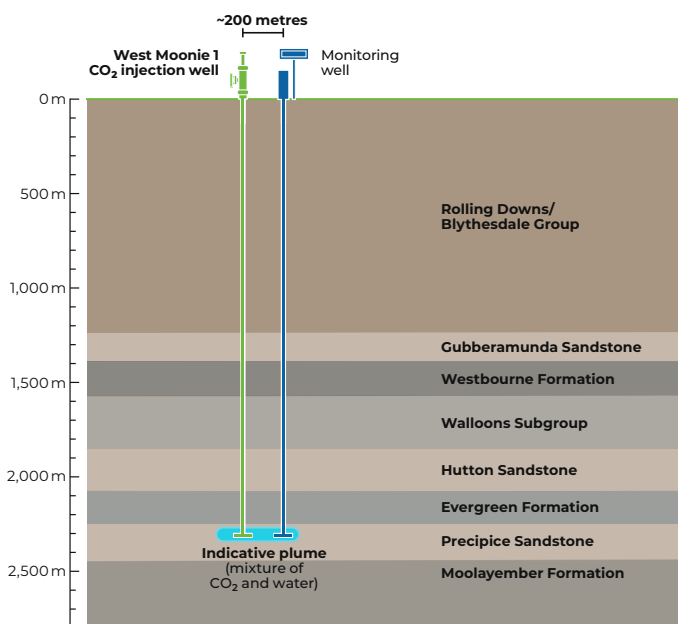
### PROJECT STATUS – STORAGE

The storage component of the CTSCo Project provides a potential pathway to an industrial scale storage hub in Queensland capable of servicing multiple industrial users including coal, natural gas and hydrogen.

In December 2019, the Queensland Government granted CTSCo a greenhouse gas (GHG) exploration permit – at EPQ10 – in the southern part of the Surat Basin. This permit enables CTSCo to thoroughly assess the viability of safely and sustainably storing CO<sub>2</sub> deep underground.

Since that time, we have conducted a number of research and development activities within the tenement and this month, we successfully drilled an appraisal well at EPQ10 to a depth of 2.7 kilometres. This well has now been cased and suspended as a future injection well and forms the first piece of storage infrastructure at this high potential CO<sub>2</sub> sequestration location.

We will shortly drill a second appraisal well following by a testing program and seismic survey. This work program will not only confirm the location for the demonstration storage project but will provide the foundation data and infrastructure for future industrial scale sequestration at the EPQ10 site.



**Suitable geology:** Subsurface cross section showing the Precipice Sandstone Aquifer, the Evergreen Formation Top Seal. The proposed Injection Well and indicative CO<sub>2</sub> plume are also shown, along with the proposed monitoring well

### FINAL INVESTMENT DECISION

With funding support from LET Australia (formerly COAL21) and Australian National Low Emissions Coal (ANLEC) R&D Limited, Glencore expects to make a Final Investment Decision on the A\$230 million CTSCo Project in 2021.