TOTAL Exploration And Production UK Limited

Glenlivet Field Increase in Production
Environmental Statement Summary

To: Jonathan Ward
From: Julie Cook
Date: 08 October 2018

<table>
<thead>
<tr>
<th>ES Title:</th>
<th>Glenlivet Production Increase Environmental Statement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Operator:</td>
<td>TOTAL Exploration and Production UK Limited</td>
</tr>
<tr>
<td>Consultants:</td>
<td>N/A</td>
</tr>
<tr>
<td>Field Group:</td>
<td>OGA, Northern North Sea and West of Shetland</td>
</tr>
<tr>
<td>ES Report No:</td>
<td>D/4223/2018</td>
</tr>
<tr>
<td>ES Date:</td>
<td>October 2018</td>
</tr>
<tr>
<td>Block Nos:</td>
<td>206/04 &amp; 214/30a</td>
</tr>
<tr>
<td>Development Type:</td>
<td>Increase in Production</td>
</tr>
</tbody>
</table>

Project Description

TOTAL Exploration and Production UK Limited (TOTAL) submitted an Environmental Statement (ES) to the BEIS Offshore Petroleum Regulator for Environment and Decommissioning (OPRED) to support an application for an increase in production from the Glenlivet field.

The Glenlivet field is located in Blocks 206/04 and 214/30a, approximately 70 kilometres (km) northwest of the Shetland Isles and 97 km east of the UK / Faroes median line. The field is located in a water depth of approximately 435 metres (m). The Glenlivet field development is linked with the Edradour field development, located approximately 17 km away, and consists of two production wells connected to a manifold and tied-back to the existing Laggan-Tormore subsea production facilities via a subsea pipeline. Control of the Glenlivet facilities is via an umbilical from Edradour.

Glenlivet and Edradour gas and condensate are produced through the Laggan-Tormore subsea production facilities and exported to the onshore Shetland Gas Plant (SGP). Gas and condensate are then routed via the Shetland Island Region Gas Export (SIRGE) pipeline to the St Fergus Terminal in northeast Scotland.

Following a successful drilling campaign and tie-in to the Laggan-Tormore subsea production facilities, first gas from the Glenlivet field was achieved ahead of schedule in September 2017 and production is now anticipated to be greater than estimated. The anticipated increase in production exceeds the EIA Directive Annex I thresholds of 500,000 m³ of gas/day and 500 tonnes of condensate/day, and an ES was therefore required.
Key Potential Environmental Impacts

The ES identified the following key potential environmental impacts:

**Marine discharges:** Changes to production chemical use and discharge relating to the production increase are expected to be minor, and no significant impacts are anticipated.

**Atmospheric emissions:** Changes in atmospheric emissions relating to the production increase are also anticipated to the minor and no significant impacts are anticipated.

**Accidental events:** The risk of an accidental event will not be significantly affected by the increase in production, and appropriate control measures are in place to minimise the risk and respond to any hydrocarbon spills.

There are no changes to existing infrastructure, and physical presence and disturbance and potential noise impacts are therefore irrelevant.

Key Environmental Sensitivities

The ES identified the following key environmental sensitivities:

**Fish Stocks:** The Glenlivet field is located within a spawning ground for Norway pout, and within nursery areas for blue whiting, cod, European hake, ling, Norway pout, whiting, anglerfish, herring, mackerel, spurdog and common skate. However, the spawning and nursery areas are extensive and the proposals are unlikely to have any impact.

**Seabirds:** Block 206/4 has low to medium seabird oil sensitivity for most of the year, although there is high sensitivity during March and very high sensitivity during October. Block 214/30a has low seabird sensitivity throughout the year. It is considered that there are sufficient mitigation measures in place to prevent accidental spills that could have a significant impact on seabirds, and an Oil Pollution Emergency Plans is in place for the production operations.

**Annex I Habitats:** No Annex I habitats have been identified in the vicinity of the Glenlivet field.

**Annex II Species:** Atlantic white-sided dolphin, bottlenose dolphin, common dolphin, Risso’s dolphin, white-beaked dolphin, blue whale, fin whale, humpback whale, killer whale, long-finned pilot whale, minke whale, northern bottlenose whale, sei whale and sperm whale have all been recorded in the general area. Sightings are low from November to February, increase during March to June, and are high from July to October. Grey and harbour seals are widely distributed around the Scottish mainland and island coastlines, but they are unlikely to travel great distances offshore. No significant adverse effects on marine mammals are anticipated.

**Protected Sites:** The Glenlivet field is located at the eastern edge of the Faroe-Shetland Sponge Belt Nature Conservation Marine Protected Area (NC MPA), is approximately 54 km south of the North-east Faroe Shetland Channel NC MPA, and is approximately 84 km northwest of the Papa Stour Special Area of Conservation (SAC). No effects on these sites are anticipated.

**Other Users of the Sea:** Fishing effort is low throughout the year. Landings are primarily demersal species. The area is also categorised as low shipping density, although Block 206/04
is an area of concern for the MoD. No significant impacts on other users of the sea are anticipated.

**Cumulative/Transboundary impacts:** No significant in-combination, cumulative or transboundary effects are anticipated. In the event that a significant spill crosses a median line, TOTAL would liaise with the relevant authorities.

**Key Mitigation Measures (including environmental or monitoring conditions)**

The potential environmental impacts of the production increase was considered to be minimal, and no specific mitigation measures were warranted.

**Consultation**

**Consultees:** The Joint Nature Conservation Committee (JNCC), Marine Scotland (MS), the Maritime and Coastguard Agency (MCA) and the Ministry of Defence (MoD) were consulted on the proposals. The Health and Safety Executive (HSE) was also notified of the proposals, and the ES was subject to Public Notice.

No objections were received from the consultees and no representations were received in response to the Public Notice.

**Further Information**

It was unnecessary to request any additional information to inform the BEIS OPRED decision.

**Determination**

Following review of the ES, BEIS OPRED is satisfied that the proposed increase in production will not have a significant adverse impact on the receiving environment or the living resources it supports, or on any protected habitats or species or other users of the sea.

**Recommendation**

BEIS OPRED is content that there are no objections to the proposals, and agrees to the OGA issuing the necessary consent for the proposals.

---

Jonathan Ward
Director, Offshore Environmental Operations
BEIS Offshore Petroleum Regulator for Environment and Decommissioning

8/10/14