# PL1080

# License status report

## Summary

PL1080 was applied for and granted in APA 2019. License acreage covers part of clocks 7220/2 and 7220/5 in the Barents Sea. The geological setting is mainly within the Bjørnøyrenna Fault Complex similar to the geological setting of the Johan Castberg field, with well-defined rotated fault blocks. However, present day burial depth is significantly shallower across the area of PL1080, and young erosion is affecting some of the Jurassic and Triassic reservoirs. Trap seal is hence regarded as the key risk in this area where fault seal is evaluated to be the main failure mechanism.

Exploration well 7220/2-2 (Snøras) was drilled in PL1080 in 2024. The well was dry, but had hydrocarbon traces, and failure is related to severe leakage of the trap through faulted cap seal. Additional exploration well drilled in this area is well 7220/2-1 (Isfjell gas discovery), drilled in former PL714 in 2014. The well results from the area north of Johan Castberg (Isfjell, Snøras), and also from well 7220/5-4 (Skred) in neighboring PL532, point to the higher probability for gas than oil in the PL1080 acreage (exception is Istapp having double flat spot) and underfilled structures due to fault leakage or shallow overburden. Hence, any potential discovery would most probably be a non-economical volume of gas. Moreover, technical-economical assessment of the most interesting remaining prospect, Istapp, concluded that even in an optimistic case, the project would not provide a robust economic outcome.

## Table of contents

**1 License history ..... 6**
**2 Data overview ..... 8**
2.1 Seismic database ..... 8
2.2 Well data ..... 9
**3 Review of geological and geophysical studies ..... 12**
**4 Prospect update report ..... 12**
**5 Technical evaluation ..... 21**
**6 Conclusion ..... 21**
**7 Appendix ..... 22**
**8 References ..... 23**

## Table of figures:

*Figure 1.1 License map showing PL1080 and surrounding licenses, wells and discoveries. ..... 7*

*Figure 2.1 3D seismic surveys and CSEM data used in the evaluation of PL1080. 2D seismic surveys are not shown in this figure but are listed in Table 2.1. ..... 9*

*Figure 2.2 Wells used in the evaluation of the prospectivity in the PL1080 area shown on the Barents Sea structural map. ..... 10*

*Figure 4.1 Overview map of prospects and leads as applied for in APA 2019, including Isfjell discovery. ..... 14*

*Figure 4.2 Prospectivity in PL1080. ..... 17*

*Figure 4.3 a) Top Stø depth map showing the Snøras well (7220/2-2) location, and Snø Knurr prospect outline (yellow outline), Isfjell gas discovery (red outline). b) Seismic section through the Snøras well and Snø Knurr prospect. Seismic line is orientated A-A' and its location is marked by the yellow line in Figure 4.3 a). ..... 19*

*Figure 4.4 a) Top Realgrunnen depth map showing the gas-oil contact (red outline) and oil-water contact (green outline) in the Istapp prospect. b) Top Realgrunnen amplitude map extracted from fluid cube, showing the gas-oil contact (red outline) and oil-water contact (green outline) in the Istapp prospect. c) Seismic section through the Istapp prospect. Seismic line is orientated A-A' and its location is marked by the yellow line in Figure 4.4 a) ..... 20*

## Table of tables:

*Table 2.1. Overview of 2D and 3D seismic database.* ..... 8

*Table 2.2. PL1080 common well database.* ..... 11

*Table 4.1. Resource potential as applied for in APA 2019.* ..... 15

*Table 4.2. Resource potential in PL1080.* ..... 18

# 1 License history

| | | |
|---|---|---|
| **License:** | PL1080 | |
| **Awarded:** | 14.02.2020 | |
| **License period:** | Initial period: | 14.02.2027 |
| | Initial extended: | 14.02.2028 |
| | Initial extended: | 14.02.2029 |
| **License group:** | Equinor | 46.3 % (Operator) |
| | Vår Energi ASA | 30 % |
| | Petoro AS | 23.7 % |
| **License area:** | 72 km2 | |
| **Work program:** | 14.02.2022 G&G studies and 3D seismic acquisition | |
| | 14.02.2022 DoD (Exploration well 7220/2-2 drilled June 2024) | |
| | 14.02.2024 BoK – One year granted | |
| | 14.02.2025 BoK – One additional year granted | |
| | 14.02.2026 BoK– Drop | |

| | | |
|---|---|---|
| **License meeting held:** | 29.04.2020 | ECMC meeting |
| | 05.11.2020 | ECMC meeting |
| | 30.09.2021 | EC - work meeting |
| | 15.11.2021 | ECMC meeting |
| | 15.03.2022 | ECMC meeting |
| | 07.06.2022 | ECMC meeting |
| | 23.11.2022 | ECMC meeting |
| | 22.10.2024 | EC - work meeting |
| | 26.11.2024 | ECMC meeting |
| | 13.03.2025 | EC meeting |
| | 26.11.2025 | ECMC meeting |

**Reason for surrender:**

Exploration well 7220/2-2 (Snøras) was drilled in PL1080 in 2024 (Figure 1.1). The well was dry with minor hydrocarbon traces. Additional exploration wells drilled in the area north of Johan Castberg include 7220/5-4 (Skred), drilled in 2025 in the northern part of the neighbouring PL532, and well 7220/2-1 (Isfjell), drilled in 2014 in former PL714, both resulted in small gas discoveries. These results indicate that the prospects in the PL1080 area are more likely to contain rather gas than oil. Moreover, the remaining prospects are associated with high trap seal risk and potentially leaked structures, as observed in Snøras, Skred and Isfjell.

Technical-economical assessments lead to the conclusion that there is low probability of a commercial discovery in the PL1080 area that could be developed either as a stand-alone, as a part of a cluster development, or as a tie-in candidate to the Johan Castberg FPSO. The Isfjell gas discovery might be considered for future development, alongside other small gas discoveries in the Greater Johan Castberg area, when there will be available gas capacity on the FPSO. The remaining prospects in PL1080 are therefore not considered candidates for future exploration drilling, and the partnership has decided to surrender the license.

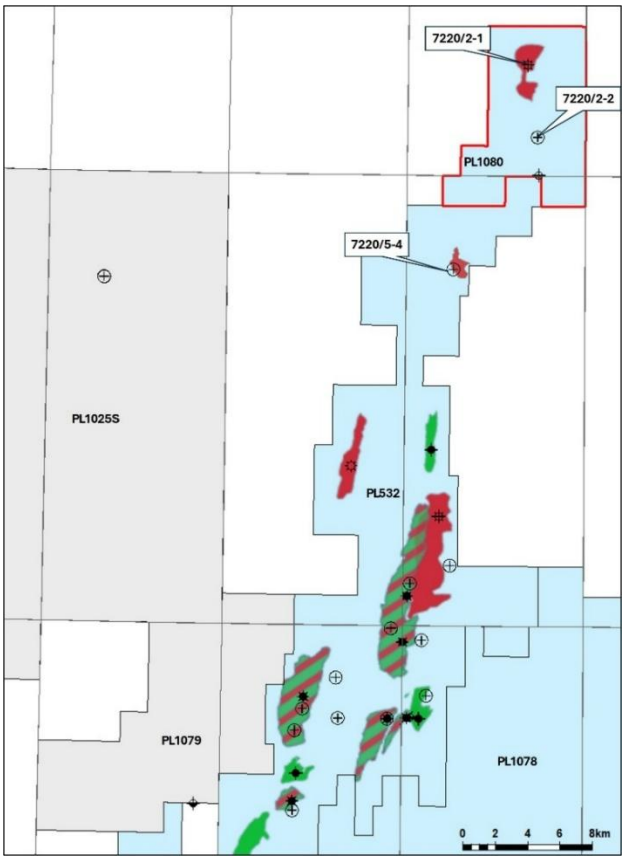



**Figure 1.1** License map showing PL1080 and surrounding licenses, wells and discoveries.

# 2 Data overview

## 2.1 Seismic database

The seismic database comprises a selection of 2D and 3D seismic data listed in Table 2.1 and shown in Figure 2.1. In the APA 2019 evaluation, the interpretation was mainly based on the merged 3D survey ST13M07 (consisting of WG08, WG09, LN11003 and SG9810), supported by limited regional 2D data where the 3D coverage was absent.

Following APA 2019 (Equinor, 2019), the partnership in PL1080 acquired very high-quality 3D seismic survey CGG19002, which has been used in the evaluation of the prospectivity. In addition, the site survey EQ22312 3D and ultra-high-resolution lines EQ22312 2D acquired in 2022, cover part of the license.

CSEM data from the 2008 survey BSMC08S provided additional support (Figure 2.1). However, this data has poor signal to noise ratio, and the sampling is course relative to the small targets in PL1080.

**Table 2.1** Overview of 2D and 3D seismic database.

| Seismic Survey | 2D/3D | Year | Quality | NPDID |
|---|---|---|---|---|
| ST13M07 | 3D | 2013 | Good | |
| WG08 (Input to ST13M07) | 3D | 2008 | Good | 4559 |
| WG0901 (Input to ST13M07) | 3D | 2009 | Good | 7057 |
| LN11003 (Input to ST13M07) | 3D | 2011 | Good | 7454 |
| SG9810 (Input to ST13M07) | 3D | 1998 | Good | 3942 |
| WG11001 | 3D | 2011 | Good | 7453 |
| DN14001 | 3D | 2014 | Good | 8043 |
| CGG19002 | 3D | 2019 | Excellent | 9001 |
| ST12324 | 2D | 2012 | Good | 7677 |
| ST14302 (UHR & HR) | 2D | 2014 | Good | 7964 |
| NBR06 | 2D | 2006 | Good | 4365 |
| NBR07 | 2D | 2007 | Good | 4451 |
| NBR08 | 2D | 2008 | Good | 4573 |

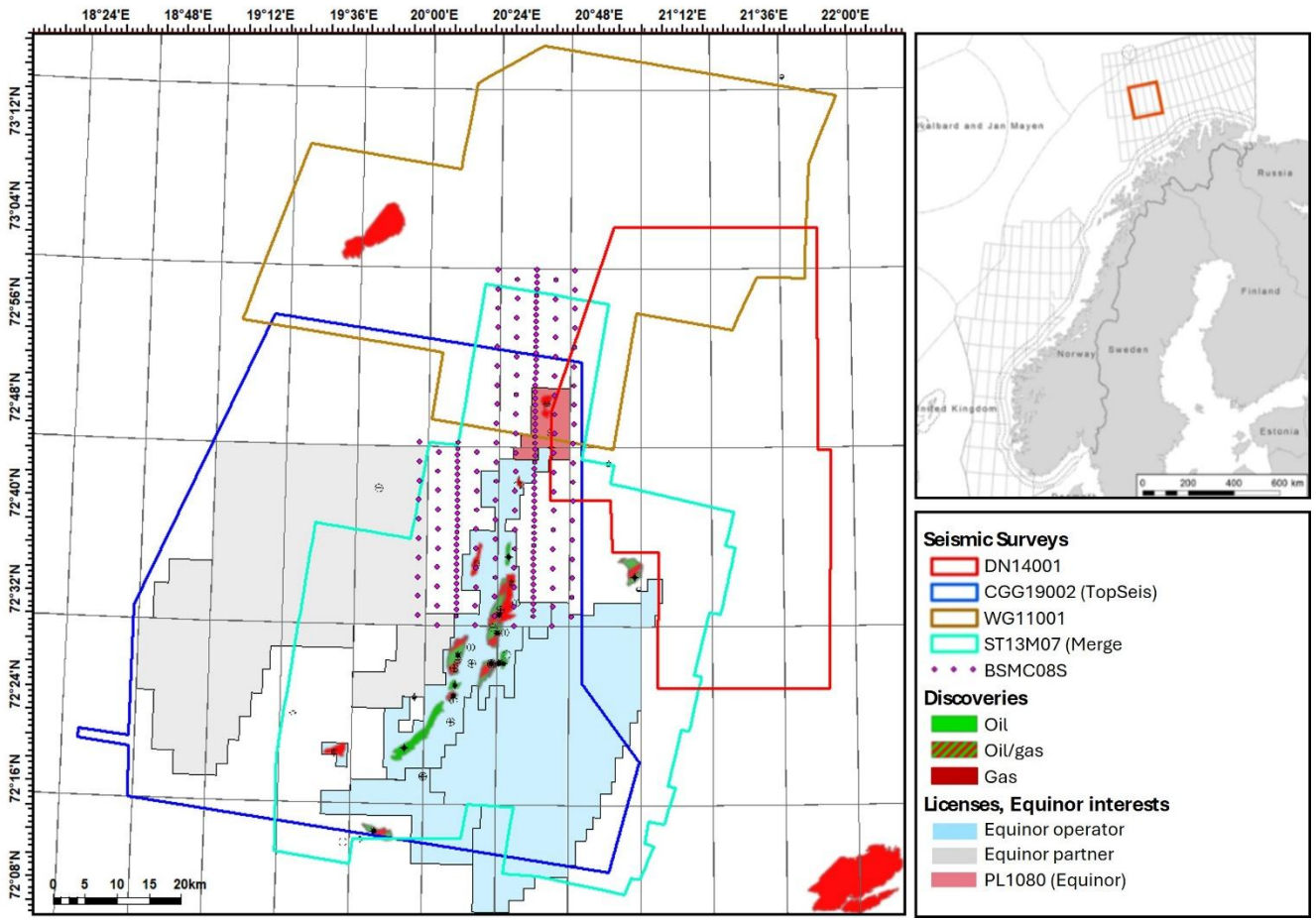



**Figure 2.1** 3D seismic surveys and CSEM data used in the evaluation of PL1080. 2D seismic surveys are not shown in this figure but are listed in Table 2.1.

## 2.2 Well data

Wells used in the technical evaluation and resource assessment are highlighted in Figure 2.2 and summarized in Table 2.2. Partnership has access to all listed wells.

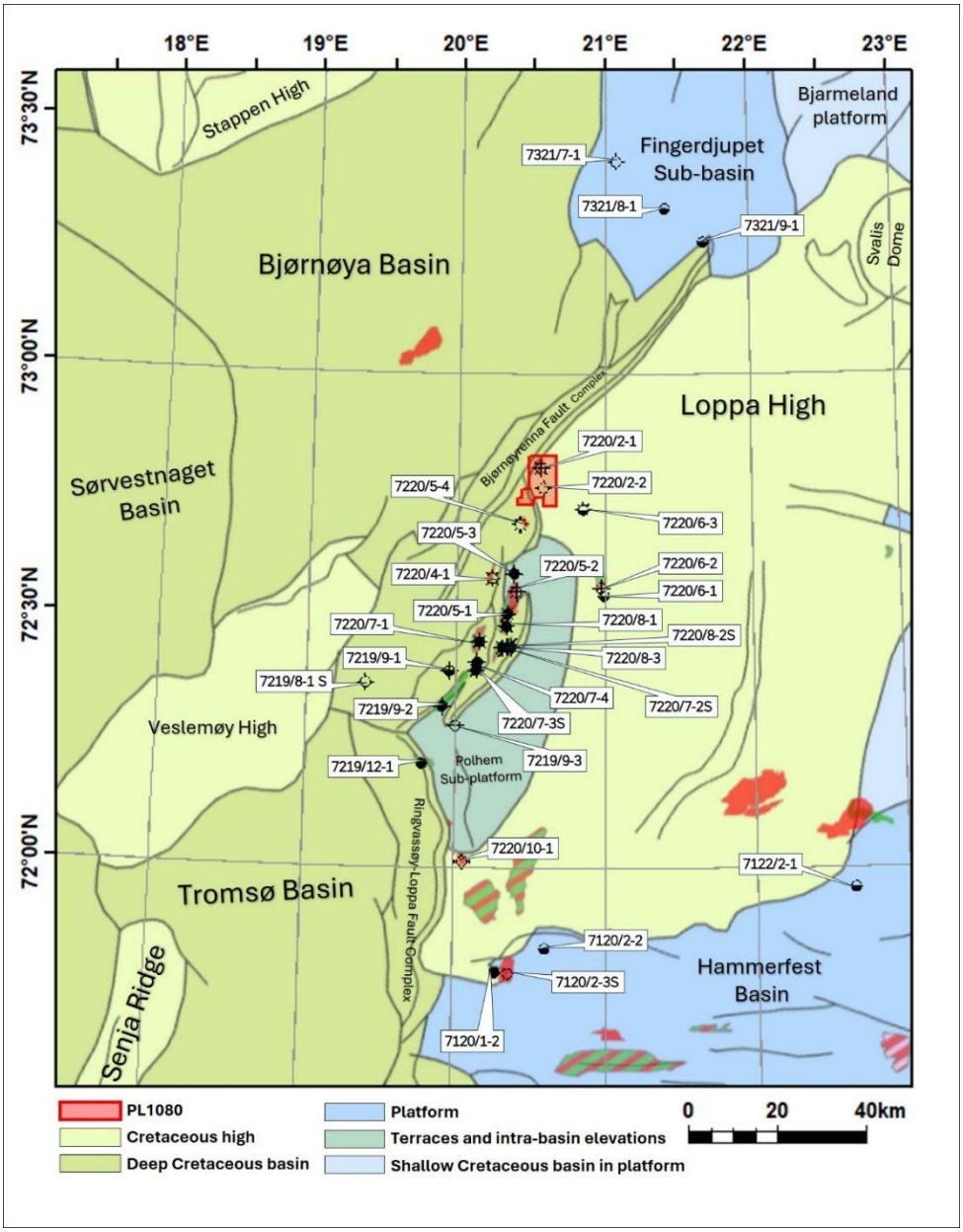



**Figure 2.2** Wells used in the evaluation of the prospectivity in the PL1080 area shown on the Barents Sea structural map.

**Table 2.2** PL1080 common well database.

| Well name | Year | Operator | Status | Age at TD | NPDID |
|---|---|---|---|---|---|
| 7220/5-4 | 2025 | Equinor AS | Gas | Late Triassic | 10292 |
| 7220/2-2 | 2024 | Equinor AS | Shows | Early Jurassic | 10065 |
| 7220/8-2 S | 2022 | Equinor AS | Oil | Late Triassic | 9535 |
| 7220/8-3 | 2022 | Equinor AS | Oil/gas | Late Triassic | 9551 |
| 220/7-4 | 2021 | Equinor AS | Oil | Early Jurassic | 9220 |
| 7219/9-3 | 2020 | Equinor AS | Dry | Late Triassic | 8960 |
| 7220/5-3 | 2018 | Equinor AS | Oil | Late Triassic | 8539 |
| 7220/6-3 | 2017 | Lundin Norway AS | Shows | Carboniferous | 8203 |
| 7219/9-2 | 2017 | Statoil Petroleum AS | Oil | Middle Triassic | 8193 |
| 7219/12-1 | 2017 | Lundin Norway AS | Oil/gas | Late Triassic | 8024 |
| 7220/7-3 S | 2014 | Statoil Petroleum AS | Oil/gas | Late Triassic | 7414 |
| 7220/2-1 | 2014 | Statoil Petroleum AS | Gas | Late Triassic | 7558 |
| 7220/4-1 | 2014 | Statoil Petroleum AS | Gas | Middle Triassic | 7307 |
| 7220/6-2 | 2015 | Lundin Norway AS | Shows | Middle Triassic | 7748 |
| 7220/5-2 | 2013 | Statoil Petroleum AS | Gas | Early Jurassic | 7166 |
| 7220/7-2 S | 2013 | Statoil Petroleum AS | Oil/gas | Late Triassic | 7252 |
| 7220/5-1 | 2012 | Statoil Petroleum AS | Oil/gas | Late Triassic | 6775 |
| 7220/10-1 | 2012 | Eni Norge AS | Gas | Late Triassic | 7015 |
| 7120/2-3 S | 2011 | Lundin Norway AS | Gas | Late Triassic | 6592 |
| 7220/8-1 | 2011 | Statoil Petroleum AS | Oil/gas | Late Triassic | 6484 |
| 7220/7-1 | 2011 | Statoil Petroleum AS | Oil/gas | Late Triassic | 6756 |
| 7220/6-1 | 2005 | Norsk Hydro Produksjon AS | Shows | Basement | 5039 |
| 7122/2-1 | 1992 | Norsk Hydro Produksjon AS | Dry | Middle Triassic | 2018 |
| 7219/8-1 S | 1992 | Saga Petroleum | Dry | Early Jurassic | 2031 |
| 7120/2-2 | 1991 | Norsk Hydro Produksjon AS | Shows | Middle Triassic | 1690 |
| 7120/1-2 | 1989 | A/S Norske Shell | Oil | Late Triassic | 1366 |
| 7219/9-1 | 1988 | Norsk Hydro Produksjon AS | Shows | Late Triassic | 1138 |
| 7321/7-1 | 1988 | Mobil Exploration Norway INC | Shows | Middle Triassic | 1284 |
| 7321/9-1 | 1988 | Norsk Hydro Produksjon AS | Shows | Late Triassic | 1339 |
| 7321/8-1 | 1987 | Norsk Hydro Produksjon AS | Shows | Late Permian | 1070 |

## 3 Review of geological and geophysical studies

Following geological, geophysical and well feasibility work has been performed in PL1080:

- Geological and geophysical evaluation of license prospectivity at multiple stratigraphic levels based on the acquired very high-quality 3D seismic survey CGG19002 and also on its reprocessed version CGG19002EQR23.
- Acquisition of site survey EQ22312 3D and ultra-high-resolution lines EQ22312 2D acquired in 2022.
- Drilling of exploration well 7220/2-2 (Snøras) in June 2024. The well was dry with minor hydrocarbon traces.
- Post-well analysis of the Snøras well, including geological and geophysical evaluation of the well result.
- Update of license prospectivity based on the Snøras well results, including additional results from well 7220/5-4 (Skred, a small gas discovery) drilled in neighbouring PL532 in July 2025, also including CSEM analysis.
- Well feasibility studies for potential drilling of shallow prospects.
- Re-evaluation of potential area development solution for the remaining prospectivity, based on lack of hydrocarbons in Snøras (PL1080), and the absence of a previous considered common development solution with Skred (PL532). The business case was updated accordingly.

## 4 Prospect update report

PL1080 covers parts of blocks 7220/2 and 7220/5 in the Barents Sea. The structural setting is mainly within the Bjørnøyrenna Fault Complex and represents a continuation of play models proven by wells in the Greater Johan Castberg area (Figure 2.2). A small part of the license also covers the western tip of the Loppa High. The prospectivity is located within a tie-back distance to the Johan Castberg FPSO, approximately 35 km. The prospect portfolio was primarily driven by two main prospects, Snø Sweetspot and Brefall Snadd West, supported by several smaller prospects and leads (Figure 4.1 and Table 4.1).

The Snø Sweetspot prospect represented a combination trap concept, with juxtaposition of the Upper Triassic Snadd Formation reservoir and Lower Cretaceous Kolmule Formation reservoir across a major north–south trending fault, dividing the prospect into two segments. A double flat event was observed in the seismic data, with depth-conformant amplitude shut-off across both the western (Carnian) and eastern (Lower Cretaceous) segments. Snø Sweetspot was assessed as a robust prospect, with mean recoverable tie-back oil volumes of 6.44 MSm³ and a 36 % probability of discovery. The key risks were primarily related to trap seal integrity, due to very shallow burial depth and reliance on the Quaternary sediments as top seal, as well as moderate uncertainty in reservoir quality.

During the subsequent license work, Snø Sweetspot was re-evaluated and split into two different prospects: Snø Carnian and Snø Knurr (Figure 4.2, Figure 4.3). This was driven by different reservoir formations, probable lack of communication across the common fault and absence of a common hydrocarbon contact The Snø Carnian has a 27 % probability of discovery (including DHI upgrade), probability for oil of 27 % for most segments, and an unrisked mean aggregated recoverable oil volume of 0.98 $MSm^3$. The other prospect, Snø Knurr, has similar low oil volume potential, with an unrisked mean aggregated recoverable oil volume of 1.06 $MSm^3$. In addition, Snø Knurr has low probability of discovery 12 %, including DHI upgrade, and a probability for oil of 6 % (Figure 4.2 and Table 4.2.).

The Brefall Snadd West prospect comprised a three-way structural closure in the Upper Triassic Snadd Formation, situated on the same fault block as several discoveries in the Johan Castberg area. Brefall Snadd West was assessed to have mean recoverable oil volumes of 3.26 $MSm^3$ and a 36 % probability of discovery. The primary geological risk was related to fault seal integrity, and limited observations of direct fluid indicators resulted in a downgrade of the a priori geological risk, reflecting poor geophysical support. Later in the license period, the prospect was renamed Brefall. Further evaluation confirmed lack of geophysical support and reservoir risk which caused reduction in oil volume potential (mean recoverable volumes of 1.75 $MSm^3$), and a 38 % probability of discovery (including DHI downgrade) and probability for oil 16 % (Figure 4.2 and Table 4.2.).

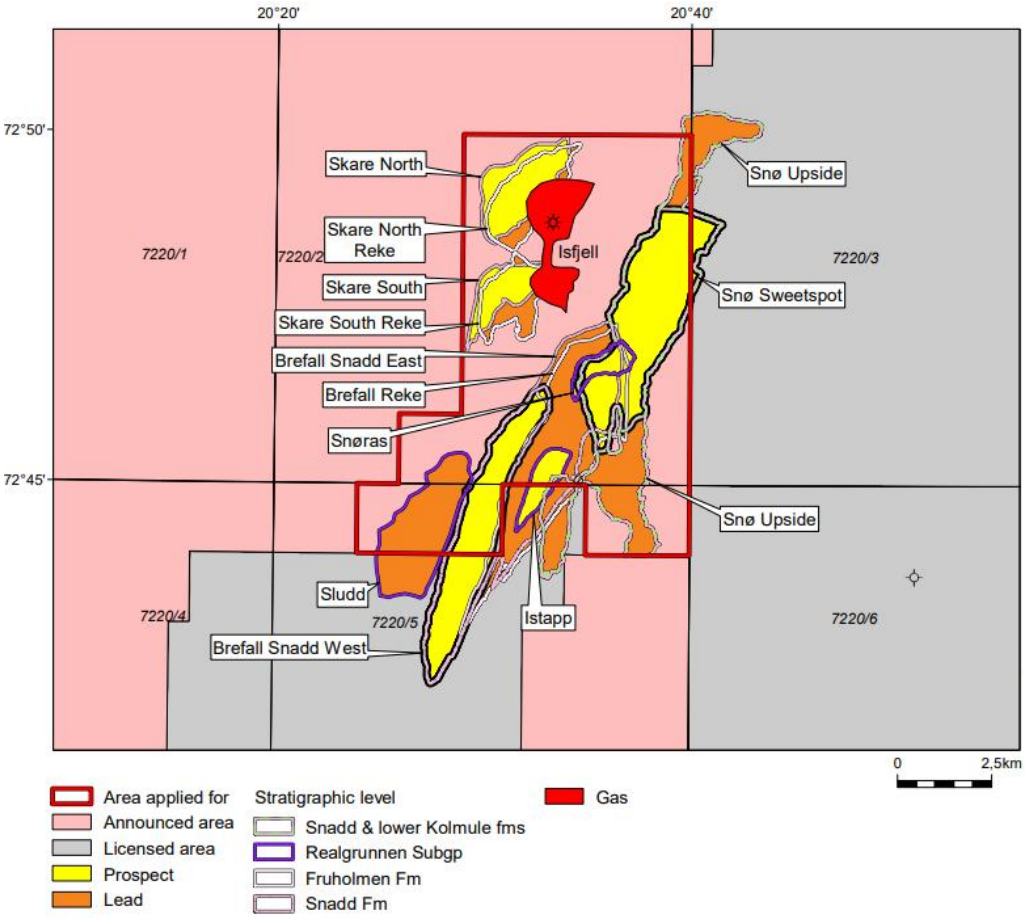



**Figure 4.1** Overview map of prospects and leads as applied for in APA 2019, including Isfjell discovery.

**Table 4.1** Resource potential as applied for in APA 2019.

| Discovery/ Prospect/ Lead name [1] | D/ P/ L [2] | Case (Oil/ Gas/ Oil&Gas) [3] | Unrisked recoverable resources [4] | | | | | | Probability of discovery [5] (0.00 - 1.00) | Resources in acreage applied for [%] [6] (0.0 - 100.0) | Reservoir | | Nearest relevant infrastructure [8] | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Oil [$10^6Sm^3$] (>0.00) | | | Gas [$10^9Sm^3$] (>0.00) | | | | | Litho-/ Chrono-stratigraphic level [7] | Reservoir depth [m MSL] (>0) | Name | Km (>0) |
| | | | Low (P90) | Base (Mean) | High (P10) | Low (P90) | Base (Mean) | High (P10) | | | | | | |
| Snø Sweetspot | P | Oil&Gas | 2,72 | 6,44 | 10,50 | 0,22 | 0,80 | 1,31 | 0,36 | 90,0 | Snadd Fm/Upper Triassic & Kolmule Fm/Lower Cretaceous | 512 | Johan Castberg | 38 |
| | | Oil | 2,75 | 6,76 | 11,90 | 0,07 | 0,22 | 0,37 | 0,01 | 90,0 | Snadd Fm/Upper Triassic & Kolmule Fm/Lower Cretaceous | 512 | Johan Castberg | 38 |
| | | Gas | 0,01 | 0,02 | 0,03 | 0,75 | 1,53 | 2,84 | 0,01 | 90,0 | Snadd Fm/Upper Triassic & Kolmule Fm/Lower Cretaceous | 512 | Johan Castberg | 38 |
| Brefall Snadd West | P | Oil&Gas | 1,02 | 3,26 | 6,50 | 0,22 | 0,33 | 0,46 | 0,10 | 80,0 | Snadd Fm/Upper Triassic | 1015 | Johan Castberg | 35 |
| | | Oil | 2,05 | 4,66 | 8,31 | 0,07 | 0,23 | 0,44 | 0,02 | 80,0 | Snadd Fm/Upper Triassic | 1015 | Johan Castberg | 35 |
| | | Gas | 0,51 | 1,14 | 2,04 | 0,01 | 0,02 | 0,04 | 0,01 | 80,0 | Snadd Fm/Upper Triassic | 1015 | Johan Castberg | 35 |
| Skare North | P | Oil | 2,08 | 3,68 | 5,49 | 0,11 | 0,20 | 0,29 | 0,09 | 100,0 | Snadd Fm/Upper Triassic | 976 | Johan Castberg | 38 |
| | | Gas | 0,01 | 0,02 | 0,03 | 0,62 | 1,07 | 1,59 | 0,21 | 100,0 | Snadd Fm/Upper Triassic | 976 | Johan Castberg | 38 |
| Skare South | P | Oil | 0,09 | 0,37 | 0,75 | 0,00 | 0,02 | 0,04 | 0,10 | 100,0 | Snadd Fm/Upper Triassic | 1060 | Johan Castberg | 36 |
| | | Gas | 0,00 | 0,00 | 0,00 | 0,03 | 0,11 | 0,22 | 0,23 | 100,0 | Snadd Fm/Upper Triassic | 1060 | Johan Castberg | 36 |
| Istapp | P | Oil | 0,31 | 0,63 | 1,02 | 0,01 | 0,03 | 0,04 | 0,41 | 50,0 | Realgrunnen Subgp/Lower-Middle Jurassic | 710 | Johan Castberg | 32 |
| | | Gas | 0,00 | 0,00 | 0,01 | 0,19 | 0,32 | 0,44 | 0,35 | 50,0 | Realgrunnen Subgp/Lower-Middle Jurassic | 710 | Johan Castberg | 32 |
| Snøras | P | Oil | 0,15 | 0,36 | 0,65 | 0,01 | 0,01 | 0,02 | 0,35 | 100,0 | Realgrunnen Subgp/Lower-Middle Jurassic | 643 | Johan Castberg | 35 |
| | | Gas | 0,00 | 0,00 | 0,00 | 0,09 | 0,16 | 0,27 | 0,30 | 100,0 | Realgrunnen Subgp/Lower-Middle Jurassic | 643 | Johan Castberg | 35 |
| Snø Upside | L | Oil&Gas | 1,33 | 3,52 | 6,00 | 0,03 | 0,30 | 0,56 | 0,26 | 70,0 | Snadd Fm/Upper Triassic & Kolmule Fm/Lower Cretaceous | 498 | Johan Castberg | 38 |
| | | Oil | 1,17 | 3,44 | 5,90 | 0,03 | 0,10 | 0,19 | 0,01 | 70,0 | Snadd Fm/Upper Triassic & Kolmule Fm/Lower Cretaceous | 498 | Johan Castberg | 38 |
| | | Gas | 0,00 | 0,01 | 0,01 | 0,26 | 0,83 | 1,27 | 0,01 | 70,0 | Snadd Fm/Upper Triassic & Kolmule Fm/Lower Cretaceous | 498 | Johan Castberg | 38 |
| Brefall Snadd East | L | Oil&Gas | 0,55 | 3,90 | 9,36 | 0,02 | 0,21 | 0,48 | 0,07 | 90,0 | Snadd Fm/Upper Triassic | 1319 | Johan Castberg | 36 |
| | | Oil | 1,05 | 4,24 | 9,53 | 0,04 | 0,21 | 0,47 | 0,02 | 90,0 | Snadd Fm/Upper Triassic | 1319 | Johan Castberg | 36 |
| | | Gas | 0,00 | 0,01 | 0,03 | 0,23 | 0,79 | 1,85 | 0,02 | 90,0 | Snadd Fm/Upper Triassic | 1319 | Johan Castberg | 36 |
| Brefall Reke | L | Oil&Gas | 0,61 | 3,30 | 7,76 | 0,03 | 0,26 | 0,34 | 0,05 | 90,0 | Fruholmen Fm/Upper Triassic | 931 | Johan Castberg | 36 |
| | | Oil | 1,41 | 4,17 | 8,58 | 0,06 | 0,19 | 0,40 | 0,01 | 90,0 | Fruholmen Fm/Upper Triassic | 931 | Johan Castberg | 36 |
| | | Gas | 0,00 | 0,01 | 0,03 | 0,36 | 0,86 | 1,86 | 0,02 | 90,0 | Fruholmen Fm/Upper Triassic | 931 | Johan Castberg | 36 |
| Skare North Reke | L | | | | | | | | | 100,0 | Fruholmen Fm/Upper Triassic | 858 | Johan Castberg | 38 |
| Skare South Reke | L | | | | | | | | | 100,0 | Fruholmen Fm/Upper Triassic | 879 | Johan Castberg | 36 |
| Sludd | L | | | | | | | | | 80,0 | Realgrunnen Subgp/Lower-Middle Jurassic | 1457 | Johan Castberg | 38 |

The Snøras prospect, described in the 22nd Licensing Round application (Statoil, 2012) and later referenced in APA 2019, became the main drilling target in this license. The exploration well 7220/2-2 tested the Snøras prospect in June 2024 but was dry (Equinor, 2024). Snøras was evaluated to be charged from the Isfjell discovery and/or from the Istapp prospect. The amplitude strength suggests presence of hydrocarbons up-dip of the Snøras well. Oil shows were found in the well. The main reason for Snøras failure is interpreted to be severe leakage of the Snøras trap through the faulted cap seal (provided by the Kolmule Formation) along the western escarpment, indicated by observations of gas leakage in the seismic at the Upper Regional Unconformity in the southern area. Trap seal was identified as the main pre-drill risk. This conclusion does not exclude potential charge of the Snø Knurr prospect via Snøras structure (Figure 4.3).

The only remaining prospect of interest in PL1080 is Istapp located in the southernmost part of this license, partly within PL1080 (Istapp North segment) and partly within PL532 (Istapp South segment) (Figure 4.4). Istapp prospect is a truncated four-way closure, with the main reservoir in the Stø Formation and some contribution from the upper part of the Nordmela Formation (Nordmela-3) in the northern part of the prospect (Figure 4.4). The prospect segments are internally separated by a small, nearly vertical fault. Seismic observations indicate an apparent common gas–oil contact in both segments across this fault. However, the oil column height differs between these segments, being 32 m in the northern segment and smaller in the southern segment. As such, a high dependency between the segments was applied in the prospect analysis. Istapp is situated in a favourable setting for hydrocarbon migration. The trap is not a pure dip closure but relies on thinning of the top seal (Fuglen Formation) near the apex and is affected by erosional truncation in the west, where sealing is provided by the Kolmule Formation. Minor internal faulting is observed, particularly in the southern segment, which may represent potential leakage points. A clear double flat spot is observed across the northern and southern segments, indicating a gas-over-oil scenario and supporting application of a DHI uplift. Istapp North segment has a 72 % probability of discovery and a 90 % probability of finding oil in the structure (Table 4.2,Table 4.2.). Although Istapp is considered an interesting prospect, the relatively small oil volume renders the development non-commercial (see Chapter 5, Technical evaluation).

Other prospects identified within the license acreage are Skare and Sludd (Figure 4.2). Skare structure has low oil volume potential that additionally is spread between several segments and several reservoir levels (Table 4.2.). Sludd structure has very high trap seal risk contributing to low probability of discovery (Table 4.2.). In addition, well results from the area north of Johan Castberg (Skred and Isfjell) indicate higher probability of gas than oil in the PL1080 acreage (except for Istapp, supported by a double flat spot). Any potential gas discovery in PL1080 would likely be marginal. Consequently, the probability of a commercial discovery within the license is considered very low.

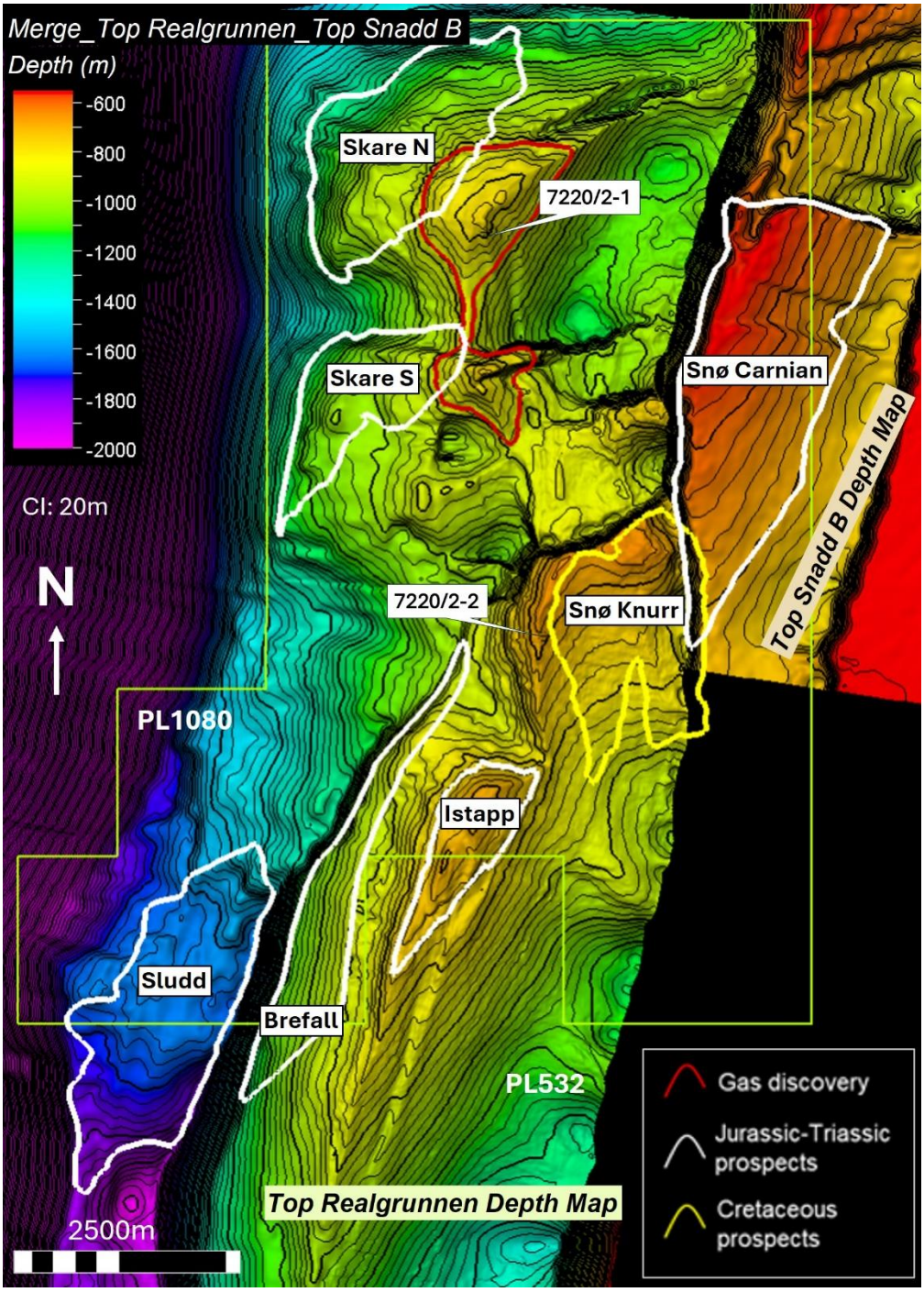



**Figure 4.2** Prospectivity in PL1080.

**Table 4.2** Resource potential in PL1080.

| Prospect/Discovery | Segment | Reservoir | Oil volume in place (MSm3) | | | Oil volume recoverable (MSm3) | | | Mean gas in place (GSm3) | Mean gas recoverable (GSm3) | Initial Pg | DHI risk (PDHI) | Poil | Main risk and DHI |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | P90 | Mean | P10 | P90 | Mean | P10 | | | | | | |
| **Snø Knurr** | Main | Knurr | 1.91 | 3.02 | 4.31 | 0.62 | 1.05 | 1.56 | 0.25 | 0.09 | 0.08 | 0.12 | 0.06 | Trap Seal (0.2), Reservoir Presence (0.5), HC-Phase Success (0.8), DHI upgrade |
| **Snø Carnian** | Southern | Snadd B | 1.14 | 1.71 | 2.33 | 0.33 | 0.51 | 0.72 | 0.10 | 0.05 | 0.11 | 0.27 | 0.27 | Trap Seal (0.3), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | Central | Snadd B | 0.34 | 0.48 | 0.63 | 0.10 | 0.14 | 0.19 | 0.06 | 0.03 | 0.11 | 0.27 | 0.27 | Trap Seal (0.3), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | Northern | Snadd B | 0.57 | 0.82 | 1.1 | 0.16 | 0.25 | 0.34 | 0.08 | 0.04 | 0.11 | 0.27 | 0.27 | Trap Seal (0.3), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | NW Satelite | Snadd B | 0.44 | 0.56 | 0.7 | 0.12 | 0.17 | 0.22 | 0.05 | 0.03 | 0.11 | 0.26 | 0.12 | Trap Seal (0.3), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | **Aggregated volume:** | | 2.51 | 3.26 | 4.05 | 0.74 | 0.98 | 1.23 | 0.26 | 0.14 | | 0.27 | 0.27 | |
| **Skare North** | Southern | Snadd A | 1.28 | 1.67 | 2.1 | 0.43 | 0.59 | 0.76 | 0.26 | 0.16 | 0.46 | 0.67 | 0.31 | Trap Seal (0.6), Reservoir Presence (0.8), Source Migration (0.95), DHI upgrade |
| | Northern | Snadd A | 1.94 | 2.52 | 3.16 | 0.65 | 0.89 | 1.15 | 0.41 | 0.25 | 0.46 | 0.67 | 0.31 | Trap Seal (0.6), Reservoir Presence (0.8), Source Migration (0.95), DHI upgrade |
| | | Akkar | 0.44 | 0.64 | 0.88 | 0.15 | 0.22 | 0.31 | 0.09 | 0.06 | 0.46 | 0.67 | 0.31 | Trap Seal (0.6), Reservoir Presence (0.8), Source Migration (0.95), DHI upgrade |
| | **Aggregated volume:** | | 4.08 | 4.85 | 5.66 | 1.38 | 1.69 | 2.02 | 0.76 | 0.45 | | 0.67 | 0.30 | |
| **Skare North Lower B1** | East | Snadd B1 | 0.96 | 1.28 | 1.63 | 0.27 | 0.39 | 0.51 | 0.23 | 0.13 | 0.23 | 0.50 | 0.23 | Trap Seal (0.6), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | West | Snadd B1 | 0.22 | 0.34 | 0.48 | 0.06 | 0.10 | 0.15 | 0.06 | 0.03 | 0.23 | 0.50 | 0.23 | Trap Seal (0.6), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | **Aggregated volume:** | | 0.25 | 0.97 | 1.85 | 0.07 | 0.29 | 0.56 | 0.08 | 0.13 | | 0.50 | 0.36 | |
| **Skare North Lower B2** | SouthEast | Snadd B2 | 1.28 | 1.68 | 2.14 | 0.36 | 0.51 | 0.68 | 0.32 | 0.18 | 0.23 | 0.50 | 0.23 | Trap Seal (0.6), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | NorthEast | Snadd B2 | 0.94 | 1.24 | 1.57 | 0.27 | 0.37 | 0.50 | 0.23 | 0.13 | 0.23 | 0.50 | 0.23 | Trap Seal (0.6), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | West | Snadd B2 | 0.18 | 0.34 | 0.52 | 0.05 | 0.10 | 0.16 | 0.06 | 0.04 | 0.23 | 0.50 | 0.23 | Trap Seal (0.6), Reservoir Presence (0.4), Source Migration (0.95), DHI upgrade |
| | **Aggregated volume:** | | 0.38 | 1.85 | 3.30 | 0.11 | 0.55 | 0.99 | 0.36 | 0.20 | | 0.50 | 0.43 | |
| **Skare South** | East | Snadd A | 1.01 | 1.34 | 1.70 | 0.34 | 0.47 | 0.62 | 0.23 | 0.14 | 0.46 | 0.67 | 0.31 | Trap Seal (0.6), Reservoir Presence (0.8), Source Migration (0.95), DHI upgrade |
| | West SW | Snadd A | 0.54 | 0.71 | 0.90 | 0.18 | 0.25 | 0.33 | 0.12 | 0.07 | 0.46 | 0.67 | 0.31 | Trap Seal (0.6), Reservoir Presence (0.8), Source Migration (0.95), DHI upgrade |
| | West NW | Snadd A | 0.37 | 0.48 | 0.61 | 0.12 | 0.17 | 0.22 | 0.08 | 0.05 | 0.46 | 0.67 | 0.31 | Trap Seal (0.6), Reservoir Presence (0.8), Source Migration (0.95), DHI upgrade |
| | **Aggregated volume:** | | 2.15 | 2.55 | 2.97 | 0.74 | 0.89 | 1.06 | 0.43 | 0.26 | | 0.67 | 0.30 | |
| **Brefall** | | Snadd A | 2.49 | 5.02 | 8.41 | 0.85 | 1.75 | 2.95 | 0.85 | 0.51 | 0.38 | 0.27 | 0.16 | Trap Seal (0.5), Reservoir Presence (0.8), Source Migration (0.95), DHI downgrade |
| **Istapp** | North | Stø/Nordmela | 3.59 | 4.25 | 4.94 | 0.99 | 1.27 | 1.58 | 0.23 | 0.07 | 0.72 | 0.91 | 0.91 | Trap Seal (0.8), HC-Phase Success (0.9), DHI upgrade |
| **Sludd** | Sludd | Stø/Nordmela | 11.6 | 14.3 | 17.2 | 4.40 | 5.7 | 7.06 | 3.24 | 1.9 | 0.09 | 0.09 | 0.04 | Trap Seal (0.1), Reservoir Presence (0.9) |
| | Sludd | Tubåen | 0.36 | 5.4 | 9.33 | 0.14 | 2.03 | 3.53 | 0.55 | 0.33 | 0.10 | 0.16 | 0.11 | Trap Seal (0.1), DHI upgrade |

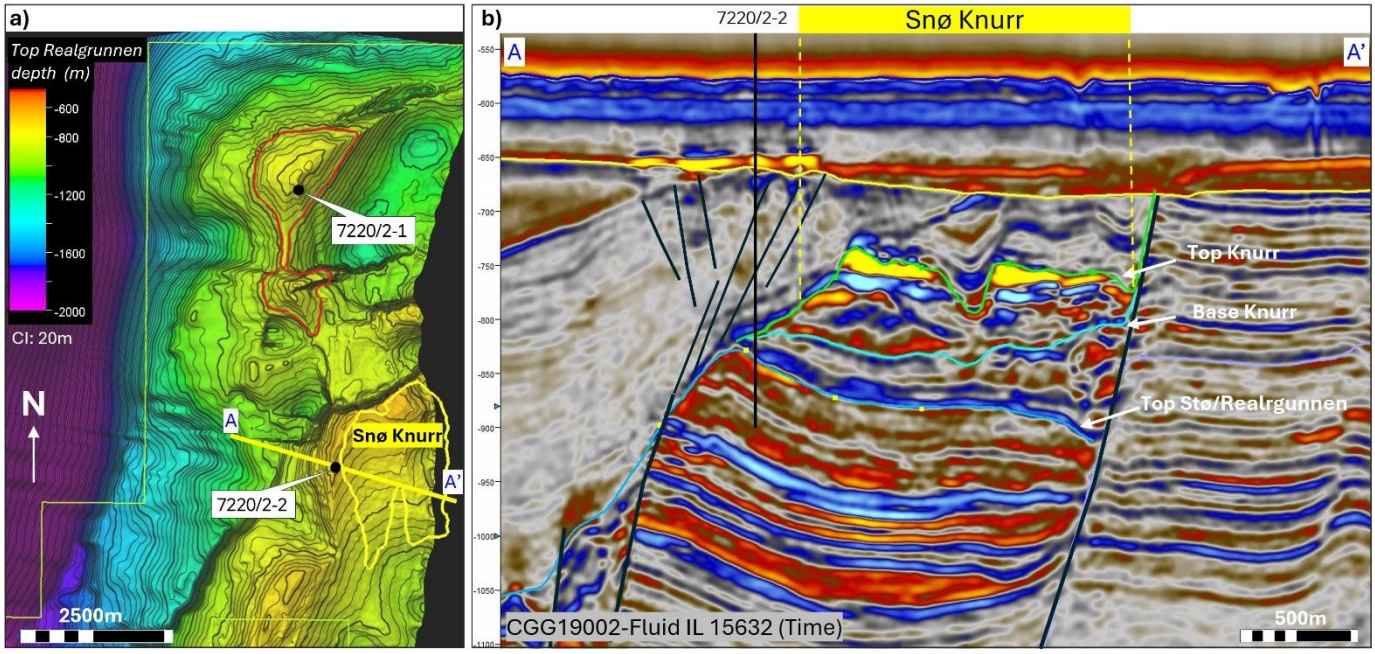



**Figure 4.3** a) Top Stø depth map showing the Snøras well (7220/2-2) location, and Snø Knurr prospect outline (yellow outline), Isfjell gas discovery (red outline). b) Seismic section through the Snøras well and Snø Knurr prospect. Seismic line is orientated A-A' and its location is marked by the yellow line in Figure 4.3 a).

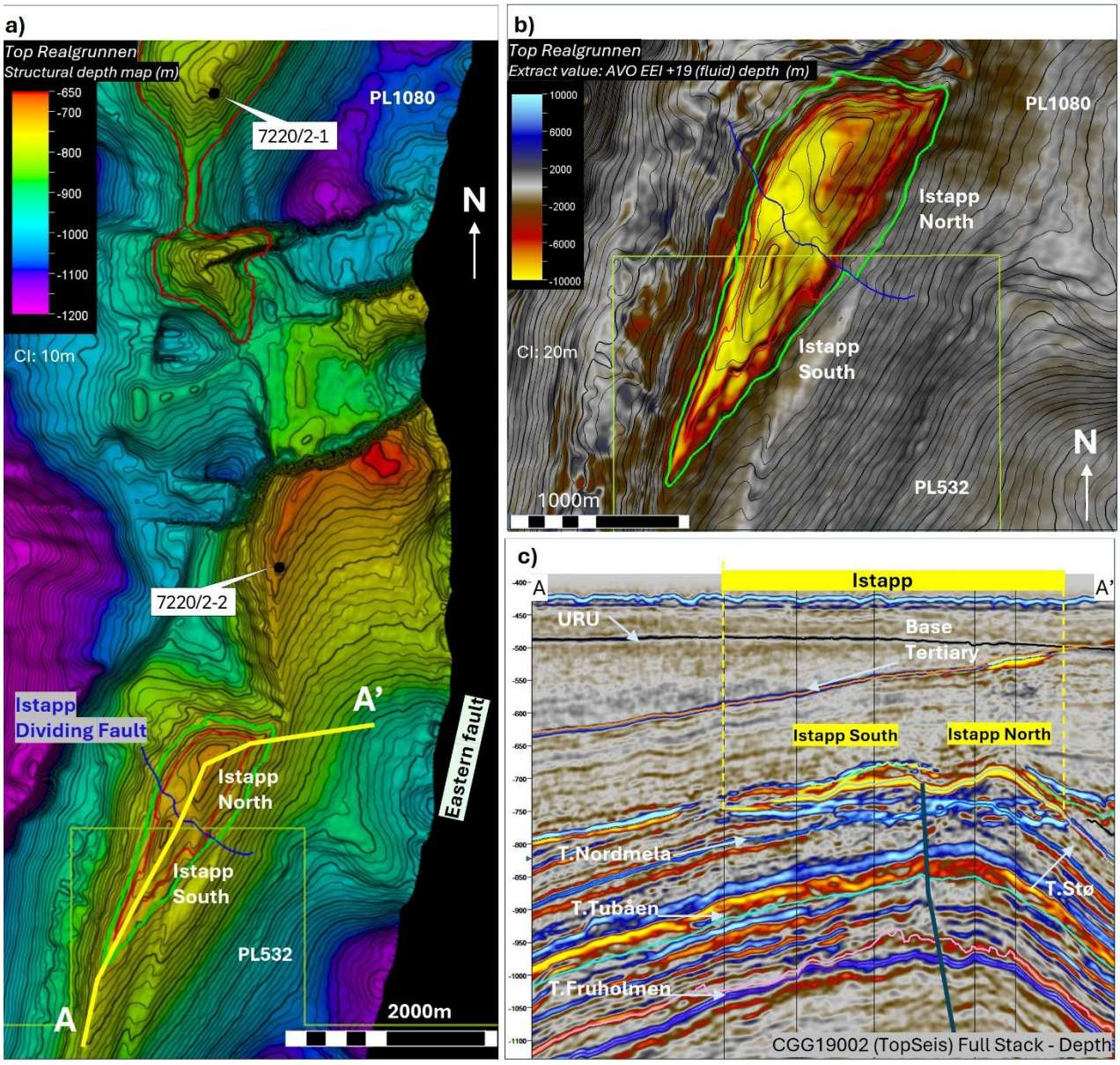



**Figure 4.4** a) Top Realgrunnen depth map showing the gas-oil contact (red outline) and oil-water contact (green outline) in the Istapp prospect. b) Top Realgrunnen amplitude map extracted from fluid cube, showing the gas-oil contact (red outline) and oil-water contact (green outline) in the Istapp prospect. c) Seismic section through the Istapp prospect. Seismic line is orientated A-A' and its location is marked by the yellow line in Figure 4.4 a).

## 5 Technical evaluation

In earlier technical-economical evaluations, a common development solution was planned for Snøras, Istapp (PL1080) and Skruis (PL532). Negative exploration results from the Snøras well left the Istapp prospect to carry the costs of a potential development in case of a discovery.

Only the northern segment of the Istapp prospect lies within PL1080, whereas the southern segment is located within PL532. Technical and economical re-evaluation for Istapp prospect has been conducted as part of the assessment of the remaining prospectivity in PL1080. Development of Istapp has been evaluated as a tie-in to the Johan Castberg FPSO. Technical evaluation indicates that Istapp cannot be produced without artificial lift due to shallow reservoir depth resulting in low reservoir pressure, as well as significant friction losses over the long tie-back distance to the Johan Castberg FPSO (approximately 31 km). Riser-based gas lift could be a preferable option to limit friction losses. Economical screening of a simplified development concept (with cold flow to the FPSO - assuming no wax potential, rather than a more expensive heated pipeline and subsea pump solution) demonstrates that even in an optimistic case, the breakeven oil price for Istapp is very high and does not provide a robust economic outcome. High capital costs, elevated breakeven price, and insufficient recoverable volumes result in a non-robust development case. Istapp is therefore considered non-commercial.

The Isfjell gas discovery, located in PL1080, cannot be developed due to limited volume and lack of available gas capacity in the Johan Castberg infrastructure. However, the Isfjell discovery might be considered for future development alongside other small gas discoveries in the Greater Johan Castberg area.

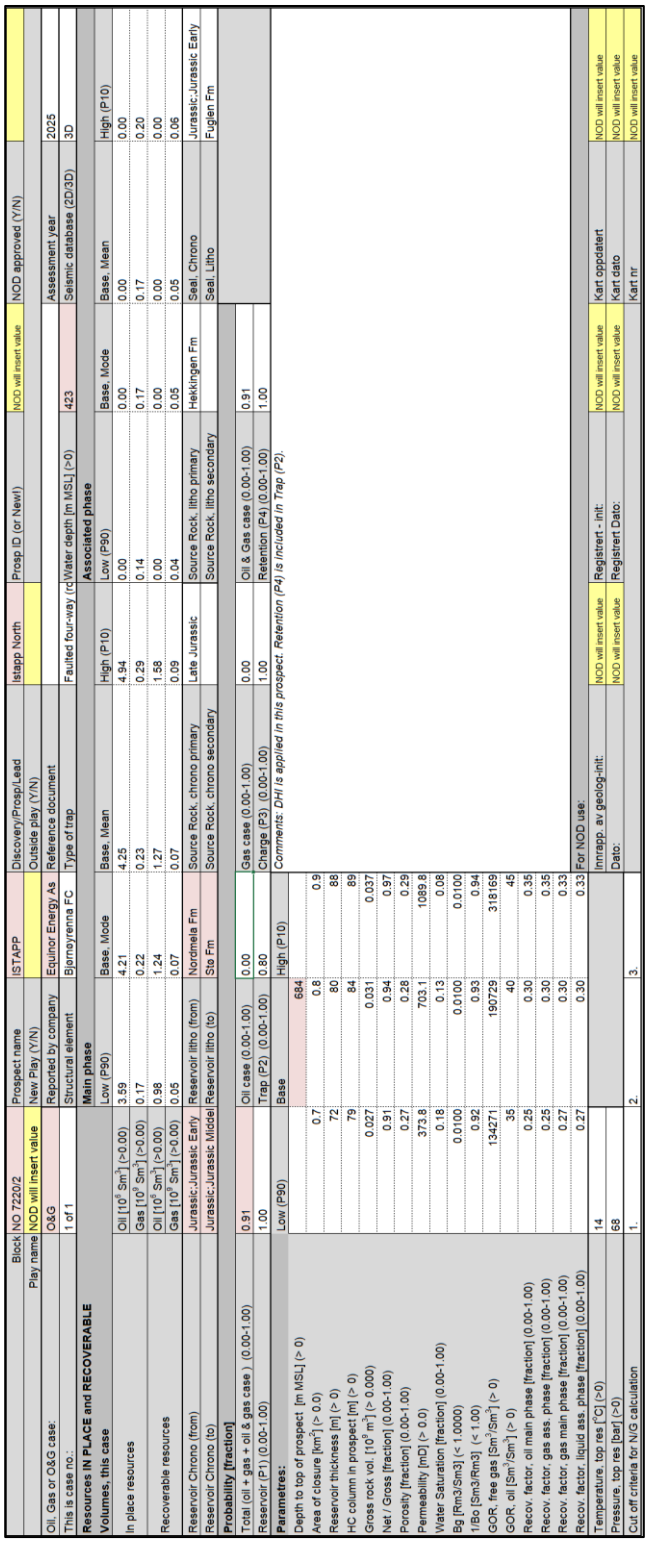
## 6 Conclusion

Results from recent drilling and re-evaluation of the remaining prospectivity lead to the conclusion that prospects in the PL1080 area are more likely to contain gas rather than oil. Moreover, the remaining prospects are associated with high trap seal risk and potentially leaked structures. The only prospect of interest is Istapp, however, it is considered non-commercial due to a very high breakeven oil price and lack of economic robustness.

The partnership concluded that the probability of a commercial discovery in PL1080 acreage is low, and that no viable standalone or cluster development solution can be supported. Consequently, the remaining prospectivity in PL1080 is not considered suitable for further drilling or development, and the partnership has decided to surrender the license.

# 7 Appendix

## Istapp North segment



| Block | NO 7220/2 | Prospect name | ISTAPP | Discovery/Prosp/Lead | Istapp North | Prosp ID (or New!) | NOD will insert value | NOD approved (Y/N) | |
|---|---|---|---|---|---|---|---|---|---|
| Play name | NOD will insert value | New Play (Y/N) | | Outside play (Y/N) | | | | | |
| Oil, Gas or O&G case: | O&G | Reported by company | Equinor Energy As | Reference document | | | | Assessment year | 2025 |
| This is case no.: | 1 of 1 | Structural element | Bjarmøyrenna FC | Type of trap | Faulted four-way (cl | Water depth [m MSL] (>0) | 423 | Seismic database (2D/3D) | 3D |
| **Resources IN PLACE and RECOVERABLE** | | **Main phase** | | | | **Associated phase** | | | |
| **Volumes, this case** | | Low (P90) | Base, Mode | Base, Mean | High (P10) | Low (P90) | Base, Mode | Base, Mean | High (P10) |
| In place resources | Oil [$10^6$ $Sm^3$] (>0.00) | 3.59 | 4.21 | 4.25 | 4.94 | 0.00 | 0.00 | 0.00 | 0.00 |
| | Gas [$10^9$ $Sm^3$] (>0.00) | 0.17 | 0.22 | 0.23 | 0.29 | 0.14 | 0.17 | 0.17 | 0.20 |
| | Oil [$10^6$ $Sm^3$] (>0.00) | 0.98 | 1.24 | 1.27 | 1.58 | 0.00 | 0.00 | 0.00 | 0.00 |
| Recoverable resources | Gas [$10^9$ $Sm^3$] (>0.00) | 0.05 | 0.07 | 0.07 | 0.09 | 0.04 | 0.05 | 0.05 | 0.06 |
| Reservoir Chrono (from) | Jurassic;Jurassic Early | Reservoir litho (from) | Nordmela Fm | Source Rock, chrono primary | Late Jurassic | Source Rock, litho primary | Hekkingen Fm | Seal, Chrono | Jurassic;Jurassic Early |
| Reservoir Chrono (to) | Jurassic;Jurassic Middle | Reservoir litho (to) | Ste Fm | Source Rock, chrono secondary | | Source Rock, litho secondary | | Seal, Litho | Fuglen Fm |
| **Probability [fraction]** | | | | | | | | | |
| Total (oil + gas + oil & gas case ) (0.00-1.00) | 0.91 | Oil case (0.00-1.00) | 0.00 | Gas case (0.00-1.00) | 0.00 | Oil & Gas case (0.00-1.00) | 0.91 | | |
| Reservoir (P1) (0.00-1.00) | 1.00 | Trap (P2) (0.00-1.00) | 0.80 | Charge (P3) (0.00-1.00) | 1.00 | Retention (P4) (0.00-1.00) | 1.00 | | |
| **Parametres:** | | Low (P90) | Base | High (P10) | *Comments: DHI is applied in this prospect. Retention (P4) is included in Trap (P2).* | | | | |
| Depth to top of prospect [m MSL] (> 0) | | | 684 | | | | | | |
| Area of closure [$km^2$] (> 0.0) | | 0.7 | 0.8 | 0.9 | | | | | |
| Reservoir thickness [m] (> 0) | | 72 | 80 | 88 | | | | | |
| HC column in prospect [m] (> 0) | | 79 | 84 | 89 | | | | | |
| Gross rock vol. [$10^9$ $m^3$] (> 0.000) | | 0.027 | 0.031 | 0.037 | | | | | |
| Net / Gross [fraction] (0.00-1.00) | | 0.91 | 0.94 | 0.97 | | | | | |
| Porosity [fraction] (0.00-1.00) | | 0.27 | 0.28 | 0.29 | | | | | |
| Permeability [mD] (> 0.0) | | 373.8 | 703.1 | 1089.8 | | | | | |
| Water Saturation [fraction] (0.00-1.00) | | 0.18 | 0.13 | 0.08 | | | | | |
| Bg [Rm3/Sm3] (< 1.0000) | | 0.0100 | 0.0100 | 0.0100 | | | | | |
| 1/Bo [Sm3/Rm3] (< 1.00) | | 0.92 | 0.93 | 0.94 | | | | | |
| GOR, free gas [$Sm^3/Sm^3$] (> 0) | | 134271 | 190729 | 318169 | | | | | |
| GOR, oil [$Sm^3/Sm^3$] (> 0) | | 35 | 40 | 45 | | | | | |
| Recov. factor, oil main phase [fraction] (0.00-1.00) | | 0.25 | 0.30 | 0.35 | | | | | |
| Recov. factor, gas ass. phase [fraction] (0.00-1.00) | | 0.25 | 0.30 | 0.35 | | | | | |
| Recov. factor, gas main phase [fraction] (0.00-1.00) | | 0.27 | 0.30 | 0.33 | | | | | |
| Recov. factor, liquid ass. phase [fraction] (0.00-1.00) | | 0.27 | 0.30 | 0.33 | For NOD use: | | | | |
| Temperature, top res [°C] (>0) | 14 | | | | Innrapp. av geolog-init: | NOD will insert value | Registrert - init: | NOD will insert value | Kart oppdatert | NOD will insert value |
| Pressure, top res [bar] (>0) | 68 | | | | Dato: | NOD will insert value | Registrert Dato: | NOD will insert value | Kart dato | NOD will insert value |
| Cut off criteria for N/G calculation | 1 | 2 | | 3 | | | | | Kart nr | NOD will insert value |

## 8 References

Equinor. (2019). *APA 2019 Awards in predefined areas: Part of blocks 7220/2 and 7220/5.*
Equinor. (2024). *Final well report NO 7220_2-2 Snøras.*
Statoil. (2012). *22nd Concession Round Application: Application for the block 7220/2.*