

# GAS WATCH 235.

## Fresh water aquifer contaminated by Coal Seam Gas project.

### A second CSG contamination in the Pilliga – and they haven't even started to produce gas yet.

The CSG miners have not attempted to address the problem of disposal of contaminated water from the coal seams.

### AGL Energy is pumping their salt water onto pasture in Gloucester in a trial!?

*“The disposal of co-produced water has proved to be the biggest environmental problem associated with exploitation of coal seam methane fields in the USA, although the quantity and quality of the water can vary enormously between coal basins. Stricter environmental regulations are making direct disposal options increasingly difficult.”* (Clarke L.B., 1996. Environmental aspects of coal seam methane extraction, with emphasis on water treatment and disposal; Transactions Institute of Mining & Metallurgy: A105-A113: May-August 1996)

1. 2014

**Santos fined \$1,500 by the EPA for contamination of a fresh water aquifer with lead, aluminium, arsenic, barium, boron, nickel and uranium, with the uranium levels of 335 micrograms per litre, being 20 times the safe drinking water guideline of 17 micograms per litre. (This fine would probably be less than the weekly morning tea costs at the Santos offices.)**

2. 1998-2001

***“Hazards of coal bed methane exploration in the Bohena area of the Pilliga East State Forest near Narrabri include the bulldozing of the critical habitat of rare fauna, the collapse of the dam wall after a thunderstorm and most critically, the locally catastrophic underground seepage of caustic groundwater into the surrounding forest.”*** (Atkinson, C.M., 2002. Environmental Hazards of Oil and Gas Exploration).

There was extensive leakage from the dam holding the water pumped from underground which resulted in the spread of sodic/saline liquid through the subsoil and shallow aquifers.

By November, 2001 the pollution front could be traced eastwards over a distance of 250m and a maximum width of 100 metres. See attached plan. Trees began to die up to a kilometre away. Atkinson reports that the investigations into the incidents *“all point to a chronic case of sodic soil poisoning, worse than cases described from methane gas fields in the Powder River Basin”*.

3. 2011

**AGL Energy issued with a “formal warning” by the Government following a blowout of a methane well near Campbelltown caused by incorrect operation of the well. The actual content of the geyser of contaminated water and chemicals shooting into the air has not been revealed.**

4. **2010**  
**AGL Energy** given remediation order to restore pasture after deliberately pumping a reported 300,000 litres of salty contaminated water onto pasture (110,000 admitted by AGL), killing the pasture, contaminating the soil, and in breach of their licence conditions (NSW Ombudsman ref: C/2010/7463)
5. **2011**  
**AGL Energy** fails *“to comply with the Licence conditions in both of its Petroleum Exploration Licences affecting the Hunter Valley Wine Country”* – PEL 4 and PEL 267 (Report on Audit of Coal and Petroleum Exploration Licences in NSW - Phase 2.)
6. **2004**  
 Sydney Gas, now **AGL Energy**, caused a *“Pollution incident”* at its Camden gas field and was issued with a *“Clean up notice”* following the escape of fracking water containing *“polycyclic aromatic hydrocarbon species high in pH and salt.”* (Clean up notice no 1035293).
7. **2004**  
*“Within a fortnight of the beginning of gas testing, a coal bed methane well north of Newcastle NSW (Stratford) was shut down as several boreholes up to 300 metres away began to blow off methane gas. This was the first reported case of a serious migration of methane gas from coal bed methane operations in New South Wales.”* (Drill hole LMG-03)

And these are just the pollution incidents which are readily available to the public.

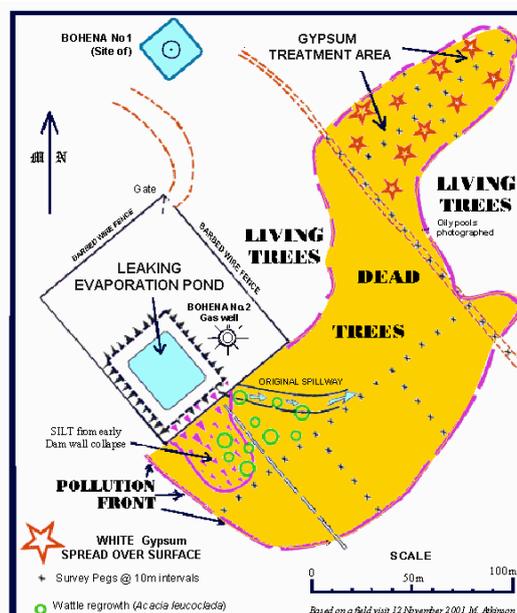
**AGL Energy** continues to threaten to drill for coal seam methane in the Hunter Valley vineyards despite the unanimous opposition of Local Government; despite the vociferous opposition of the community; despite the protections put in place by the NSW Government; despite giving evidence before the Senate Enquiry that if landowners would not allow entry onto their property *“there is a lot of country out there that can be explored and we would move on.”* (Mike Moraza – Manager of methane gas for AGL).

**AGL** – it’s time to move on. You clearly cannot now, and will not be able in the future, to guarantee the safety of the fresh water aquifers upon which the vineyards rely to maintain their international reputation.



[www.huntervalleyprotectionalliance.com](http://www.huntervalleyprotectionalliance.com)

8<sup>th</sup> March, 2014. Contact: Graeme Gibson 0418 239359.



**Figure 4**  
**SUBSOIL POLLUTION at BOHENA No 2 WELL-SITE,**  
**PILLIGA, NSW**

