

### The implementation of the recommendations contained in the NSW Chief Scientist's Independent Review of Coal Seam Gas Activities in New South Wales

Question	Answer
<p><b>Transcript Page 26 / PDF p.3</b></p> <p><b>Mr JUSTIN FIELD:</b> Thank you, that clarifies that.</p> <p><b>The Hon. ADAM SEARLE:</b> Mr Wright, I do not know if you are the appropriate person or whether anyone here can answer this. Earlier today we heard from Santos and they were asked a question about whether Santos has actively sought, in its application for the Narrabri project, conditions of consent that would legally bind it to only sell any gas product into the New South Wales market and ban it from using hydraulic fracturing. Can you either now or on notice inform the Committee about whether it has actively sought either or both of those conditions?</p> <p><b>Mr WRIGHT:</b> I am not in a position to inform the Committee today but I will take it on notice. It will be a matter for our planning and assessment division.</p>	<p>For the Narrabri Gas Project, Santos is not seeking approval to use hydraulic fracturing to extract gas. So, even if the project is approved it would not be able to use hydraulic fracturing. Nevertheless, to address ongoing community concerns about the potential use of hydraulic fracturing, Santos has indicated that it would be happy to accept a condition of consent prohibiting the use of hydraulic fracturing for the project.</p> <p>Santos has committed to supplying all of the gas from the Narrabri Gas Project to the domestic market, and indicated that it would accept a condition of consent or some other means to legally bind it to this commitment.</p>

Question	Answer
<p><b>Transcript Page 31 / PDF p.8</b></p> <p><b>The CHAIR:</b> You mentioned that there is a value placed on the quality of data that is in this portal. Who decides the quality value placed on it and are there parameters about how that is decided? Could you provide that detail?</p> <p><b>Ms HAWYES:</b> I can answer some of that here and provide more information on notice as to the actual rules. Each data set has a quality statement attached to it that tells whoever wants to use it what they are really working with and how confident they can be in those data sets. I can answer to that here and give you some more detail about the specific rules.</p> <p><b>The CHAIR:</b> Can you give us some examples of those value statements as to is it excellent, good, rubbish—.</p>	<p>Every dataset in SEED includes a Data Quality Statement. ‘Data quality’ is determined by whether the data is suitable for its original intended use. It helps a user understand how a particular dataset could be used, and whether the dataset can be compared with other, similar datasets.</p> <p>The Data Quality statement is prepared by the data custodian (provider of the dataset), using a reporting questionnaire that has been developed in accordance with the NSW Government Standard for Data Quality Reporting.</p> <p>Each record on the SEED portal contains a Data Quality Statement and a fuller explanation is available <a href="https://www.seed.nsw.gov.au/need-help/understanding-data/about-data-quality-statement">https://www.seed.nsw.gov.au/need-help/understanding-data/about-data-quality-statement</a>.</p> <p>An example of a Data Quality Statement can be seen at <a href="https://datasets.seed.nsw.gov.au/dataset/coal-seam-gas-borehole">https://datasets.seed.nsw.gov.au/dataset/coal-seam-gas-borehole</a>.</p>

Question	Answer																											
<p><b>Transcript Page 32 / PDF p.9</b></p> <p><b>The Hon. ADAM SEARLE:</b> I have two last questions on this topic. I am happy for you to take these on notice. Can you tell us how much the Government has spent on developing the capability of the SEED Portal to date and how much is envisaged being spent until the end point of having it as functional as you intend to have it functional?</p> <p><b>Ms HAWYES:</b> So there is a \$5.5 million capital investment and since that time there has been almost \$9.5 million in total in developing the system. What I can do is provide you with a breakdown of yearly projected costs?</p> <p><b>The Hon. ADAM SEARLE:</b> I am happy for you to give that on notice.</p> <p><b>Ms HAWYES: On notice?</b></p> <p><b>The Hon. ADAM SEARLE:</b> That is fine. When do you think you will attend to including the proponent data?</p>	<p>To date the NSW Government has invested almost \$9.5 million in developing and implementing the system. This <b>includes the initial \$5.5 million</b> capital investment plus the actual expenditure since the program was transferred to the former Office of Environment and Heritage in 2016.</p> <p><b>Annual forecasted cost of running SEED and making it fully functional:</b></p> <ul style="list-style-type: none"> <li>SEED financial year costs and larger cyclical project forward estimates</li> </ul> <table border="1" data-bbox="674 663 2022 1027"> <thead> <tr> <th>2019/20</th> <th>2020/21</th> <th>2021/22</th> <th>2022/23</th> <th>2023/24</th> <th>2024/25</th> <th>2025/26</th> <th>2026/27</th> <th>2027/28</th> </tr> </thead> <tbody> <tr> <td>Operating costs</td> <td>Operating costs Pre platform upgrade work</td> <td>Operating costs Platform upgrade</td> <td>Operating costs</td> <td>Operating costs</td> <td>Operating costs</td> <td>Operating costs Pre platform upgrade work</td> <td>Operating costs Platform upgrade</td> <td>Operating costs</td> </tr> <tr> <td>\$1,949,200</td> <td>\$2,123,000</td> <td>\$2,376,000</td> <td>\$1,921,000</td> <td>\$1,949,000</td> <td>\$1,908,000</td> <td>\$2,168,000</td> <td>\$2,561,000</td> <td>\$2,081,000</td> </tr> </tbody> </table> <p>The reason for differences in yearly forecasted amounts is to take into consideration work on Platform-as-a-Service modernisation and work to upgrade Software-as-a-Service services, which are cyclical in nature.]</p>	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28	Operating costs	Operating costs Pre platform upgrade work	Operating costs Platform upgrade	Operating costs	Operating costs	Operating costs	Operating costs Pre platform upgrade work	Operating costs Platform upgrade	Operating costs	\$1,949,200	\$2,123,000	\$2,376,000	\$1,921,000	\$1,949,000	\$1,908,000	\$2,168,000	\$2,561,000	\$2,081,000
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Question	Answer
<p><b>Transcript Page 32 / PDF p.9</b></p> <p><b>The Hon. ADAM SEARLE:</b> Last question on this topic; is it envisaged that a decision would be made to house Santos data about Narrabri on the portal before the assessment of the proposal by the Information and Privacy Commission [IPC] is conducted?</p> <p><b>Ms HAWES:</b> No. At the moment that is outside my remit but the portal is there and has the capability to house any kind of data we would like.</p> <p><b>The Hon. ADAM SEARLE:</b> To make sure I have understood, I am happy for that question to go on notice to whoever in the department should answer that question about whether there is any intention to house the Santos data accessible to the community through the portal.</p>	<p>It is the intention to make data from the mining industry accessible via the SEED portal regardless of the project. SEED harnesses the power of a distributed data model in accordance with best practice data management principles i.e. using standards such as web services. The portal approach ensures that users have access to the most up to date and accurate data as held by the providing agency, rather than a copy of the data that could be out of date or redundant if housed locally. The focus is on discovery and access to the data as well as visualisation.</p>

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Mr RUMING: With the Namoi Catchment Risk Assessment Tool [NCRAT] that was developed back in about 2010, it had outputs from a water model that was developed as part of the original Namoi Catchment Management Authority at the time, set that up. Subsequent to that with the bioregional assessment work that was done by the CSIRO, they have essentially had a look at the region again and what the impacts could be on coalmining development scenarios with the gas wells on a regional scale. Those results of those assessments are now available and they used update datasets. The water model that was used for the bioregional assessment was one they developed for that because the field one they said was not as good, it was not really fit for purpose for what they wanted to do, we have got better software.

Ms ABIGAIL BOYD: The one that was developed in 2010?

Mr RUMING: Yes. That water model was not used by the bioregional assessment. They actually developed a new water model.

Ms ABIGAIL BOYD: What year did they develop it?

Mr RUMING: I think it was in—I would have to take it on notice. I think it was in 2016-17. It was part of the bioregional assessment work once they got going. With

This Namoi region bioregional assessment helps in understanding how coal seam gas and coal mining development could affect water resources and water-dependent assets in the Namoi subregion, which is part of the Northern Inland Catchments bioregion. It identifies where potential impacts could occur, as well as the areas that are unlikely to be affected.

The assessment also examined the cumulative impacts for surface water and groundwater across the Namoi river basin.

Modelling was undertaken to complete the assessments as set out in the table below.

<b>Conceptual model</b>	
Modelling completed	Sep-16
Report released	Feb-18
<b>Water balance</b>	
Modelling completed	Dec-16
Report released	Dec-17
<b>Surface water modelling</b>	
Modelling completed	Nov-16
Report released	Feb-18
<b>Groundwater modelling</b>	
Modelling completed	Nov-16
Report released	Feb-18
<b>Final report</b>	<b>Dec-18</b>

## Response to questions on notice

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Question	Answer
<p>the assessments themselves, they had in the order of about 100 people working on it, the project, a lot of money. So then they were able to assess the potential cumulative impacts, groundwater, groundwater dependant ecosystems and things like that with updated tools, updated models and all those results now available on the hour.</p>	

## Transcript Page 37 / PDF p.14

**Mr JUSTIN FIELD:** If I could follow on from the last line of questioning. Has the Government done any independent analysis or done any analysis themselves modelling on how much the 70 petajoules of gas delivered—either coming from Narrabri or being imported—how much that would reduce electricity or gas prices in New South Wales?

**Ms HAWYES:** I will need to take that on notice in terms of any specific work. As I said before the memorandum of understanding [MOU] itself is a really broad instrument to invest in a range of new technologies and emissions reduction initiatives. I understand the press coverage in terms of the gas component but it is a much broader instrument than that.

**Mr JUSTIN FIELD:** I certainly understand that. The suggestion came not so much from the Premier and the New South Wales energy Minister, more from the Prime Minister that this would reduce energy prices and I was just wondering what that was based on. I assume given that it was New South Wales delivering into the east coast gas market that work had to come from assumptions made in New South Wales. So is there any analysis that has been done by the department or where was that figure arrived at?

**Ms HAWYES:** Can I take that on notice?

The Department of Planning, Industry and Environment has not modelled electricity and gas price impacts of increasing NSW gas supply by 70 petajoules a year.

However, the NSW Government is undertaking a detailed assessment of the potential economic impacts of the Narrabri Gas Project.

To date, this assessment has included seeking advice from an independent economic expert and a detailed review of the material produced by:

- The Australian Energy Market Operator (AEMO), which is responsible for operating Australia's gas market: <https://aemo.com.au/energy-systems/gas>
- ACCC, which is currently undertaking a wide-ranging inquiry into the supply of and demand for wholesale gas in Australia: <https://www.accc.gov.au/publications/serial-publications/gas-inquiry-2017-2025>

AEMO's 2019 Gas Statement of Opportunities forecasts potential gas supply gaps in southern states including NSW from 2024 unless there is additional investment in gas supply infrastructure.

**Mr JUSTIN FIELD:** That would be great. Thank you. Back down into the weeds. You may not have heard but there were some questions asked of the community groups that were here and also of Santos this morning about the way that the Community Consultative Committee [CCC] for the Narrabri Gas Project was operating. There seems to be some friction there between People for the Plains and Santos. One of the areas of concern seemed to be around no longer having an independent Secretariat for the CCC. It is Santos that is operating as the Secretariat and I think the chair has changed as well recently. I was just wondering why the Government no longer provides the Secretariat for the CCC? It may not have been the EPA before. I think it might have been resources and geoscience who provided it before.

**Ms DWYER:** I am happy to take it on notice as to why it has changed but my understanding is that the committee actually was made an offer and accepted that Santos be the Secretariat.

**Mr JUSTIN FIELD:** Right.

**Ms DWYER:** That is my understanding of how that decision was made by the committee.

**Mr JUSTIN FIELD:** Is there anyone on the panel that has understanding of how the CCCs historically operated or how it has changed?

**Mr ISAACS:** I was there at the time but I do not recall the specifics around that. I

The purpose of a Community Consultative Committee is to provide a forum for discussion between a proponent and representatives of the community, stakeholder groups and the local council on issues directly relating to a specific State significant project. Guidelines are available online: <https://www.planning.nsw.gov.au/Assess-and-Regulate/Development-Assessment/Community-Consultative-Committees>

Santos has provided the Narrabri Gas Project Community Consultative Committee's (NGPCCC) secretariat services since March 2016. Prior to this, the then Division of Resources and Energy provided the secretariat services for the NGPCCC. The Department of Planning, Industry and Environment understands that the then Division of Resources and Energy requested the change. The Department has been unable to locate a formal reason for the request in its records. However, it considers that it is appropriate for Santos to bear the costs of providing those functions. The Department also understands that the then NGPCCC members voted to accept the change in secretariat at that time.

The current chair of the NGPCCC is Mr Craig Jenkins, Acting Director, New England & North West, Regional NSW in the Department of Planning, Industry and Environment's Regions, Industry, Agriculture and Resources Group. He took over from the then Land and Water Commissioner, Mr Jock Laurie, in November 2019. Mr Laurie had chaired the NGPCCC since 2014, when the government formalised the group. Prior to then, Santos had convened an informal community committee for the project to facilitate community consultation.

The Environment Protection Authority and the relevant parts of the Department of Planning, Industry and Environment regularly send attendees to meetings to provide information about current activities and answer questions.

remember the Secretariat changing but I do not remember the reasons for it as Ms Dwyer has outlined. Perhaps I can take that on notice.

**Mr JUSTIN FIELD:** That would be great. Perhaps if you could just give the Committee an idea about the role that the Government plays in CCCs. Often they are set up and are not necessarily directed by Government but we seem to fit in as part of the end of the planning process to ensure there is communication between the community and the proponents. So what is the current role of the Government with regards to the CCC from the Narrabri Gas Project?

**Mr ISAACS:** I think with the Narrabri CCC it is probably a little bit different from a lot of the other CCCs because it is not part of an approved project. So it is still in the exploration phase. There was a group in Gloucester as well with the Australian Gas Light [AGL] project.

**Mr JUSTIN FIELD:** But the NSW Land and Water Commissioner was previously chairing it until he got sacked from that role. Is it a Government person that is currently chairing it?

**Mr ISAACS:** I do not have current information.

**Mr WRIGHT:** I think we will have to take that on notice. I am not sure of the answer to that question.

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**Ms ABIGAIL BOYD:** I am very curious about what those conditions are and I ask you this because I have seen a number of quite interesting security bonds that have been given up by mining companies. For example one that was a bank guarantee that was contingent upon the approval of the Indian Government being given. Who knows whether it was ever given? Some others I have seen have exceptions that basically provide prior or first ranking security on the assets of the company. But then so do its parent company, its sister companies and a whole bunch of others so the value of that guarantee is really dependent on the circumstances. Do you have any more details around the kind of guarantee that that is and also whether anybody has paid in actual cash and what percentage of the current security deposits for the gas companies is cash?

**Mr KEON:** I can probably assist with that from the Mining Act side of things because it is harmonised legislation. In terms of the bank guarantees they are not conditional in the sense that somebody else has first priority over the Government. The Government has priority on those. They have to come from a specified banking institution so it is not just any bank from any country. It certainly has to be recognised and on an approved schedule. They are not time-limited in any other way

As at 10 February 2020 the Department holds \$69,091,000 in cash and bank guarantees to cover the full rehabilitation costs required on all petroleum titles. A breakdown of the form by titleholder follows:

Titleholder	Cash (\$)	Certificate (\$)	Total (\$)
AGL Upstream Investments Pty Limited		29,269,000	29,269,000
Australian Coalbed Methane Pty Limited		960,000	960,000
Comet Ridge Gunnedah Pty Ltd		105,000	105,000
Comet Ridge Ltd		95,000	95,000
Hunter Gas Pty Ltd	20,000	171,000	191,000
Santos NSW (Hillgrove) Pty Ltd		1,444,000	1,444,000
Santos NSW Pty Ltd		36,677,000	36,677,000
Santos QNT Pty.Ltd.	165,000	185,000	350,000
<b>Grand Total</b>	<b>185,000</b>	<b>68,906,000</b>	<b>69,091,000</b>

Question	Answer
<p>so we can always has funds at any point should Government need to step in and rehabilitate. So in terms of actual cash versus bank guarantees that is something that we could take on notice and come back to you.</p> <p><b>Ms ABIGAIL BOYD:</b> That would be useful.</p> <p><b>Mr KEON:</b> Just to specify. Is that for all rehabilitation or just in relation to petroleum?</p> <p><b>Ms ABIGAIL BOYD:</b> Just in relation to petroleum. In answer 22 we talk about the sum of rehabilitation bonds held on behalf of AGL and Santos. That Santos figure we heard from Santos earlier is all bank guarantees and not cash. In answer 21 you talk about that some of it is also in cash so it would be useful to know if that is the AGL component or how much of that is actually—.</p> <p><b>Mr KEON:</b> Let me take that on notice.</p> <p><b>Ms ABIGAIL BOYD:</b> Thank you.</p>	

## Transcript Page 39-40 / PDF p.-17

**Mr JUSTIN FIELD:** I had another question in relation to an answer to a question on notice, and it did relate to the expert standing advisory body. We have been through it a bit and I do not want to get into the details; I think there is a dispute between the Committee and the Government about the expert scientific committee and the expert standing advisory body and the different roles and functions and how that works. One of the questions related to how the independent expert scientific committee [IESC] was advised that the New South Wales Government was essentially going to use it as its standing advisory body option. I asked a question about when it was informed—if, indeed, it was informed—and the answer that came back stated:

Based on searches conducted in the time available, the Department of Planning, Industry and Environment is unable to confirm if the IESC was consulted before this decision or how the IESC was advised of the decision.

I would have assumed you could just ask them if you were using this body as the advisory body for CSG in New South Wales. I want a little bit more information about whether you need more time to find out how the consultation happened or how that request was made.

**Mr WRIGHT:** I think in the response we indicated that given the time frame to respond to that question on notice—

The Independent Expert Scientific Committee for Coal Seam Gas and Large Coal Mining Development (IESC) is a statutory committee that carries out a range of functions under Commonwealth legislation.

This includes:

- Completing bioregional assessments of key regions where coal and coal seam gas development may occur to strengthen the science behind strategic or project-based decisions: <https://www.bioregionalassessments.gov.au/>;
- Undertaking research to improve the understanding of the impacts of coal or coal seam gas development on water resources: <http://www.environment.gov.au/node/38805>;
- Preparing information guidelines on how certain water-related matters should be assessed: <http://www.iesc.environment.gov.au/information-guidelines> ; and
- Providing strategic advice to Commonwealth and State regulators on specific development proposals: <http://www.iesc.environment.gov.au/committee-advice>.

The IESC will continue to carry out these functions; and the NSW Government will continue to consider this research and advice in its decision-making.

The Department of Planning, Industry & Environment routinely draws on advice from internal experts within government and, where warranted, external specialists to inform its work.

For instance, in assessing the merits of the Narrabri Gas Project, the Department has:

- Obtained expert advice from within the NSW Government
- Met with key officials and experts within the Queensland government who are responsible for assessing and regulating the impacts of the coal seam gas industry in Queensland
- Sought expert advice from the IESC and considered the research and guidance it has developed on the potential impacts of coal seam gas development
- Established a Land and Water Panel of independent external experts, which is chaired by Professor Peter Cook of the University of Melbourne, and includes some of the experts that provided advice to the Chief Scientist and Engineer during the coal seam gas review
- Sought advice from other independent experts on the economic, safety and hazards, cultural heritage and social impacts of the project

**Mr JUSTIN FIELD:** That is what I am asking.

**Mr WRIGHT:** We undertook some internal searches and we were not able to discover any information that indicated if and when that particular body had been advised. If the Committee was to give us some more time, we could make some further inquiries.

**Mr JUSTIN FIELD:** I would appreciate it if you could. It led me to have another question in my mind: Who is the main point of contact between the New South Wales Government and the independent expert scientific committee? I understand there are relationships with planning processes, but obviously this is with regards to its role as an advisory body of sorts. Who is the person or the group within the New South Wales Government that deals with the IESC?

**Mr WRIGHT:** My understanding is the connection is primarily with the planning and assessment division of the department.

**Mr JUSTIN FIELD:** This does go to that whole point that this is not being used in its role as a standing advisory body, as envisaged in the Chief Scientist's recommendations. That is its role in providing input into the planning process, which is quite distinct. But that is really the only relationship that the New South Wales

- Considered all the relevant scientific research that has been prepared under the GISERA program: <https://gisera.csiro.au/>
- Considered the expert advice provide in many of the public submissions on the project.

This is part of ensuring that the project is subject to rigorous assessment, and that the final decision on the project is informed by the best available science.

The Department considers this approach is consistent with the intent of the Chief Scientist and Engineer's recommendation.

Question	Answer
<p>Government has with the IESC—is that the case?</p> <p><b>Mr ISAACS:</b> I might just clarify that the independent expert scientific committee undertakes—or certainly has in the past undertaken—a number of different types of work and bodies of work. They have had different relationships with different parts of the New South Wales Government for those different pieces of work. So, for example, the bioregional assessment program—they were working very closely with, for example, the water people in government, as well as the EPA and a number of other groups. So they do work very closely depending on the different type of work, so they are not just there for the assessment component.</p> <p><b>Mr JUSTIN FIELD:</b> Fair enough. I am happy if you could, Mr Wright, take it on notice. If the Government made a deliberate decision to rely on them to fulfil that role, I am assuming they were advised. If you do happen across it in the next few days, before we come to report it, I would appreciate you taking that on notice.</p>	

Question	Answer
<p><b>Transcript Page 40 / PDF p.-17</b></p> <p><b>Ms ABIGAIL BOYD:</b> Are you aware of any reports being made regarding negative human health impacts to the EPA?</p> <p><b>Ms DWYER:</b> Not off the top of my head, but we could take it on notice.</p> <p><b>Ms ABIGAIL BOYD:</b> That would be really good, and also what were the outcomes of those investigations. That would be very useful.</p>	<p>Since becoming the lead regulator for gas activities in NSW in 2015 the EPA has received two reports alleging potential impacts on human health from CSG activities.</p> <p>The EPA investigated both matters and has not identified any link between CSG activities and the alleged impacts on human health.</p>

## Response to questions on notice

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Witness	Transcript corrections?
<b>JAMES MCTAVISH</b> , NSW Regional Town Water Supply Coordinator	Water
<b>MELANIE HAWYES</b> , Deputy Secretary, Policy Strategy and Science, Department of Planning, Industry and Environment	EES
<b>KEVIN RUMING</b> , Director, Strategic Resource Assessment and Advice, Division of Resources and Geoscience	RIAR
<b>MICHAEL WRIGHT</b> , Deputy Secretary, Resource and Geoscience, Department of Planning, Industry and Environment	RIAR
<b>ANTHONY KEON</b> , Executive Director, NSW Resources Regulator	EES
<b>MITCHELL ISAACS</b> , Director, Office of the Deputy Secretary and Strategic Relations (Water)	WATER
<b>RICHARD BEAN</b> , Interim Chief Executive Officer, Environment Protection Authority	EES
<b>CARMEN DWYER</b> , Executive Director, Regional Operations, Environment Protection Authority	EES
<b>ANDREW COWAN</b> , Program Manager Environment Protection Authority	EES