



Coal Seam Gas Groundwater Monitoring Bore Drilling Project: Gloucester and Narrabri

June 2014

Increasing the spatial coverage of NSW Office of Water's groundwater monitoring bore network

The NSW Office of Water is responsible for the management of groundwater resources in NSW, with over 3,000 monitoring bores already in operation throughout the state to monitor the level and quality of groundwater.

An important natural resource in NSW, groundwater is a source of drinking water for many rural towns and is used for industrial needs such as mining. It also supports the domestic and stock requirements of farms or remote households and communities, as well as being used for irrigation.

Of all water use in NSW, 11 per cent is sourced from groundwater. Groundwater level data from over 300 of the Office of Water's monitoring bore sites is available via its real time data site – www.water.nsw.gov.au/Realtime-reports/groundwater

What's happening and when?

The Office of Water is increasing the spatial coverage of our monitoring bore network through the drilling and construction of new groundwater bores in key areas of NSW between September 2014 and January 2016. The two areas of construction are Narrabri and Gloucester. The drilling program aims to construct monitoring bores at depths ranging between 100 and 500 metres. To accomplish the start of drilling by September, the Office of Water is starting the search for suitable sites to drill and construct monitoring bores. The site selection process includes:

- an initial search for monitoring sites based on a number of factors including land accessibility
- an assessment of the potential environmental impacts associated with the monitoring well construction at the sites
- a final selection of sites that will cause minimal impacts to the environment and are suitability located for monitoring potential impacts from Coal Seam Gas (CSG) exploration and production activities.

The initial site selection step includes communicating with local councils, the CSG proponents, and in some cases private land owners.

Why is this being carried out?

NSW is currently experiencing growth in mining projects, in particular coal seam gas developments. It is therefore important to gather baseline information on groundwater levels and water quality throughout NSW where CSG development is proposed.

Increasing the spatial coverage of the Office of Water's groundwater monitoring bore network in the vicinity of some of NSW's proposed CSG developments will improve our understanding of the hydrogeologic environment. Should CSG production commence in these areas, data collected from these bores will allow the Office of Water, independent of the CSG proponents monitoring data, to assess the CSG impacts against the Aquifer Interference Policy. The Aquifer Interference Policy details how the Office of Water assesses potential impacts on water resources from CSG production. Additionally, over the long-term, information from monitoring bores can be used to more effectively manage the state's groundwater resources.

More information

www.water.nsw.gov.au

© State of New South Wales through the Department of Trade and Investment, Regional Infrastructure and Services 2014. You may copy, distribute and otherwise freely deal with this publication for any purpose, provided that you attribute the NSW Department of Primary Industries as the owner.

Disclaimer: The information contained in this publication is based on knowledge and understanding at the time of writing (June 2014). However, because of advances in knowledge, users are reminded of the need to ensure that information upon which they rely is up to date and to check currency of the information with the appropriate officer of the Department of Primary Industries or the user's independent adviser.

Published by the Department of Primary Industries, a division of NSW Department of Trade and Investment, Regional Infrastructure and Services.

Jobtrack 12977