

# MEETING MINUTES



MINUTES OF: Arrow Surat Community Reference Group  
 HELD AT: BMO, Dalby  
 DATE: 24 September 2015  
 COMMENCEMENT TIME: 9.00am

<b>PRESENT:</b>	<b>ASCRG ATTENDEES:</b> <b>Leisa Elder</b> – Vice President External Relations and Tenure Management <b>Simon Gossmann</b> - Groundwater Manager <b>Katie Sullivan</b> – Indigenous Relations & Sustainable Development Team Lead (as delegate for Peta Tucker) <b>Tania Marshall</b> – A/Senior Community Officer, Dalby  <b>John Hughes</b> - Project Officer CSG Compliance Unit; DNRM <b>Lyn Nicholson</b> Chair, Basin Sustainability Alliance <b>Trudi Bartlett</b> , Member Services Manager, Dalby Chamber of Commerce <b>Pat Weir MP</b> , Member for Condamine <b>Geoff Hewitt</b> – Landholder
	<b>Presenters:</b> <b>Dave Munro</b> – Surat FEDM <b>Carey Bradford</b> – ATP Compliance Manager
	MINUTES: <b>Tania Marshall</b> (Secretary)
	<b>APOLOGIES:</b> <b>Graham Clapham</b> – Central Downs Irrigators Ltd <b>Cr Charlene Hall</b> - Councillor, Western Downs Regional Council <b>Jordan Peach</b> – Australian Lot Feeders Association, Mort & Co <b>Cr Nancy Somerfield</b> - Councillor, Toowoomba Regional Council <b>Matt Paull</b> – Policy Director, APPEA <b>Ian Hayllor</b> – Landholder <b>Cr Ray Jamieson</b> – Councillor, Western Downs Regional Council <b>Mary O'Brien</b> – Regional Manager, Cotton Australia <b>Sarah Due</b> – Regional Manager, Agforce
<b>CHAIR:</b>	<b>Leisa Elder</b> , Vice President External Relations and Tenure Management
<b>DISCLOSURES</b>	None recorded

		ACTION/SUGGESTIONS
<b>ITEM 1</b>	<b>Joint Session with AIFL Committee</b>  <b>Welcome – Leisa Elder</b> Leisa Elder advised that Katie Sullivan, Indigenous and Sustainable Development Team Lead, was attending the meeting as delegate for Peta Tucker and that Meredith Prior, Shell graduate working within Arrow, was attending as an observer.	
<b>ITEM 2</b>	<b>Safety moment – The Drug Ice – Katie Sullivan</b>	
<b>ITEM 3</b>	<b>Development Update Surat Project</b> <ul style="list-style-type: none"> <li><b>Daandine Expansion Project (DDXP) – Shutdown and flaring</b></li> </ul> Dave Munro provided an update on the DDEXP works. <ul style="list-style-type: none"> <li>Expansion provides an increase in Daandine production capacity.</li> <li>Recent facility shutdown was to make safety upgrades and pre-install compressor tie-ins.</li> <li>Short term in field flaring was conducted.</li> <li>Wells turned down to a minimum rate – avoiding full shut in because wells will load up with water and will be slow to recover.</li> <li>Notification to all neighbours in the area was undertaken to ensure community understanding of works being done.</li> <li>A further shutdown to connect and commission the new compressors will be conducted.</li> <li>John Hughes asked if the end of year shut down would involve flaring and how much water will load the wells.</li> <li>Dave Munro provided the following information:  <u>How much water will load wells:</u> Wells behave differently depending on how long they are shut down for, how well the coal has been dewatered around them and how productive the coal is. We monitor each well to understand its                     </li> </ul>	

	<p>behaviour. It can take from a few hours for a well to recover from a short shut in to several weeks to recover from a long one.</p> <p><u>End of the year flaring</u>: Commissioning of the new Daandine compressors and well field gas ramp up from now through the end of the year will involve intermittent flaring at the main gas plant. This is not a full shut down of the Daandine field and is not planned to involve 'in-field' flaring, away from the gas plant. Arrow will continue to keep the nearby community informed</p>	
<p>ITEM 4</p>	<p><b>Water Science – Lone Pine interconnectivity results</b></p> <p>Simon Gossmann provided an overview of the results of the study undertaken at Lone Pine to assess the connectivity between the Walloon Coal Measures and the Condamine Alluvium.</p> <ul style="list-style-type: none"> <li>• The study contributes to the Condamine Interconnectivity Research Project (CIRO), part of a wider program of investigations into connectivity lead by the Office of Ground Water Impact Assessment (OGIA).</li> <li>• Obtains data to improve OGIA's Surat Basin CMA Ground Water Model.</li> <li>• Continuous core was collected of the Condamine Alluvium to the Walloon Coal Measures.</li> <li>• Open Day was held on site in 2014 to show the core that was collected for laboratory testing of permeability.</li> <li>• The study allowed Arrow to demonstrate practical coexistence through:             <ul style="list-style-type: none"> <li>• The use of bog mats to protect cultivation and to limit the impact on black soils.</li> <li>• Successful landholder negotiation to minimise impact                 <ul style="list-style-type: none"> <li>- Timing i.e. when was water available and normal farming activities not going to be disrupted</li> <li>- Siting of bores to best minimise impact and to get the necessary data</li> </ul> </li> </ul> </li> <li>• Four bores were drilled and three completed for monitoring.</li> </ul> <p><b>Overview of Daandine and Lone Pine Results –</b></p> <ul style="list-style-type: none"> <li>• There is a low level of regional connectivity between the Condamine Alluvium and the Walloon Coal Measures.</li> <li>• Walloon Coal Measures response to pumping in Condamine Alluvium did not indicate a strong hydraulic connection between the two systems.</li> <li>• Vertical hydraulic permeability values determined from this study will be used as part of OGIA's construction of the new regional groundwater model.</li> <li>• Geoff Hewitt asked if the results between Daleglade and Lone Pine were similar. Simon advised that the geology was less permeable than Daleglade (which showed low connectivity).</li> <li>• Geoff Hewitt noted the effect of nearby pumping (from nearby bores) was interesting and asked how confident Arrow was that the results are across many bores. Simon advised that it was part of the work that OGIA were undertaking.</li> </ul>	
<p>ITEM 5</p>	<p><b>Research and Innovation – Condamine Alliance lunker installation project</b></p> <ul style="list-style-type: none"> <li>• Arrow has had a partnership with Condamine Alliance for 2 years. The partnership is the largest corporate investment in the Condamine catchment, securing the future of the Dewfish Demonstration Reach.</li> <li>• The partnership is delivering a program of works that includes:             <ul style="list-style-type: none"> <li>• Irrigation screens</li> <li>• Small fish habitat restoration</li> <li>• Maintaining fish passage</li> <li>• Pest management</li> <li>• Landscape permeability</li> <li>• Restoration of urban waterways.</li> </ul> </li> <li>• Arrow Energy in partnership with Condamine Alliance as part of the Dewfish Demonstration Reach project constructed Lunkers for installation in the Myall Creek. Lunkers (little underwater neighbourhood keepers) are structures installed in streams to provide fish habitat while also helping to stabilise the bank.</li> </ul> <p><b>Research and Innovation – Soil Characterisation Research</b></p> <ul style="list-style-type: none"> <li>• In 2014, Arrow engaged with QUT to assess the potential long-term impacts on agricultural soil from irrigating with treated and blended CSG water.</li> <li>• The research was undertaken using three soil types on Arrow's Theten demonstration farm at Dalby.</li> <li>• The soil analysis is important because it sets up the basis for effective water management (e.g. through land irrigation using treated or blended CSG water).</li> <li>• This research showed that irrigation of agricultural soils with treated / blended CSG water is possible without damaging agricultural soils.</li> <li>• Research for soil column testing is now being expanded to examine two further properties – Arrow's Broadwater farm and a call for expressions of interest for a second local farm was made. Discussions would be undertaken with those landholders from the committee who expressed an</li> </ul>	

	interest in having this research conducted on their property.	
	<b>ASCRG Committee business</b>	
<b>ITEM 6</b>	<b>Membership</b>	
	Leisa Elder advised that Tony Knight, Vice President MGP Joint Venture, had left Arrow Energy and moved that his replacement be his delegate, Carey Bradford, Arrow Energy ATP Compliance Manager. Seconded by Geoff Hewitt.	
<b>ITEM 7</b>	<b>Minutes of previous meeting &amp; actions</b>	
	Minutes of previous meeting were approved by the committee.	<b>TM to arrange for minutes of the June meeting to be uploaded to the website</b>
<b>ITEM 8</b>	<b>Tipton 2D Seismic Survey Program</b>	
	Carey Bradford advised that Arrow was planning to undertake a Seismic Survey program in the Tipton and Cecil Plains areas from January 2016. <ul style="list-style-type: none"> <li>• The survey will consist of 117km of 2D seismic along gazetted roads round Cecil Plains.</li> <li>• Survey to be undertaken to map the Horrane Fault, to provide more certainty on the fault's location and characteristics. The Horrane Fault is a small fault in geological terms.</li> <li>• The information provided through survey results will enable Arrow to analyse how the fault intersects with the Walloon Coal Measures.</li> <li>• The information gathered will de-risk geological uncertainties to provide the ability for better decision making and therefore prevent unnecessary exploration drilling activities.</li> <li>• A seismic survey is a geophysical acquisition technique used to gather detailed images of the rock formations below the earth's surface.</li> <li>• Seismic waves are created by a vibrating pad that is mounted on a truck or buggy.</li> <li>• The pad vibrates along the ground and the seismic waves are propagated through the ground which reflects underground rock layers.</li> <li>• The seismic waves are picked up by small, highly receptive microphones, called geophones and the data analysed.</li> <li>• John Hughes asked how much noise is generated. Carey Bradford advised that it was no different to a car.</li> <li>• Carey also advised that the works would take approximately 10 days and would be within daylight hours.</li> <li>• John Hughes asked what communication would be undertaken with the local area.</li> <li>• Leisa Elder advised that a communications plan was being developed.</li> <li>• John Hughes asked for a copy of the letter to go to landholders and a detailed map. John will speak with the Government Relations team about this.</li> <li>• Geoff Hewitt remarked that not all landholders received letters when Arrow undertook the last seismic activity north of Dalby and wanted to ensure that all landholders were advised in this case. Geoff Hewitt also requested that landholders, neighbouring the seismic route, be informed that the truck would be moving past their properties prior to this occurring.</li> </ul>	
<b>ITEM 9</b>	<b>Update from Arrow Intensively Farmed Land Committee – Simon Gossmann New Members</b> <ul style="list-style-type: none"> <li>• New members from the Wandoan area were endorsed by the committee in early 2015.</li> </ul> <b>Area Wide Planning (AWP)</b> <ul style="list-style-type: none"> <li>• Leisa Elder provided a brief history of AWP. Pilot was conducted at Cecil Plains from 2013-2014. Feedback from the pilot was incorporated into the AWP model and Arrow business processes.</li> <li>• Landholder Layout Agreements are an outcome of the AWP pilot, which will be designed to include standard specifications, conditions and compensation frameworks. This agreement will be developed to formalise the outcome of AWP, prior to formal Conduct and Compensation Agreements.</li> </ul> <b>Mitigating impacts to landholder operations</b> <ul style="list-style-type: none"> <li>• Arrow has developed a Coexistence Simultaneous Operations Matrix (Coexistence SIMOPS) which identifies Arrow and landholder activities that may be undertaken at the same location. SIMOPS ensures the safety and security of both landholders and Arrow staff / contractors. An explanation of the matrix was given.</li> <li>• John Hughes remarked he was not aware of any other companies undertaking discussions with landholders around this issue. John Hughes asked if Arrow would share this work with the department.</li> </ul>	<b>Request forwarded to Government Relations Team.</b>

<b>ITEM 10</b>	<b>Request for new items of interest from Committee members – Leisa Elder</b>	
	<ul style="list-style-type: none"> <li>• Pest management would be on the Agenda for a future meeting.</li> </ul>	
<b>ITEM 11</b>	<b>Any Other Business</b>	
	<p><b>Accommodation</b></p> <ul style="list-style-type: none"> <li>• Trudi Bartlett raised the issue of accommodation and the use of camps in Dalby.</li> <li>• Leisa Elder provided information on Arrow’s policy to use camp facilities due to safety requirements and the distance to drive after a shift. This, at times, required camps to be located close to operations.</li> <li>• The use of camps in town was based on the services provided by the facilities. Staff have access to onsite gyms; break out spaces and smorgasbord meal facilities.</li> <li>• To ensure the health and wellbeing of staff, having access to such facilities addresses the issues of social isolation, enabling workers to socialise and come together.</li> <li>• Modern workforces are seeking these types of facilities. Workers look for and demand facilities that look at the health and wellbeing of staff.</li> <li>• Leisa Elder advised that the accommodation policy was reviewed annually.</li> <li>• Geoff Hewitt asked if Arrow Energy use their own camps or service camps. Leisa Elder advised that Arrow use a mix of both. In Moranbah Arrow uses a camp in town. Arrow currently has a small camp on site for the Daandine Expansion project.</li> <li>• Leisa Elder advised that Arrow staff were provided with incentives to live locally.</li> </ul> <p><b>Office of Ground Water Impact Assessment (OGIA) program</b></p> <ul style="list-style-type: none"> <li>• Currently Arrow is in the process of drilling at Bora Creek 10 site. This is a water monitoring bore as part of the OGIA program. Drilling would take approximately 10 days.</li> </ul> <p><b>Tours of Site</b></p> <ul style="list-style-type: none"> <li>• Leisa Elder advised that Arrow would be happy to arrange group visits to the Arrow Community Information Centre in Dalby. Leisa Elder explained that due to health and safety requirements, visits to an operational gas site would be much more difficult.</li> <li>• Trudi Bartlett to work with Arrow on arranging group visits to the Arrow Energy Community Information Centre in Dalby.</li> </ul>	
<b>ITEM 12</b>	<b>Agreed Outcomes, Actions and Deliverables</b>	
	Nil additional	
<b>ITEM 13</b>	<b>2015 Meeting Dates</b>	
	2 December 2015 - Toowoomba	

There being no further business, the meeting was closed at 11am.

CONFIRMED AS A TRUE AND CORRECT RECORD.

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Chairperson