



Senex Energy Limited

Annual Report (Resubmission)

Licence Year 5

6 May 2012 – 5 May 2013

Petroleum Retention Licence
PRL 15 (Growler)

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1 Introduction

Petroleum Retention Licence (PRL) 15 was granted on 6 May 2008. The licence is located in the Cooper/Eromanga Basin, South Australia. This report details the work conducted during Licence Year 5 (6 May 2012 – 5 May 2013 inclusive), in accordance with Regulation 33 of the Petroleum and Geothermal Energy Act 2000.

2 Permit Summary

For the duration of the licence year, licensees for Petroleum Retention Licence (PRL) 15 were:

- Victoria Oil Exploration (1977) Pty Ltd 40%
- Permian Oil Pty Ltd 20%
- Springfield Oil and Gas Pty Ltd 15%
- Impress (Cooper Basin) Pty Ltd 25%

The current work commitments (including all variations) associated with PRL 15 can be seen in Table 1.

Table 1 Current work commitments by licence year

Licence Year	Licence dates	Minimum Work Program
Year 1 & 2	6 May 2008 – 5 May 2010	Facility Construction: EPT Growler-1, 2
Year 3	6 May 2010 – 5 May 2011	Nil
Year 4	6 May 2011 – 5 May 2012	Nil
Year 5	6 May 2012 – 5 May 2013	Nil

Licence Year 5 concluded on 5 May 2013. The following table displays the minimum work program (after all variations) and the actual work completed up until the end of the current licence period.

Table 2 Final work program and work completed (as of end of current reporting period) by licence year

Licence Year	Minimum Work Program	Actual Work
Year 1 & 2	Facility Construction: EPT Growler-1 & 2	Facility Construction: EPT Growler-1, 2 Drill, complete & tie in Growler-3, 4, 5 Facility upgrade works
Year 3	Nil	Construction of laydown area at Growler-9 Construction of new road to access the licence area (AAL 156) Geological and Geophysical Studies
Year 4	Nil	Drill and complete Growler-6, 7, 8, 9, 10 and 11 wells Connect Growler-6, 7, 8, 9 and 11 wells to production Install artificial lift on Growler-3, 6, 7, 8, 9 and 11 wells Facility upgrade works on Growler production facility Construct additional interceptor pond and evaporation pond

Year 5	Nil	Connect Growler 10 well to production Install artificial lift on Growler 3, 5, 6 and 10 wells Construction of a new Growler Bulk Storage Facility facility Connection of the Growler field into the Growler to Lycium pipeline
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An application to renew PRL 15 and its Associated Activities Licences 156, 165, 167 & 174 was lodged on 5 March 2013. The renewal was subsequently granted so that PRL 15 now expires on 5 May 2018 and Associated Activities Licences 156, 165, 167 & 174 expire on 5 May 2015.

On 7 March 2013, PPL 242 was granted over the Growler field. As a result, the PRL 15 area was reduced from 13.34km² to 6.87km².

3 **Regulated Activities**

Pursuant to Regulation 33(2)(a)

Drilling and Related Activities

No wells were drilled during the reporting period.

Growler 10 was completed as a rod pumping well during May 2012. Recompletions also occurred at Growler 3 and 6 during May 2012 when ESP pumps were installed by Eastern Well Group Rig 5. In December 2012, a recompletion was performed at Growler 5 with the installation of an ESP pump.

Seismic Data Acquisition

No regulated activities undertaken in the licence reporting period

Seismic Data Processing and Reprocessing

No regulated activities undertaken in the licence reporting period

Geochemical, Gravity, Magnetic and other surveys

No regulated activities undertaken in the licence reporting period

Production and Processing

PRL 15 – Growler Facility

Production Facilities

An additional Bulk Storage Facility was constructed at the Growler field to increase the capacity of storage, water handling and load out capabilities of the existing facility. This new facility was needed to match the increased production from development success. A pump and flowline between the two facilities and was also installed to facilitate transfer of crude oil from the existing facility to the new.

In addition metering and pumping facilities, a connection into the newly constructed Growler to Lycium flowline were also installed. A flowline was connected to the inlet manifold of the new Bulk Storage Facility from the Growler 6 well, allowing flow directly to the new storage facility.

After further flooding of the Growler field, the Growler field was reinstated to production in August 2012. Prior to this, Growler 1, 2, 4 and 5 flowlines were inspected and pressure tested prior to being put back in service.

Infrastructure Construction

A warehouse area was constructed within the equipment laydown area during Licence Year 5.

Wellhead Facilities

Pump jack surface pumping units and associated surface facilities were installed on the Growler 10 well.

An ESP pump and associated surface facilities were installed on the Growler 3, 5 and 6 wells.

Maintenance activities

The Preventative Maintenance Plan for the facilities was carried out during the year including vessel inspections, PSV testing, wellhead and flowline inspections.

Emergency Response Exercises

A number of emergency response exercises were conducted during the reporting year. In particular, H2S emergency drills and flowline emergency response drills were performed across June to October 2012 in order to confirm the effectiveness of the Corporate Emergency Management arrangements and the site specific Emergency Response Plan.

A detailed summary of the emergency response drills conducted is contained in Table 4b.

Associated Activities

In AAL156 on the Growler sand road, the Tindilpie permanent crossing of the Kanowana Channel was constructed to improve the condition and accessibility of the road especially during wet weather and flooding events.

Repairs to the Growler sand road, Growler to Jack lake road and Growler to Snatcher roads were also undertaken following damage to the road caused by floodwater inundation.

Produced Water Disposal

Cumulative water production from the field during Licence Year 5 was 164kL. Most of the water produced was evaporated from the lined interceptor pond and free form evaporation area within the facilities.

Pipeline/Flowline Construction and Operation

A welded aboveground production flow line was installed from the Growler 6 well to the new Bulk Storage Facility at Growler, along with a flow line connecting the existing facility to the new facility. These flowlines were constructed by Senex Energy and General Trade Industries (contractor).

The Growler oil field was connected to Moomba in mid-December 2012. The connection comprised of a 70 kilometre Growler to Lycium pipeline and a 74 kilometre Lycium to Moomba pipeline. Both pipelines are operated by Beach Energy.

Preliminary Survey Activities

No regulated activities undertaken during the licence reporting period.

4 Compliance Issues

Licence and Regulatory Compliance

Pursuant to Regulations 33(2) (b) & (c)

Senex Energy, as operator of PRL 15, has generally complied with the relevant conditions under the Petroleum and Geothermal Energy Act 2000 and the Petroleum and Geothermal Energy Regulations 2013.

Licence Non-Compliance

No licence non-compliances identified for PRL 15.

Regulatory Non-Compliance

There were two incidents of regulatory non-compliance recorded in PRL 15 during the reporting period (see table 3).

Table 3 List of regulatory non-compliances for current reporting year

No.	Date	Activity	Details of Non-Compliance	Rectification of Non-Compliance
1	31/07/2012	Submission of Cased Hole Logs	Growler 3 Cased Hole Logs were not submitted by the due date (28/7/12)	Review of reporting responsibilities, due dates added to Senex Activity Notification Task Schedule
2	24/08/2012	Submission of Well Completion Report	Growler 8 Well Completion Report was not submitted by the due date (23/8/12)	Review of reporting responsibilities, due dates added to Senex Activity Notification Task Schedule

Compliance with Statement of Environmental Objectives

Activities conducted in PRL 15, including preparation of well leases and petroleum production operations, have been assessed against the following relevant Statement of Environmental Objectives:

- *Statement of Environmental Objectives: Drilling and Well Operations* (Santos, November 2009).
- *Cooper Basin Petroleum Production Operations Statement of Environmental Objectives* (Victoria Petroleum, September 2008).

There were two incidents of non-compliance with Objective 6 of the Cooper Basin Petroleum Production Operations SEO. Further details are contained in Table 4b and Table 6.

Table 4a SEO for Drilling and Well Operations, Cooper Basin, SA

Environmental Objective	Assessment Criteria	Compliant/Non-Compliant	Comments
1. Minimise risks to the safety of the public and other third parties.	Reasonable measures implemented to ensure no injuries or health risks to the public or third parties.	Compliant / Achieved	Signage in place discouraging public entry to Growler production field and associated drill sites. Signage in place warning of H ₂ S
2. Minimise disturbance and avoid contamination to soil.	<p><u>Well Site and Access Track Construction</u> 0, +1 or +2 GAS criteria are attained for “Minimise impacts on soil” objective as listed in Appendix 1 Table A1 and “To minimise the visual impact” as listed in Appendix 1 Table A2. No unauthorised off-road driving or creation of shortcuts. No construction activities are carried out on salt lakes or steep tableland slopes (as defined in EIR).</p> <p><u>Borrow pit construction and restoration</u> 0, +1 or +2 GAS criteria are attained for “Minimise visual impacts”, and “Minimise impact on soil” objectives as listed in Appendix 1 Table A3.</p> <p><u>Production Testing/Well Blowdowns</u> No soil contamination as a result of production testing or well blowdown operations.</p> <p><u>Fuel and Chemical Storage and Handling</u> Fuel and Chemical Storage and Handling No spills/leaks outside of areas designed to contain them. Level of hydrocarbon continually decreasing for in situ remediation of spills. Soils remediated to a level as determined by the SHI process. Also refer to Objective 12.</p>	Compliant / Achieved	<p>No wells drilled during reporting period.</p> <p>No gibber present, sensitive areas avoided. Remediation: No wells abandoned during reporting period.</p> <p>Existing borrow pits reused where practical.</p> <p>No spills occurred outside of areas designed to contain them.</p>

Environmental Objective	Assessment Criteria	Compliant/Non-Compliant	Comments
	<p><u>Waste Disposal (domestic, sewage and sludges)</u></p> <p>All domestic wastes are disposed of in accordance with EPA licensing requirements.</p> <p>0, +1 or +2 GAS criteria are attained for "Site to be left in a clean and tidy condition" objective listed in Appendix 1 Table A2.</p> <p>No spills or leaks from sewage treatment processing.</p> <p>Refer to Assessment Criteria for Objective 11.</p>		Waste disposed of in accordance with EPA requirements
3. Avoid the introduction or spread of pest plants and animals and implement control measures as necessary	No weeds or feral animals are introduced to, or spread in, operational areas as a consequence of activities.	Compliant / Achieved	No evidence of pest introduction
4. Minimise disturbance to drainage patterns and avoid contamination of surface waters and shallow ground water resources.	<p><u>Well Lease and Access Track Construction</u></p> <p>Well leases and access tracks are located and constructed to maintain pre-existing water flows (i.e. channel contours are maintained on floodplains and at creek crossings).</p> <p><u>Drilling Mud Sumps and Flare Pits</u></p> <p>No overflow of drill cuttings, muds and other drilling fluids from mud sumps.</p> <p>No waste material disposal to sumps and flare pits.</p> <p><u>Well Heads (Oil and Gas Systems)</u></p> <p>No leaks/spills outside of areas designed to contain them.</p>	Compliant / Achieved	<p>No contamination to waters.</p> <p>No leaks or spills occurred outside of areas designed to contain them.</p>

Environmental Objective	Assessment Criteria	Compliant/Non-Compliant	Comments
	<p><u>Well Blowdown/Production Testing</u> No water (surface or groundwater) contamination as a result of production testing or well blowdown operations.</p> <p><u>Fuel/Chemical Storage and Handling</u> No water (surface or groundwater) contamination as a result of fuel or chemical storage and handling</p> <p><u>Waste Management</u> Refer to Assessment Criteria for Objective 11.</p>	Compliant / Achieved	No contamination occurred
5. Avoid disturbance to sites of cultural and heritage significance	<p>Proposed well sites and access tracks have been surveyed and any sites of Aboriginal and non-Aboriginal heritage identified.</p> <p>Any identified cultural and heritage sites have been avoided.</p>	Compliant / Achieved	WAC carried out for all activities.
6. Minimise loss of aquifer pressures and avoid aquifer contamination.	<p><u>Drilling & Completion Activities</u> There is no uncontrolled flow to surface (Blow out). Sufficient barriers exist in casing annulus to prevent crossflow between separate aquifers or hydrocarbon reservoirs. Relevant government approval obtained for abandonment of any radioactive tool left downhole.</p> <p><u>Producing, Injection, Inactive and Abandoned Wells</u> No cross-flow behind casing between aquifers, and between aquifers and hydrocarbon reservoirs unless approved by DWLBC.</p>	Compliant / Achieved	<p>No uncontrolled flow to surface.</p> <p>No contamination occurred</p>

Environmental Objective	Assessment Criteria	Compliant/Non-Compliant	Comments
7. Minimise disturbance to native vegetation and native fauna	<p><u>Well Lease and Access Track Construction and Restoration</u> Any sites with rare, vulnerable and endangered flora and fauna have been identified and avoided. 0, +1 or +2 GAS criteria are attained for “Minimise impacts on vegetation” objective, during well lease and access track site selection and construction and for “Re-establish natural vegetation on abandoned well sites and access track” objective.</p> <p><u>Borrow Pits Construction and Restoration</u> 0, +1 or +2 GAS criteria are attained for “Minimise impacts on vegetation” objective during borrow pit site selection and construction, and “Minimise Impact on Vegetation” objective for borrow pit restoration.</p> <p><u>Waste Management</u> Refer to assessment criteria for Objective 11.</p> <p><u>Fuel and Chemical Storage and Management</u> Refer to assessment criteria for Objectives 2 and 4.</p>	Compliant / Achieved	Sites have been assessed for rare, vulnerable and endangered flora and fauna and any sensitive areas have been avoided.
8. Minimise air pollution and greenhouse gas emissions.	Compliance with EPA requirements.	Compliant / Achieved	Compliant with EPA requirements
9. Maintain and enhance partnerships with the Cooper Basin community.	No unresolved reasonable complaints from the community.	Compliant / Achieved	No complaints received.
10. Avoid or minimise disturbance to stakeholders and/or associated infrastructure.	No reasonable stakeholder complaints left unresolved.	Compliant / Achieved	Notification and consultation with affected parties completed for all activities.

Environmental Objective	Assessment Criteria	Compliant/Non-Compliant	Comments
<p>11. Optimise (in order of most to least preferable) waste avoidance, reduction, reuse, recycling, treatment and disposal.</p>	<p>All wastes to be disposed of at an EPA licensed facility in accordance with EPA Licence conditions, with the exception of drilling fluids, drill cuttings, other fluids disposed during well clean-up and wastewater (see below). Wastewater (sewage and grey water) disposed of in accordance with the <i>Public and Environmental Health (Waste Control) Regulations 1995</i> or to the Department of Health's satisfaction. Attainment of GAS criteria for "Site to be left in clean, tidy and safe condition" objective during well site restoration (refer Appendix 1 Table A2). Attainment of GAS criteria for "Site left in clean and tidy condition" objective during borrow pit restoration (refer Appendix 1 Table A3).</p>	<p>Compliant / Achieved</p>	<p>Waste disposal conducted accordingly</p>
<p>12. Remediate and rehabilitate operational areas to agreed standards.</p>	<p>No unresolved reasonable stakeholder complaints.</p> <p><u>Contaminated Site Remediation</u> Contaminated sites are remediated to a level as determined by the approved SHI process. Prior to the finalisation and approval of the SHI process, contaminated sites are remediated in accordance with criteria developed with the principles of the National Environment Protection Measure for contaminated sites, and in consultation with the EPA.</p>	<p>Compliant / Achieved</p>	<p>No unresolved reasonable stakeholder complaints</p> <p>No contaminated sites</p>

Environmental Objective	Assessment Criteria	Compliant/Non-Compliant	Comments
	<p>The attainment of 0, +1 or +2 GAS criteria for the objectives (refer Appendix 1 Table A2):</p> <ul style="list-style-type: none"> - "To minimise the visual impact" - "The revegetation of indigenous species" <p><u>Borrow Pit Restoration</u></p> <p>The attainment of 0, +1 or +2 GAS criteria for (refer Appendix 1 Table A3):</p> <ul style="list-style-type: none"> - "Revegetation of indigenous species" - "Minimise impact on soil" - "Minimise visual impacts" - "Site to be left in a clean and tidy condition" <p>Note: Well abandonment issues are addressed under Objective 6.</p>		

Table 4b SEO for Victoria Petroleum Cooper Basin Petroleum Production Operations

Objective / Goals	Assessment Criteria	Compliant/Non-Compliant	Comments
1.0 To avoid unnecessary disturbance to third party infrastructure, landholders or land use.	Where disturbance is unavoidable or accidental, infrastructure or land use is restored to the satisfaction of the landholder/owner or as near as practicable to undisturbed condition.	Compliant / Achieved	No incidents reported nor complaints received regarding disturbance to landholders
1.1 To minimise disturbance or damage to infrastructure / land use and remediate where disturbance cannot be avoided.	No unresolved reasonable landholder/third party complaints.	Compliant / Achieved	No unresolved reasonable landholder complaints
1.2 To minimise disturbance to landholders.	Landholder activities not restricted or disturbed as a result of activities unless by prior arrangement.	Compliant / Achieved	

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
2.0 To maintain soil stability / integrity.	The extent of soil erosion is consistent or less than surrounding land. Vegetation cover is consistent with surrounding land.	Compliant / Achieved	No production activities undertaken on salt lakes, steep tableland land systems or wetland land systems
2.1 To remediate erosion as a result of production operations in a timely manner.	No evidence of significant subsoil on surface (colour).	Compliant / Achieved	Extensive work throughout the tenement for erosion remediation after rainfall.
2.2 To prevent soil inversion.	No production activities undertaken on salt lakes, steep tableland land systems or wetland land systems (as defined in the EIR).	Compliant / Achieved	Vegetation cover consistent with surrounding land.
2.3 To minimise and remediate soil disturbance.	Abandoned areas (e.g. borrow pits) are remediated and rehabilitated to be reasonably consistent with the surrounding area. 0, +1 or +2 GAS criteria for borrow pit construction and rehabilitation are attained (Appendix B).	Compliant / Achieved	Vehicle access restricted to production areas and associated infrastructure and easements.

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
3.0 To minimise disturbance to native vegetation and fauna.	Vegetation clearing is in accordance with the <i>Native Vegetation Act 1991</i> .	Compliant / Achieved	Vegetation clearance minimised to as little as possible.
3.1 To minimise additional clearing of or damage to native vegetation as part of production activities.	<p>Vegetation clearing is limited to previously disturbed areas or areas assessed to be of lowest sensitivity.</p> <p>No rare, vulnerable or endangered flora removed without appropriate permits.</p> <p>No production activities undertaken on salt lakes, steep tableland land systems or wetlands land systems (as defined in the EIR).</p> <p>0, +1 or +2 GAS criteria for borrow pit construction and rehabilitation are attained (Appendix B).</p>	Compliant / Achieved	No rare, vulnerable or endangered flora was removed.
3.2 To achieve a significant environmental benefit for vegetation clearance associated with Production Licence activities.	<p>Significant environmental benefit work undertaken in a timely manner.</p> <p>Native Vegetation Council signoff on significant environmental benefit.</p>	Compliant / Achieved	Significant environmental benefit liabilities will be addressed for this period as part of 2012-2013 reporting period.
3.3 To ensure production activities are planned and conducted in a manner that minimises impacts on native fauna.	<p>Native fauna casualties associated with operations restricted to as low as reasonably practical.</p> <p>Vegetation clearing is limited to previously disturbed areas or areas assessed to be of lowest sensitivity.</p>	Compliant / Achieved	Sensitive areas avoided. Clearing of vegetation minimised.
3.4 To minimise disturbance of aquatic habitats (specifically wetlands, permanent waterholes and flowing water courses).	Works in aquatic habitats (e.g. flowing watercourses) have been approved by PIRSA.	Compliant / Achieved	No works in aquatic habitats

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
3.5 To minimise impacts to listed species.	Impacts to listed species will not result in a move to a higher risk category (i.e. compliance with Goal 1 of Strategy No Species Loss - A Nature Conservation Strategy for South Australia 2007-2017). Species abundance and distribution on the reinstated areas is reasonably consistent with the surrounding area.	Compliant / Achieved	Sites assessed for presence of listed species.
3.6 To appropriately rehabilitate disturbed areas not required for production activities.	No reasonable complaints received from landholders in relation to regrowth of vegetation in disturbed areas.	Compliant / Achieved	Remediation of drill sumps and turkey's nests completed on a number of well sites.
4.0 To prevent the introduction or spread of weeds, pathogens and pest fauna.	The presence of weeds and pathogens was consistent with or better than adjacent land.	Compliant / Achieved	No outbreak or spread of pests identified
4.1 To prevent the introduction or spread of weeds, pathogens and pest fauna.	No new outbreak or spread of weeds reported as a result of production activities.	Compliant / Achieved	
5.0 To minimise the impact of the production operations on water resources.	For excavations, surface drainage profiles restored to as is reasonably consistent with surrounding area.	Compliant / Achieved	No uncontrolled flow of water to surface
5.1 To maintain current surface drainage patterns.	For existing roads, easements, drainage is maintained similar to pre-existing conditions.	Compliant / Achieved	Installation of culverts on access track undertaken to ensure current drainage patterns maintained
5.2 To minimise impact to aquifers / groundwater volumes and flow patterns.	No impediment of watercourses. Volume of water produced recorded. No uncontrolled flow to the surface (i.e. no free flowing bores).	Compliant / Achieved	

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
6.0 To avoid land or water contamination	No evidence of any spills or leaks to areas not designated to contain spills.	Non-compliant	Two small spills occurred in August 2012, one at Growler-9 and the other on the Growler access road. Both spills were fully remediated.
6.1 To prevent spills occurring and if they occur minimise their impact	Compliance with the <i>Environment Protection Act 1993</i> , Australian Standard 1940 and the Australian Dangerous Goods Code.	Compliant / Achieved	Bunding in accordance with EPA guidelines.
6.2 To remediate and monitor areas of known contamination arising from production activities (salinisation, hydrocarbons, other production chemicals).	Contamination restricted to known areas and remediation strategies investigated and implemented where practical. Level of hydrocarbon contamination continually decreasing, ultimately to meet Environment Protection Authority (EPA) guidelines.	Compliant / Achieved	No known areas of contamination arising from production activities.
6.3 To ensure that rubbish and waste material is disposed of in an appropriate manner.	No evidence of rubbish or litter on easements or at facilities. Waste material is contained and disposed of in accordance with EMS procedures and the <i>Environment Protection Act 1993</i> . Evidence of waste tracking certificates for prescribed wastes. Evidence of compliance with any waste disposal licence conditions (e.g. EPA licence).	Compliant / Achieved	Waste disposed of in accordance with EMS procedures
6.4 To prevent impacts as a result of hydrotest water and waste water (e.g. washdown water) disposal.	Discharge water meets appropriate ANZECC and EPA criteria for point of disposal.	Compliant / Achieved	Water discharged as per requirements

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
6.5 To ensure the safe and appropriate disposal of grey water (sullage, sewage).	<p>No evidence of impacts to soil, water and vegetation as a result of water disposal (i.e. soil erosion, dead vegetation, water discoloration).</p> <p>No evidence of non-compliance with local or state government regulations.</p>	Compliant / Achieved	
6.6 To minimise impacts as a result of produced formation water treatment and disposal and restrict to defined areas.	<p>Water monitoring results indicated levels of Total Petroleum Hydrocarbons (TPH) below 30mg/L in bunded holding/evaporation ponds and 10mg/L in freeform evaporation ponds or natural disposal areas.</p> <p>No evidence of overflow of product from interceptor pit.</p> <p>No evidence of hydrocarbon contamination immediately adjacent to bunded ponds.</p> <p>Disposal of treated PFW restricted to defined areas in accordance with activity approval conditions.</p>	Compliant / Achieved	Produced formation water treatment and disposal done in accordance with procedures in EMS and accepted industry standards.
6.7 To minimise impacts as a result of land treatment units and restrict to defined areas.	Periodic reports as required detail quantity, level of contamination and proposed ongoing operation of the land treatment units.	Compliant / Achieved	
7.0 To minimise noise due to operations.	Operational activities have taken reasonable practical measures to comply with noise regulations, under the <i>Environment Protection Act 1993</i>	Compliant / Achieved	No noise-related complaints received
7.1 To take reasonable practical measures to comply with noise standards.	No unresolved reasonable complaints	Compliant / Achieved	

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
8.0 To minimise atmospheric emissions.	Reasonable practical measures implemented in design and operation to minimise emissions.	Compliant / Achieved	No complaints or injuries relating to emissions recorded
8.1 To minimise atmospheric emissions.	No reasonable complaints received.	Compliant / Achieved	
8.2 To minimise the generation of dust.	No dust related injuries recorded.	Compliant / Achieved	
9.0 To adequately protect cultural heritage sites and values during operations and maintenance.	Proposed construction areas and access tracks surveyed by relevant Native Title claimant group.	Compliant / Achieved	WAC carried out for all activities
9.1 To ensure that identified cultural sites are not disturbed.	Any new sites identified are recorded and reported to appropriate authority. No impact to identified sites.	Compliant / Achieved	
10.0 To minimise the risk to public health and safety.	No injuries or incidents involving the public.	Compliant / Achieved	No incidents reported involving the public
10.1 To adequately protect public safety during normal production operations.	Demonstrated compliance with relevant standards.	Compliant / Achieved	
10.2 To avoid fires associated with production activities.	Emergency procedures implemented and personnel trained. No uncontrolled operations related fires.	Compliant / Achieved	
10.3 To prevent unauthorised access to production facilities.	No unauthorised activity.	Compliant / Achieved	

Objective / Goals	Assessment Criteria	Compliant/ Non-Compliant	Comments
11.0 Minimise impact of emergency situations.	Emergency response procedures are effectively implemented in the event of an emergency.	Compliant / Achieved	<p>The following emergency response activities have been conducted in PRL 15 during the reporting period:</p> <ul style="list-style-type: none"> • H2S Emergency response drills conducted in September 2012 and October 2012 at Growler 9 and at the load out bay • Growler Flowline ER drills conducted July 2012
11.1 To minimise the impact as a result of an emergency situation or incident.	Emergency response exercises are aligned with credible threats and consequences identified in the risk assessment.	Compliant / Achieved	
11.2 To restore any damage that may occur as a result of an emergency situation.		Compliant / Achieved	

Management System Audits

A number of HSE Management System (HSE MS) compliance audits have been conducted in order to assess the level of compliance by the operation with selected elements of the Management System during the reporting period. The Growler Field HSE MS Audit was conducted on the 21st – 24th August 2012 by Senex in conjunction with DMITRE Senior Engineering and Petroleum Engineering technical staff. The identified deficiencies were subsequently transferred to the Action Item Tracking Register (AITR) for tracking and have since been closed out. Additional audits have been conducted of the Growler camp accommodation and contracted workover activities.

Report and Data Submissions

Pursuant to Regulation 33(2) (e)

Table 5 List of report and data submissions during current licence reporting year

Description	Due date	Date Submitted	Compliant/Non-Compliant
Growler 8 – Activity Notification to commission & operate Beam Pump	-	7/05/2012	Compliant
Growler Additional Campsite - Photos & Camp Layout & Further Information	-	8/05/2012	Compliant
Growler 10 Updated P&ID (GR-10-001)	-	10/05/2012	Compliant
Growler 10 Revised Flowline & WAC Map	-	10/05/2012	Compliant
Growler 3 Activity Notification to install & operate ESP in G3 (including workover)	-	10/05/2012	Compliant
Growler 10 - WAC Report A080174	-	10/05/2012	Compliant
Growler 10 - WAC Report C01024	-	10/05/2012	Compliant
Growler 3 ESP AN (on CD), Inlet Manifold HAZOP & MDR Pack, Analysis of Prod Facility	-	11/05/2012	Compliant
Growler ERP Exercise Report, Declaration and ERP	-	14/05/2012	Compliant
Growler 6 Draft Commissioning and PreCommissioning Plan for ESP	-	14/05/2012	Compliant
Growler 10 - Final Well Logs	28/05/2012	16/05/2012	Compliant
Growler 6 AN to Commission & Operate Flowline	-	16/05/2012	Compliant
Growler 9 - Well Completion Report	25/05/2012	17/05/2012	Compliant
Growler 3 ESP final AN documentation - DBD, Haz Area Drawing and P&IDs	-	17/05/2012	Compliant
Growler 3 ESP Final Environmental Assessment document for AN	-	18/05/2012	Compliant
Growler 6 AN for Flowline Connections to Storage Facility	-	31/05/2012	Compliant
AN for "designated Growler contractor campsite & laydown yard area"	-	6/06/2012	Compliant
PRL 15 Annual Report - Year 4	5/07/2012	3/07/2012	Compliant
Completion Schematics G3, G6 and G10		10/07/2012	Compliant
PRL 15 Growler 7 Well Completion Report - request for 14 day extension	-	13/07/2012	Compliant
ERP Exercise Report for Snatcher Flowlines & G6(x2),9,11 & 7 and Declaration	-	24/07/2012	Compliant
AN for additional facilities on Growler 9 Laydown Yard Area	-	25/07/2012	Compliant
G6, G9, G7, G11 & Jaguar 1 End of Well Drilling Reports	-	26/07/2012	Compliant
Cased Hole Activity Report Q2 2012	31/07/2012	31/07/2012	Compliant

Description	Due date	Date Submitted	Compliant/Non-Compliant
Growler 3 Cased Hole Logs (SBT,GR & CCL)	28/07/2012	31/07/2012	Non-compliant
ERP Exercise Report for G3, 7 & 8 dated 29 July 2012	-	1/08/2012	Compliant
Request for amended to construction approval for Tindilpie Crossing in AAL 156	-	17/08/2012	Compliant
Growler 2 Core Photos, Mirage 2 Core Photos & G2 Well Logs (per Alan's request)	-	17/08/2012	Compliant
Growler 5 Workover AN	-	20/08/2012	Compliant
Growler 5 AN for ESP Installation	-	21/08/2012	Compliant
Growler 8 WCR	23/08/2012	24/08/2012	Non-compliant
Growler Designated Campsite - Copies of WAC x 2 & NOES	-	3/09/2012	Compliant
AN for Growler 10 Flowline - Commission & Operate	-	7/09/2012	Compliant
AN for Comm & Op Growler Additional Storage Facility	-	11/09/2012	Compliant
AN for Comm & Op Growler 6 Connections to Facility	-	11/09/2012	Compliant
Growler 4 Relocated Flowline MOC & Hydrotest & Comm Procedure	-	12/09/2012	Compliant
Growler 4 Further information re: MOC & Rehab Process (as requested by DMITRE)	-	13/09/2012	Compliant
Request to confirm docs on CD for AN for G10 flowline comm & Op	-	13/09/2012	Compliant
Growler HSE MS Audit Report	-	25/09/2012	Compliant
Updated Comm Plans for Growler BSF & G6 Connections to BSF (re: H2S issues)	-	26/09/2012	Compliant
Kanowana 3D Seismic Program - Initial Activity Notification	-	3/10/2012	Compliant
Growler 10 Pump - AN to Commission and Operate	-	3/10/2012	Compliant
Kanowana Seismic Program - Shape file	-	4/10/2012	Compliant
Growler 10 Pre-Com Checklists (completed)	-	4/10/2012	Compliant
HSSE Bridging Document and letter confirming new seismic program name	-	9/10/2012	Compliant
Snatcher 3D AN - Enviro Assessment and Enviro Management Plan	-	10/10/2012	Compliant
Growler 10 Well Completion Report	11/10/2012	11/10/2012	Compliant
Revised Snatcher Seismic HSSE Bridging document	-	12/10/2012	Compliant
MOC for Lignum Survey & Invitation to Induction	-	5/11/2012	Compliant
Tindilpie Crossing - Request for extension and amended detail design drawings	-	15/11/2012	Compliant
Activity Notification for Growler 5 Workover	-	30/11/2012	Compliant
Growler Incident Report (Vehicle)	-	3/12/2012	Compliant
Growler 5 - Notification of commencement date as per approval condition	-	7/12/2012	Compliant

Description	Due date	Date Submitted	Compliant/Non-Compliant
Growler PPL Application (PRL 15) signed by all parties	-	14/12/2012	Compliant
Growler 5 Downhole Schematic	10/02/2013	7/01/2013	Compliant
Lignum Seismic Pgrm - MOC for additional seismic area to be included		14/01/2013	Compliant
Lignum Weekly Reports (last 2 December and first 2 January Reports)		14/01/2013	Compliant
Q4 2012 Quarterly Cased Hole Activity Report	31/01/2013	24/01/2013	Compliant
Final construction photos of the Tindilpie Crossing	-	24/01/2013	Compliant
Request to amend G5 completion approval to include G5 ESP installation	-	4/02/2013	Compliant
Hydrotest Report for Growler 5 Flowline (condition of approval)	-	11/02/2013	Compliant
Growler-10 workover AN	-	13/02/2013	Compliant
AN to Commission and Operate the Growler 5 ESP	-	15/02/2013	Compliant
Notice of commencement of activity - Growler 5 ESP Comm & Op	-	20/02/2013	Compliant
PRL 15 Renewal Application	5/03/2013	5/03/2013	Compliant
Missing Lignum Seismic Survey Reports (final 3 reports)		25/03/2013	Compliant
Updated AITR extract (re. Enviro Improvement Notice) & update re. Growler Soil Rehab	-	26/03/2013	Compliant
Monthly Production Reports: Growler-1, Growler-2, Growler-3, Growler-4, Growler-5, Growler-6, Growler-7, Growler-8, Growler-9, Growler-10, Growler-11	2m after end of prod month	2m after end of prod month	Compliant

Incidents

Pursuant to Regulation 33(2) (f)

Table 6 List of incidents during current licence reporting year

Date of Incident	Activity	Incident Description	Type of Loss	Action to Rectify & Effectiveness of Action	Date Reported / Reported to Whom
09/08/2012	Vehicle Incident / Environmental Incident	Truck and trailer was transporting Crude from Growler to Moomba. As the driver was trying to avoid pot holes in the access road at Growler, the rear trailer overturned causing crude to be spilt onto the road from the trailer. DMITRE Reportable Incident	Oil spill – approximately 200 litres of crude	Identify areas of Growler Access Road in need of repair / maintenance and complete Review safety signage and add where required Renewed awareness of road hazards amongst drivers via a Senex Safety Alert KJM invited to attend weekly safety meeting Treatment / disposal of contaminated soil Soil testing at accident area Review Oil Spill Response Procedure Review response to incident Repair truck speedometer	Reported on 09/08/12 to Health and Safety Manager GM HSSE & Drilling Reported to DMITRE Incident Investigation report provided to DMITRE Reported in 2012 Q3 DMITRE Quarterly Incident Report
22/08/2012	Environmental	Growler 9 fuel hose developed pin hole and started leaking diesel on PJU base and Ground. DMITRE Reportable Incident	Oil spill – approximately 10 litres of crude	Contaminated soil removed to be disposed of at approved facility Faulty fuel line changed out and configuration changed to avoid similar incident. Other similar units checked and fuel line configuration changed.	Reported on 22/08/12 to Health and Safety Manager Reported in 2012 Q3 DMITRE Quarterly Incident Report

16/09/2012	Environmental	Hydrogen Sulphide detected at Growler facility and wells.	Hydrogen Sulphide detected	<p>Risk assessment has been completed for all Growler operations considering impact of H2S</p> <p>H2S Safety Procedure implemented</p> <p>Safe operating constraints for Growler production established</p> <p>H2S training and SCBA training provided to all staff</p> <p>Induction procedure upgraded</p> <p>Hardwired gas detection installed in tank farm and load-out bay</p> <p>All works in hazardous areas to be undertaken with gas monitoring and "buddy" system</p> <p>Engineering consultant confirmed electrical hazardous areas are appropriate to use as H2S hazardous areas</p> <p>SCBA available on site and used for key activities</p> <p>Monitoring of H2S concentrations undertaken and recorded</p>	<p>Reported on 16/09/12 to Health and Safety Manager</p> <p>Reported in 2012 Q3 DMITRE Quarterly Incident Report</p>
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Threat Prevention

Pursuant to Regulation 33(2) (g)

There were no perceived threats and no action taken.

Future Work Program

Pursuant to Regulation 33(2) (h)

Work planned in PRL 15 during Licence Year 1 (Term 2):

- Geophysical and Geological Studies
- Two appraisal wells are planned for the coming year in PRL15. These wells will be approximately 1800m deep and should take approximately 14 days to drill and suspend. Additional development drilling may occur during the year should suitable locations be identified.

5 Expenditure Statement

Pursuant to Regulation 33(3)

Please refer to Appendix 1 for the expenditure statement for the current reporting period.