

GISERA | Gas Industry Social and Environmental Research Alliance

Minutes of the NSW Research Advisory Committee Meeting No. 5 held in Sydney on Monday, 4 April 2022

OPENING

The meeting of the CSIRO GISERA NSW Research Advisory Committee (RAC) was called to order at 9.02 am (AEST) on Monday, 4 April 2022.

PRESENT

Damian Barrett: GISERA Director (CSIRO)

Ken Flower: General Manager (Caputar Motors) and Chief Flight Instructor (Namoi Aviation) Alison Sheridan: Emeritus Professor, UNE Business School (University of New England) Jack Warnock: Lower Namoi Cotton Growers' Association and Managing Director (Warnock Agronomics P/L)

David Mitchell: Leader Water Policy and Planning, DPI Agriculture (NSW DPI) – for Deborah Hailstones

Other participants:

Kaydy Pinetown: GISERA NSW State Leader (CSIRO) Jizelle Khoury: GISERA Executive Officer (CSIRO)

Apologies:

Deborah Hailstones: Acting / Group Director Science, Chief Scientist Unit, (NSW DPI)

1. WELCOME, APOLOGIES AND ADOPTION OF AGENDA

The GISERA Director welcomed all members to the meeting. The agenda was unanimously approved as distributed.

There was a discussion on communication needs and opportunities associated with natural gas development in the Gunnedah Basin. This would be further explored out of session with the GISERA Communications and Stakeholder Engagement Leader.

ITEMS FOR DISCUSSION

2. ACTIONS FROM PREVIOUS MEETING

Action 5 (18-06-19 Item 3) has been closed.

3A. PROJECT PROPOSAL

Groundwater modelling and predictive analysis to inform CSG impact assessment, monitoring and management

The GISERA Director provided a summary of the project proposal.

Key points raised:

- Modelling in this project is in addition to what Santos must do as part of their consent requirements to meet the phase 1 and 2 development conditions. CSIRO is cognisant of their work, but this project's work is completely independent of that. It is not delivering to the process of Santos achieving their consent conditions. The proposal needs to be reframed so that the public good aspect is clearly stated up front. It must clarify that this work is independent and does not feed into the response to IPC consent conditions.
- Santos will be able to refer to the work that GISERA does in this project. They have agreed with the NSW Government to ongoing continual improvement of their groundwater model.
- More information is required on the community interest and public good that can be generated from this project i.e., a better understanding of the alluvial aquifers and how to better manage water.
- There is concern around the GAB. More than 800 bores are uncapped. The project should deliver a relative impact statement (provide information in context) on the GAB.
- Greater focus required on what this project can deliver.
- The proposal should clarify who will maintain the interactive dashboard/app developed and for what duration.
- In the project summary, the proposal refers to field and remote sensing observations, but this is not explained in the methodology. Proposal alludes to other actions but does not include those in the methods.
- The Communications Plan should include how the proponent will engage with various groups throughout the project and not just as results are completed (e.g., Chambers of Commerce and Shire Councils (in Narrabri and Gunnedah regions) and NGP Water Technical Advisory Group). Should include what proponent wants to achieve as part of the Communications Plan. 'Briefing' should not be listed as an objective. It was also noted that positioning statement(s) at the end of the project would be good to have.

- The Impact Pathway outputs to be more definitive and the outcomes more specific as they are too broad.
- The Impact Pathway runs throughout the task descriptions in outputs, but the outputs should be more specific.
- The Gantt Chart to be updated to reflect completion dates set out in task descriptions.

<u>Outcome</u>: The NSW RAC would like the research proponent to revise the proposal taking to account all the points raised and submit a revised proposal via email to the RAC for consideration.

<u>Action</u>: The research proponent to reframe proposal to emphasise community benefit of this work and clarify the independence from consent conditions.

Action: The research proponent to address gaps in Methodology section.

<u>Action</u>: The research proponent to update the Communications Plan and Impact Pathway sections in consultation with the GISERA Communications Manager.

<u>Action</u>: The research proponent to update output section of the task descriptions to reflect updated information to be incorporated in Impact Pathway.

Action: The research proponent to update the Gantt Chart.

3B. PROJECT PROPOSAL

Geochemical modelling and geophysical surveys to refine understanding of connectivity between coal seams and aquifers

The GISERA Director provided a summary of the project proposal.

Key points raised:

- The research proponent should be aware of protests made during previous ground surveys. Will be important to have contingencies in place if there are access issues. Also look to at how best to interact with community and landowners on why we are doing the work, the flight path, and the flying dates (particularly to those affected).
- There is a missing reference to the 2014 Richard Cresswell paper.
- The References section will include a live link to 2022 Raiber report which is scheduled for public release on 18 April 2022.

- As part of the Communications Plan, think about incorporating the ways to improve visibility of the modelling and model output. Also consider doing an animation/conceptual cartoon of the 3D model.
- More details on Impact Pathway section on what will be done with outputs, including whether the 3D model will be published.
- Overall timeframe in task 2 description should state end date of 2023.

<u>Outcome</u>: The NSW RAC approved this project, subject to the actions below being addressed to the satisfaction of the GISERA Director.

<u>Action</u>: The research proponent to update the Communications Plan and Impact Pathway sections in consultation with the GISERA Communications Manager.

Action: The research proponent to update the References section.

Action: The research proponent to adjust end date in task 2 description.

3C. PROJECT PROPOSAL

Microbial communities and their ability to degrade prospective chemicals used in coal seam gas activities

The GISERA Director provided a summary of the project proposal.

Key points raised:

- The second part of proposal needs to be reframed that it is addressing community concern/perception associated with a spill.
- Emphasis in the proposal and methodology that the chemicals that will considered will be those chemicals to be used by the operator. The list of CSG-related chemicals under consideration presented in table 1 should be removed from proposal as it represents an ambit list of chemicals rather than the specific ones relevant to the site.
- Would be good to include the regulating authority responsible for use/concentrations of the chemicals.
- Revisit budget for task 3 sampling campaign to determine if some of the costs are also associated with task 4.
- CSIRO and DPI at Myall Vale have done work on microbes in Narrabri. It would be worthwhile obtaining that data for possible benchmarking. Invite Lukas Van Zwieten (microbiologist at NSW DPI) or Guna Nachimuthu (soil scientist at NSW DPI) to participate on technical reference group.
- Narrabri sampling campaign dates should read 2022 and 2023 on page 11 task 3.

<u>Outcome</u>: The NSW RAC approved this project, subject to the actions below being addressed to the satisfaction of the GISERA Director.

<u>Action</u>: The research proponent to invite Lukas Van Zwieten or Guna Nachimuthu to participate on project technical reference group.

<u>Action</u>: The research proponent to reframe proposal emphasising community concern/perception of risks associated with a spill.

<u>Action</u>: The research proponent to specify actual chemicals to be used and regulating authority for use of those chemicals.

Action: The research proponent to remove table 1.

Action: The research proponent to check budget for task 3 sampling campaign.

ITEMS FOR NOTING OR DISCUSSION BY EXCEPTION

4. OTHER BUSINESS

Ideas for further research included:

- Feedback from community indicates longstanding issues around sulphide producing bacteria decaying steel barriers and well cements.
- Decommission/legacy issues
- Habitat/rehabilitation with consideration of offset conditions
- Use of treated water (brine)
- A study on how best to get factual information on water and fugitive emissions out to the Gunnedah community (Narrabri, Gunnedah and Coonamble). Provide community with information on what work has been done to address Mary O'Kane's recommendations.

NEXT MEETING

The next meeting of the NSW Research Advisory Committee is yet to be scheduled. It is anticipated that a meeting will occur once further proposals are established.

MEETING CLOSE

The meeting closed at 12.20 pm (AEST).

SUMMARY OF ACTIONS FROM GISERA NSW RAC MEETING #5 – 4 APRIL 2022

Agenda Item	Action
04-04-22 Item 3A	The research proponent to reframe proposal to emphasise community benefit of this work and clarify the independence from consent conditions.
04-04-22 Item 3A	The research proponent to address gaps in Methodology section.
04-04-22 Item 3A	The research proponent to update the Communications Plan and Impact Pathway sections in consultation with the GISERA Communications Manager.
04-04-22 Item 3A	The research proponent to update output section of the task descriptions to reflect updated information to be incorporated in Impact Pathway.
04-04-22 Item 3A	The research proponent to update the Gantt Chart.
04-04-22 Item 3B	The research proponent to update the Communications Plan and Impact Pathway sections in consultation with the GISERA Communications Manager.
04-04-22 Item 3B	The research proponent to update the References section.
04-04-22 Item 3B	The research proponent to adjust end date in task 2 description.
04-04-22 Item 3C	The research proponent to invite Lukas Van Zwieten or Guna Nachimuthu to participate on project technical reference group.
04-04-22 Item 3C	The research proponent to reframe proposal emphasising community concern/perception of risks associated with a spill.
04-04-22 Item 3C	The research proponent to specify actual chemicals to be used and regulating authority for use of those chemicals.
04-04-22 Item 3C	The research proponent to specify actual chemicals to be used and regulating authority for use of those chemicals.
04-04-22 Item 3C	The research proponent to remove table 1.
04-04-22 Item 3C	The research proponent to check budget for task 3 sampling campaign.