

INVITATION FOR PROPOSAL

THAILAND PETROLEUM BIDDING ROUND 2018 FOR OFFSHORE BLOCK G1/61

Invitation for Proposal

**Terms of Reference for Bidding of Offshore
Exploration Block G1/61
in the Gulf of Thailand
under the Production Sharing Contract System**

Disclaimer

Invitation for Proposal (IFP) – Terms of Reference for the Bidding Process of offshore exploration block no. G1/61 in the Gulf of Thailand (GoT) under the Production Sharing Contract (PSC) system is presented by Department of Mineral Fuels (DMF), Ministry of Energy, Thailand for the purpose of providing recipients with information regarding Techno-Commercial submission and evaluation.

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Introduction

DMF, under Ministry of Energy, Thailand, provides the Invitation for Proposal – Terms of Reference for the Bidding Process of exploration block no. G1/61 in GoT under the PSC system to provide information and guidelines for application submissions, bidding considerations and guidelines for the application.

The Ministry of Energy, Thailand states in this document the terms and conditions that Participants must follow. The Ministry of Energy expects an operator, joint venture or consortium to be awarded right to explore and produce petroleum in GoT. The Bidding Process will be undertaken in an objective manner and in accordance with the Government of Thailand's objective to enhance the continuity and efficiency of petroleum production for Thailand's energy security.

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Definitions

Minimum Production and Sale Quantity (V) – In this document, DMF has stated a minimum amount of sales gas of 800 million standard cubic feet per day (mmscfd) that the Successful Bidder is expected to deliver between April 24, 2022 and April 30, 2032

Remarks the Minimum Production and Sale Quantity (V) stated above should be delivered at a heating value of at least 850 British thermal unit (BTU) per standard cubic foot and a maximum CO₂ content by mole of 23%.

Gas Price (Pr) – The gas price applicable for all gas produced under the PSC, calculated based on the gas price formula provided in section 4.4.4 incorporating a Price Constant (Pc) to be proposed by Pre-Qualified Bidders. This pricing for gas is to be effective during the entire PSC period and must be stipulated in a Gas Sales Agreement. The unit of gas price is Baht per million BTU.

Preparation Period – The preparation period begins on the date of exploration block G1/61 PSC contract signing until the date that the Successful Bidder receives the right for petroleum exploration and production under the PSC on April 24, 2022 (Commencement Date).

Contractor – A Successful Bidder who has signed the PSC with the Government of Thailand for the exploration block and has received the right to explore and produce petroleum effective as of the Commencement Date as stipulated in section 1 and 2.

1. Areas Open for Bidding

The offshore area in the Gulf of Thailand opened for bidding for the right to explore and produce petroleum following the announcement of the Department of Mineral Fuels, Subject "Identification of the exploration blocks offshore of the Gulf of Thailand open for application for the right to explore and produce petroleum" signed on 5th March 2018 are as follows:

Details of the exploration block no. G1/61 are as follows:

- Block No. G1/61 covers an area 4,501 square kilometers
- The right to conduct exploration and production of petroleum under the PSC will be conferred on April 24, 2022

The maps and coordinates of these areas are provided in Appendix 1. The coastline is determined using Mean-Sea Level as a point of reference. The line of continental shelf that lies under the ocean is in line with generally accepted international law and international contract.

2. Contract period and PSC contract area

2.1 Exploration Exploration period of 3 years with negotiable 3 year extension, starting from 24 April 2022 and due on 23 April 2025

2.2 Production Production period of 20 years starting directly after the Exploration period, with a negotiable 10 year extension

2.3 Relinquishment The relinquishment of the exploration block must align with the Provisions of Law and Contract

3. PSC Fiscal Regime

3.1 Royalty is levied at 10% of total petroleum production as required by law

3.2 Cost Recovery is allowed for costs that have been approved in accordance to the work programme and budget, which will not be more than 50% of the total annual petroleum production. In the event that the recoverable cost is more than 50% of the total petroleum production in a particular year, the difference between the recoverable cost and actual cost recovered can be carried forward to the following year. Costs can not be carried forward after the contract expires.

3.3 Percentage of Contractors' Share of Profit Petroleum shall be not more than 50% as stipulated in Section 53/3 (2) (c) of the Petroleum Act B.E. 2514 (1971) which is amended by the Petroleum Act (No. 7) B.E. 2560 (2017) and will be equivalent to the proposed percentage sharing in 4.4.5

3.4 Petroleum Income Tax is levied at 20% of net profit as stipulated in Chapter 7 of the Petroleum Income Tax Act B.E. 2514 (1971) which is amended by the Petroleum Act (No. 7) B.E. 2560 (2017).

4. Techno-Commercial Requirements

The Ministry of Energy stipulates the requirements to be accepted by all Pre-Qualified Bidders and criteria which are to be proposed:

4.1 Bidding Obligation

A Pre-Qualified Bidder must agree to the following obligations:

4.1.1 Minimum Production and Sale Quantity (V)

The Ministry of Energy stipulates that the Pre-Qualified Bidder must commit to produce a minimum production and sale quantity of at least 800 mmscfd between April 24, 2022 and April 30, 2032 to ensure steady supply of gas.

Penalty of unmet minimum production (Penalty)

Between April 24, 2022 and April 30, 2032, the Pre-Qualified Bidder must commit to a production and sale volume which is also the annual committed volume. In the event the minimum production and sale quantity is not met, the Contractor is responsible for V Penalty, calculated based on the difference between committed volume and actual sales volume as per the formula below:

$$\text{Penalty} = 10\% \times \overline{Pr} \times \overline{HV} \times (\text{Committed Volume} - \text{Actual Sales Volume})$$

With:

Committed Volume – the minimum annual amount of gas production committed in million standard cubic feet (mmscf). The committed volume is to be calculated based on the minimum production and sale quantity (V) on a yearly basis.

The calculation of committed volume above excludes the period prior to Contractual Delivery Date (CDD) as per the Gas Sales Agreement, planned shutdown and Force Majeure.

Actual Sales Volume – The annual amount of gas production that the Contractor produces and sells in million standard cubic feet.

\overline{Pr} – The selling price calculated on an annual weighted average basis calculated based on reference gas price formula (Thai Baht per Million BTU)

\overline{HV} – The heating value of produced natural gas calculated on an annual weighted average basis by sales quantity (BTU per cubic feet).

A Contractor who does not meet the minimum production and sale quantity must pay V Penalty within 3 months after the end of the previous calendar year. If the Contractor defaults on the Penalty for more than 3 months, DMF may at its sole discretion, terminate the PSC.

4.1.2 Gas Price (Pr)

A Pre-Qualified Bidder must commit to deliver all gas produced under the PSC in accordance to the gas price formula and the Pc (Price Constant) proposed, as detailed in Clause 4.4.4.

4.1.3 Facility Bonus

The Facility Bonus will be Three Hundred and Fifty Million Thai Baht (THB 350,000,000) which is to be paid in three (3) separate and equal payments due on April 24 of the first three years starting on the Commencement Date of the PSC. The first payment must be paid by April 24, 2022.

After payment of the initial facility bonus on April 24, 2022, the government will provide the Contractor with the right to utilize and operate any existing infrastructure and facilities

owned by the Government. The Contractor will be responsible for the maintenance and decommissioning of infrastructure and facilities as stated in Clause 4.3.

4.2 Preparation Period Work Plan

It is in the Government of Thailand's interest to ensure a smooth and uninterrupted transition of operations from the existing concession to the PSC awarded under this bidding process.

A Pre-Qualified Bidder must submit a work plan for the entire Preparation Period, with accompanying timelines and expected outcomes as per the form in Appendix 2. A Pre-Qualified Bidder shall submit the Preparation Period Work Plan to DMF for evaluation as a part of the Techno-Commercial Criteria.

Once a Successful Bidder signs the PSC, DMF requires the Successful Bidder to propose, on an annual basis, a detailed annual work plan for the entire Preparation Period as described in section 4.2.1.

Key preparation activities and timelines that government expects as Successful Bidder which has entered into the PSC to complete is shown in the table below:

| Key preparation activities | Commencement | Target Completion |
|---|--|---|
| 4.2.1 Annual Preparation Work Plan | By September 2019 | Every September |
| 4.2.2 First Year Work Program and Budget | Begin preparation of work program and budget by September 2021 | Submit work program and budget by Q1 2022 which will be announced by Minister of Energy in due course |
| 4.2.3 Facility Access Agreement | Negotiate within 30 days of the official signing date | Agreement by May 2019 |
| 4.2.4 Detailed Facilities and Infrastructure Assessment | Assess within 90 days of the official signing date | Complete by January 2020 |
| 4.2.5 Commercial Agreement | Negotiate within 90 days of the official signing date | Complete by March 2021 |
| 4.2.6 Common Use of Production Facilities Agreement | Negotiate within 90 days of the official signing date | Agreement by January 2021 |
| 4.2.7 Staff and Job Handover Agreement | Negotiate by April 2021 | Complete by January 2022 |
| 4.2.8 Gas Sales Agreement | Negotiate within 90 days of the official signing date | Agreement by April 2021 |

| Key preparation activities | Commencement | Target Completion |
|---|---|---------------------------------|
| 4.2.9 Environmental Impact Assessment | Negotiate within 90 days of the official signing date | Approved by April 2021 |
| 4.2.10 Well head platform construction | October 2019 | Complete by December 2021 |
| 4.2.11 Drilling for petroleum production | - | Start drilling by December 2021 |
| 4.2.12 Application of Petroleum Production Area | - | Submit by April 2021 |

In the event that the Contractor is unable to honour the commitment(s) without any valid justification or mitigating factor with supporting evidence, DMF may at its sole discretion, terminate the contract and forfeit the Performance Guarantee.

4.2.1 Annual Preparation Work Plan

A Successful Bidder that has signed the PSC must provide a detailed annual preparation work plan to DMF during the Preparation Period. The submission will include, if applicable, works completed and costs incurred in the previous calendar year, as well as the work plan and expected expenses of the next calendar year by September of each year from 2019.

The costs incurred during the Preparation Period will be included in the first year Work Program and Budget of the PSC. Procurement requirements in the Preparation Period are to be carried out in accordance to the terms stipulated in the PSC agreement.

4.2.2 Work Program & Budget

A Successful Bidder that has signed the PSC must commit to submit the First Year Work Program and Budget for PSC on a date to be stipulated by Minister of Energy, within Q1 2022. The Work Program and Budget must show the activities and expenses during preparation period as in 4.2.1 and the activities and expenses in the first year of PSC between April 24, 2022 and December 31, 2022.

For subsequent submissions of Work Program and Budget, a Contractor must submit the plan to DMF by September of each year as stated in the PSC.

4.2.3 Facility Access Agreement

To conduct the proposed activities in the Preparation Period e.g. facility assessment and site survey, the Successful Bidder that has signed the PSC must enter into a Facility Access Agreement with current operator by May 2019.

4.2.4 Detailed Facilities and Infrastructure Assessment

A Successful Bidder that has signed the PSC must propose a plan for detailed assessment of existing offshore facilities and infrastructure to DMF. It is anticipated that this assessment will be completed by January 2020.

4.2.5 Commercial Agreement

For continuous investment and operations during the Preparation Period e.g. additional drilling or pipeline laying by current operator, the Pre-Qualified Bidder must commit to commence negotiations and enter into a Commercial Agreement with the current operator by March 2021.

4.2.6 Common Use of Production Facilities Agreement

To ensure continued gas production in Block G1/61 and other blocks, and to maximize production after concession expiry, the government will select and retain certain existing production facilities in accordance to the proposed field development plan by the Successful Bidder that has signed the PSC. Currently, certain facilities are in common use with other concessions or contracts, and the Contractor must allow other current concessionaires who have a right to use common production facilities prior to 24 April 2022, to continue using the facilities. The Successful Bidder that has signed the PSC must enter into a Common Use of Production Facilities Agreement with other concessionaires or contractors on a cost allocation basis.

A Successful Bidder that has signed the PSC must negotiate the Common Use of Production Facilities Agreement with other concessionaires and contractors in accordance to the principles stated above by January 2022.

Approval by DMF of the Common Use of Production Facilities Agreement, including any amendments, is required prior to signing of the agreement.

4.2.7 Staff and Job Handover Agreement

A Successful Bidder that has signed the PSC must complete negotiations with current operators for employee contract handovers by January 2022.

4.2.8 Gas Sales Agreement

A Successful Bidder that has signed the PSC must negotiate with gas offtaker(s) to agree on a Gas Sales Agreement by April 2021. The Successful Bidder that has signed the PSC will determine the Daily Contract Quantity (DCQ), equal to or more than the minimum quantity, V , as stipulated in section 4.1.1, and will agree with gas offtaker(s) on the volume swing of any additional purchase not more than 5% of DCQ. The gas price will be in accordance to the gas price formula provided in section 4.4.4 using the Price Constant (P_c) proposed by the Successful Bidder that has signed the PSC.

4.2.9 Environmental Impact Assessment Study (EIA)

A Successful Bidder that has signed the PSC must prepare and obtain approval of the Environmental Impact Assessment in accordance to the related laws and regulations by April 2021.

4.2.10 Well Head Platform Construction

A Successful Bidder that has signed the PSC must complete the design and completed the construction of well head platform(s) required for continuous petroleum production by December 2021.

4.2.11 Drilling for Petroleum Production

For continuous petroleum production, a Successful Bidder that has signed the PSC must drill production well(s) as negotiated in the Commercial Agreement stipulated in 4.2.5. or on its own by obtaining access through the Facilities Access Agreements stipulated in 4.2.3.

4.2.12 Application of Petroleum Production Area

A Successful Bidder that has signed the PSC must submit the application of Petroleum Production Area, in Section 42 of the Petroleum Act B.E. 2514 (1971) and its revision, by April 2021.

4.3 Decommissioning of Facilities and Infrastructure

The Contractor is obligated to decommission all infrastructure related to the offshore petroleum operation. This includes processing platforms and offshore facilities owned by the government which the contractor has been given the right to use. The decommissioning of infrastructure will be carried out as per the PSC agreement, related regulation, and agreement between existing operator and government agencies as stated in the Announcement by Department of Mineral Fuels, Subject "Asset Transfer Agreement B.E. 2561".

By April 2020, a Successful Bidder that has signed the PSC is required to cooperate with DMF to select and submit a list of existing facilities and infrastructure to be retained and utilized for DMF's consideration; after which an agreement with DMF will be entered into.

4.4 Techno – Commercial Proposals

The Ministry of Energy expects Pre-Qualified Bidders to employ realistic and considered assumptions when preparing a Techno-Commercial proposal:

4.4.1 Preparation Work Plan Proposal

Pre-Qualified Bidders must submit the Preparation Work Plan Proposal as stated in section 4.2, which is consistent with the Minimum Production and Sale Quantity, V, as stipulated in section 4.1.1

4.4.2 Exploration Work Plan Proposal

A Pre-Qualified Bidder must submit an exploration work plan proposal, detailing the proposed methodology and total expenses of activities, which the Successful Bidder that has signed the PSC must commit to perform during the exploration period, as shown in Appendix 3. The Successful Bidder that has signed the PSC must incorporate this exploration work plan into the proposed annual work plan and budget.

The government expects the Contractor to explore the entire block, especially unexplored or unappraised areas and propose methods to maximize petroleum production.

4.4.3 Field Development Plan

A Pre-Qualified Bidder must submit a viable field development plan that will be able to deliver the minimum production and sale quantity, V. Particular focus should be placed on the following areas:

- The activities necessary, including key milestones, which demonstrate execution in a timely manner, and that will lead to approval by DMF
- A detailed proposal on the structure of the overall development and the interactions between discrete project elements
- A detailed estimation on the petroleum reserves and petroleum resources in each area
- Structural Contour Map of the main petroleum areas showing positions of existing petroleum processing platforms and future petroleum processing platforms
- Timing associated with each element of the development
- Principle, method, procedure and period using for drilling and construction of petroleum processing platforms and other related facilities to reach the committed petroleum production

- Cost estimation analysis
- Procurement strategies and process
- Cost reduction initiatives
- Key assumptions that have been used to formulate the work plan, such as assumed gas price, economics cut-off rate, EUR/Well, number of WHPs, slots per WHP, number of redrill and infill wells, petroleum point of sales, petroleum processing facilities, petroleum transport facilities, production profile per well and/or platform, shutdown and maintenance plans
- Key risks identified and risk management strategies for the major phases of the project
- Life of field economic model containing annual production, revenue, cost, tax and cash flow calculation under the PSC
- Decommissioning plan

Summary of the Field Development Plan must also be provided by completing the template in Appendix 4.

4.4.4 Price Constant (Pc) Proposal

Pre-Qualified bidders must propose a Constant Value of Gas Price (Pc) which is used to determine sales Gas Price (Pr) for the entire PSC period.

The Ministry of Energy reserves the right to not consider any Price Constant (Pc) proposal that exceeds 214.26 Thai Baht per Million BTU. (Pc would be proposed in two (2) decimal places.)

$$Pr_{(y)} = Pc \times M_{(y)} \times \left(a \frac{PPI_{(y)}}{PPI} + \frac{I_{(y)}}{I} \left\{ b \frac{OM_{(y)}}{OM} + c \frac{DB_{(y)}}{DB} + d \right\} \right)$$

| <i>Pc</i> | <i>M_(y)</i> | <i>a</i> | <i>b</i> | <i>c</i> | <i>d</i> |
|-----------|---|----------|----------|----------|----------|
| ≤214.26 | Refer to the condition of Dubai Oil Price | 0.25 | 0.30 | 0.40 | 0.05 |

With:

Pr_(y) – Current Gas Price (y) (Thai Bath per Million BTU)

Pc – Constant Value of Gas Price (Thai Baht per Million BTU)

M_(y) – Multiplier reflected by *DB_(y)* with:

- If Dubai Oil Price ≤ 52 US\$/bbl
 $M_{(y)} = 0.913483 + 0.109011 \times DB_{(y)}/52$
- If 52 US\$/bbl < Dubai Oil Price ≤ 100 US\$/bbl
 $M_{(y)} = 1.022494 - 0.154607 \times [(DB_{(y)}-52)/48]$
- Dubai Oil Price > 100 US\$/bbl
 $M_{(y)} = 0.223689 + 6.441980 / \sqrt{DB_{(y)}}$

PPI – the arithmetic average of the figures published for each month of the twelve (12) months, inclusive, for the Producer Price Index of Thailand based on 100.0000 for the calendar year 2010 as published by the Trade Policy and Strategy Office, Ministry

of Commerce, Thailand. **PPI** is one hundred one decimal four one six seven (101.4167) for the base year 2016.

I – the exchange rate, which shall be the arithmetic average of the daily Interbank Exchange Rate of Baht per US Dollar, published by The Bank of Thailand for the Year 2016 which is equivalent to 35.30.

OM – the arithmetic average of the figures published for each Month of the twelve (12) Months, inclusive, for the Producer Price Index for Oil Field Machinery and Tools, Commodity Code No. 1191, based on 100.00 for the calendar year 1982 as published by the United States Department of Labor, Bureau of Labor Statistics equivalent to 214.88 for the base year 2016

DB – expressed in US Dollars per barrel (US\$/bbl) for a given month, is equal to the mean of arithmetical average of all the relevant High and Low Quotations for the first month (MOPS - 1st month) Dubai as published on the Price Average Supplement shown in Platts Oilgram Price Report. (for the year 2016=41.27\$/bbl)

PPI_(y) – the arithmetic average for last published for **PPI** above in the respect of the preceding six (6) calendar months for the period in which the price has to be adjusted.

I_(y) – the exchange rate calculated as for **I** above for the calendar month preceding the period in which the price has to be adjusted.

OM_(y) – the arithmetic average for last published for **OM** above in the respect of the preceding six (6) calendar months for the period in which the price has to be adjusted.

DB_(y) – the arithmetical average for last published for **DB** above in the respect of the preceding six (6) calendar months for the period in which the price has to be adjusted.

Gas Price (Pr) in the current period (y) will be adjusted on the 1st day of every April and October.

4.4.5 Percentage of Contractors' Share of Profit Petroleum

Contractors' Share of Profit Petroleum must not exceed 50% of the total profit petroleum as stipulated by law (The Contractors' Share of Profit Petroleum proposal should be made in two (2) decimal places)

4.4.6 Signature Bonus

The Signature Bonus shall be biddable but not less than 350,000,000 Baht (Three Hundred and Fifty Million Baht). The Successful Bidder must pay Signature Bonus no later than 10 working days prior to the signing date.

4.4.7 Production Bonus

The Production Bonus is biddable but not less than 175,000,000 Baht (One Hundred and Seventy-Five Million Baht). The Production Bonus proposed will be paid each time the cumulative petroleum produced and sold reaches 100, 200 and 300 million barrels of oil equivalent (BOE), respectively.

For the purpose of determining the volume of petroleum, it shall be deemed that the heating value of natural gas of 5.73 million BTU is equivalent to one barrel of crude oil.

4.4.8 Proposal of Supporting Petroleum Development in Thailand

It is the government's policy to develop the energy industry and to enhance capability development of the Thai people. In line with this policy, a Pre-Qualified Bidder is required to propose contributions to support Thailand's petroleum development as follows:

1) Supporting Contribution for the Petroleum Development in Thailand

Submitted to the Ministry of Energy to support the capability development program(s) in the field of energy, which can be in the form of scholarships for government employees, and investment in social, community development and information literacy for the communities and inhabitants in the vicinity of petroleum producing areas.

Supporting Contribution for the Petroleum Development in Thailand is biddable with a minimum amount of 3,500,000 Baht (Three Million and Five Hundred Thousand Baht only) per year. The payment is to be made annually throughout the entire contract duration after the Commencement Date.

2) Other Bonuses

Biddable, including but not limited to, scholarships and training fees, proposed in absolute monetary amount or equivalent value. The Pre-Qualified Bidder may propose a one-time or annual payment throughout the entire contract duration from the Commencement Date.

4.4.9 Thai Employee Ratio

The Pre-Qualified Bidder shall give priority to domestically sourced services for transport, construction and other items relating to petroleum activities, or to materials and tools available in Thailand.

The Thai Employee Ratio is biddable, in percentage, but must be at least 80% of total employees in the first year and at least 90% at the end of the fifth year of the contract.

4.4.10 State Participation

The Ministry of Energy reserves the right to assign a government body or government owned entity to participate as co-investor in the PSC, hereby termed the 'State Participation'.

The State Participation will be limited to a maximum of 25%. The government body designated to administer the State Participation will take an equity stake in the PSC as a full participant with equal rights and obligations as the consortium member(s) of the Successful Bidder.

Pre-Qualified Bidders are required to propose the terms and conditions pertaining to the full 25% State Participation as part of the PSC application submission.

5. Participation Rules

Companies that intend to apply for PSC must qualify under Section 24 of the Petroleum Act B.E. 2514 (1971) and have submitted the Participation Fee. The application is only considered complete when the Pre-Qualified Bidder submits all the required documents and Application Fee (as stated in section 7.1.1) together with the Bid Bond (as stated in section 7.1.2). The complete lists of documents required for application are as follows:

1) Application for Petroleum Production Sharing Contract: Form DMF/P11, Application Fee, Bid Bond, and proof of payment of the Participation Fees, as stated in section 7.1.1

2) Qualification documents in accordance to Section 24 of the Petroleum Act B.E. 2514 (1971) made in a sealed envelope with the 'Qualification Documents' title, name of the Pre-Qualified Bidder designated as the operator, and bidding block number, labelled on the front of the envelope.

3) Technical Proposal documents as stipulated in section 4.4.1 - 4.4.3 made in a sealed envelope with the 'Technical Proposal' title, name of the Pre-Qualified Bidder designated as the operator, and bidding block number, labelled on the front of the envelope.

4) Commercial Proposal documents and Thai Employee Ratio as stipulated in section 4.4.4 - 4.4.9 made in a sealed envelope with the 'Commercial Proposal' title, name of the Pre-Qualified Bidder designated as the operator, and bidding block number, labelled on the front of the envelope.

5) State Participation proposal as stipulated in section 4.4.10 made in a sealed envelope with the 'State Participation Proposal' title, name of the Pre-Qualified Bidder designated as the operator, and bidding block number, labelled on the front of the envelope.

All required documents for application of the PSC stipulated above must be submitted at Meeting Room 2, 21st Floor, Office of the Department of Mineral Fuels, Ministry of Energy on September 25, 2018 during 08.30 a.m. - 4.30 p.m. or according to further change announced.

6. Evaluation and Award of License

The following section describes the evaluation process to determine the Successful Bidder, and the process by which the Successful Bidder shall enter into contract signing with the Ministry of Energy, Thailand.

6.1 Legal Requirement

Every company that applies for the PSC must possess all the requirements stipulated in Section 24 of the Petroleum Act B.E. 2514 (1971). Section 24 states the following:

"An eligible applicant shall:

(1) be a company or companies, and

(2) command assets, machinery, equipment, tools and specialists to such extent that he shall be capable to explore for, produce, sell and dispose of petroleum.

In the event that the applicant does not possess all the qualifications under sub-paragraph (2) hereof, it shall be required to have another company which the Government finds reliable and which possesses all qualifications under sub-paragraph (2) hereof and which has relationship in capital or management with the applicant, guarantee that such company shall make available to the applicant assets, machinery, equipment, tools and specialists to such extent that the applicant shall be capable to explore for, produce, sell and dispose of petroleum."

If more than one company applies for the PSC in a single application, the designated operator must be a Pre-Qualified Bidder and must have a minimum of 35% of rights in the PSC.

6.2 Techno-Commercial Proposal

6.2.1 Technical Proposal Evaluation

Technical Proposal will be evaluated against the submitted Preparation Period Work Plan, Exploration Work Plan and Field Development Plan. These plans shall be made with reasonable and practical assumptions, consistent with the Minimum Production and Sale Quantity, V, and economic feasibility.

The Ministry of Energy reserves the right not to consider the Commercial Proposals of Pre-Qualified Bidders that have submitted Technical Proposals that has been made with unreasonable and impractical technical assumptions or that are inconsistent with the Minimum Production and Sale Quantity, V and Proposed Gas Price, Pr.

6.2.2 Commercial Proposal and Thai Employee Ratio Evaluation

The Ministry of Energy will evaluate the Commercial and Thai Employee Ratio Proposal in comparison with other proposals and in accordance to the following criteria:

- | | |
|---|-----------|
| 1) Price Constant (Pc) | 65 points |
| 2) Percentage of Contractors' Share of Profit Petroleum | 25 points |
| 3) Bonuses | 5 points |
| 3.1) Signature Bonus | |
| 3.2) Production Bonus | |
| 3.3) Proposal of supporting petroleum development in Thailand | |
| 4) Thai Employee Ratio | 5 points |

6.2.3 State Participation

The State Participation will be considered a co-investor on equal terms to the Successful Bidder by the Ministry of Energy; Pre-Qualified bidders' proposed terms and conditions for State Participation will be assessed for reasonableness based on these principles.

The Ministry of Energy reserves the right not to consider a Pre-Qualified bidder's PSC application submission if the Pre-Qualified Bidder does not propose terms and conditions pertaining to State Participation as detailed in section 4.4.10.

Ministry of Energy will consider the Technical Proposal, Commercial Proposal, Thai Employee Ratio Proposal, and State Participation Proposal in its consideration for selecting a Successful Bidder. The Pre-Qualified Bidder whose proposal provides the most benefit to the country and is considered to be most feasible will be selected as the Successful Bidder.

6.3 Process for Signing of PSC

After the announcement of the evaluation result, Ministry of Energy will notify the Successful Bidder of the date, time and place for signing of the PSC through an official letter. The Successful Bidder must submit Performance Guarantee and Signature Bonus as stipulated to DMF no later than ten (10) working days prior to the date set for signing of PSC.

If the Successful Bidder fails to make the payment of Signature Bonus, or submit Performance Guarantee, or sign the contract within the time limit stipulated, without reasonable justification, it shall be deemed that the Successful Bidder no longer wishes to be the Contractor. The Bid Bond of the Successful Bidder will be forfeited, and the Successful Bidder will have to bear responsibilities for any damages or loss suffered. The Successful Bidder will not be entitled to claim for damage or for any rights from the Government of Thailand.

7. Expenses

7.1 Bidding Fee

7.1.1 Application Fee

A Pre-Qualified Bidder is to submit an Application Fee in the amount of 50,0000 Baht (Fifty Thousand Thai Baht) per submission, in cash only on September 25, 2018 at Meeting Room 2, 21st Floor, Office of the Department of Mineral Fuels, Ministry of Energy between 08.30 a.m. - 4.30 a.m. The Application Fee is non-refundable.

7.1.2 Bid Bond

A Pre-Qualified Bidder is required to submit a Bid Bond in the amount of 3,000,000 Baht (Three Million Thai Baht) per submission. If a Pre-Qualified Bidder is not able to submit Bid Bond as stipulated in this document, Ministry of Energy may at its sole discretion terminate its consideration of the application. Bid Bond may be made in either of the following forms:

- 1) A cashier cheque or bank draft issued by a commercial bank with branches in Thailand payable to DMF. The date of the cheque or draft must be the actual payment date or not more than three (3) working days before the payment.
- 2) A Thai Government Bond
- 3) An Unconditional Bank Guarantee issued by a bank with branches in Thailand ⁽¹⁾ with a long-term Standard and Poor's rating of not less than BBB (or equivalent) according to international credit rating agencies.⁽²⁾ The guarantee period of Unconditional Bank Guarantee must not be less than one (1) year from the date of application.

Note

⁽¹⁾ Thai commercial bank with an investment grade credit rating assigned by external credit rating agencies. Specialised commercial banks established in countries without credit rating by external credit rating agencies are allowed to use Thailand credit rating instead.

⁽²⁾ External credit rating agencies refers to international credit rating agencies such as Moody's Investors Service, Standard and Poor's and Fitch Ratings or domestic credit rating agencies which are TRIS Rating and Fitch Rating (Thailand).

The Bid Bond shall be returned to non-Successful Bidder(s) and the Successful Bidder upon signing of PSC. Pre-Qualified Bidders shall submit a letter requesting the return of Bid Bond and DMF shall return the Bid Bond within 15 working days from the date of receipt of the letter of request.

If the Successful Bidder does not sign the PSC within the scheduled time, the Bidder shall be deemed to have forfeited its right to be awarded the PSC. In this event, the Bid Bond submitted by the Successful Bidder will be confiscated.

7.2 Expenses of the Successful Bidder

7.2.1 Performance Guarantee

A Successful Bidder is required payment of a Performance Guarantee to demonstrate its commitment to deliver the Minimum Production and Sale Quantity.

A Performance Guarantee shall be submitted in the amount of 5,000,000,000 Baht (Five Billion Thai Baht) in either of the following forms:

- 1) A cashier cheque or bank draft issued by a commercial bank with branches in Thailand payable to DMF. The date of the cheque or draft must be the actual payment date or not more than three (3) working days before the payment.
- 2) A Thai Government Bond
- 3) An Unconditional Bank Guarantee issued by a bank with branches in Thailand ⁽¹⁾ with a long-term Standard and Poor's rating of not less than BBB (or equivalent) according to the credit rating agencies.⁽²⁾ The guarantee period of Unconditional Bank Guarantee must not be less than five (5) years from the date of PSC signing.

Note

⁽¹⁾ Thai commercial bank with an investment grade credit rating assigned by external credit rating agencies. Specialised commercial banks established in countries without credit rating by external credit rating agencies are allowed to use Thailand credit rating instead.

⁽²⁾ External credit rating agencies refers to international credit rating agencies such as Moody's Investors Service, Standard and Poor's and Fitch Ratings or domestic credit rating agencies which are TRIS Rating and Fitch Rating (Thailand).

The Successful Bidder will be required to submit the Performance Guarantee upon the announcement of the Successful Bidder(s). The DMF shall provide confirmation by way of an official notice sent to the registered address in the bidding document(s). A Successful Bidder will be required to submit the Performance Guarantee to DMF at least 10 days prior the date of the PSC signing.

If the Successful Bidder does not submit the Performance Guarantee within the scheduled time, the Bidder shall be deemed to have forfeited its right to be awarded the PSC.

The Performance Guarantee shall be returned to the Contractor. The Performance Guarantee will be returned upon the production and sales of natural gas at a 90 consecutive days average of at least 800 mmscfd, excluding days of planned shutdown and Force Majeure.

Upon the issuance of an official request to DMF by the Contractor requesting for the return of the Performance Guarantee, DMF shall return the Performance Guarantee within 15 days from the date of verification of continuous production.

The Ministry of Energy reserves the right to forfeit the Performance Guarantee and terminate the PSC if the Contractor does not complete works in accordance to Preparation Work Plan Proposal or if production and sales of natural gas at a 90 consecutive days average of at least 800 mmscfd, excluding days of planned shutdown and Force Majeure, is not achieved by April 30, 2023.

7.2.2 Signature Bonus

A Successful Bidder will be required to submit the Signature Bonus as stipulated in 4.4.6 no later than 10 days prior to the signing date of the PSC. The Signature Bonus shall be submitted in the form of a cashier check or bank draft issued by a commercial bank with branches in Thailand which is payable to DMF. The date of the cheque or draft must be the actual payment date or not more than three (3) working days before the payment.

If the Successful Bidder does not submit a Signature Bonus within the scheduled time for PSC signing, the Successful Bidder is deemed to have forfeited its right to be the Contractor.

7.3 Expenses of the Contractor

7.3.1 Facility Bonus

The Successful Bidder that has signed the PSC will be required to pay the Facility Bonus in the amount of Three Hundred and Fifty Million Thai Baht (THB 350,000,000) for the right to utilize and operate any existing infrastructure and facilities owned by the Government in the Exploration Block No. G1/61. The Facility Bonus should be paid to DMF in three (3) separate and equal payments due on April 24 of the first three years starting on the Commencement Date of the PSC. The first payment must be paid by April 24, 2022.

7.3.2 Production Bonus

The Contractor is required to submit the Production Bonus the cumulative petroleum produced and sold reaches the committed volumes as stipulated in 4.4.7. Production Bonus(es) shall be submitted within 3 months from the date that the volume of accumulated petroleum produced and sold has reached committed level.

7.3.3 Supporting Contribution for the Petroleum Development in Thailand

The Contractor will be required to submit the Supporting Contribution for the Petroleum Development in Thailand as stipulated in 4.4.8. The Payment must be made annually throughout the entire contract duration by April 24, of each year. First payment shall be made by April 24, 2022.

7.3.4 Other Bonuses

A Contractor is required to submit the payment of Other Bonuses as stipulated in 4.4.8. which can be a one-time payment or annual payment throughout the entire duration of the contract.

Fees, Bonus and Other Bonuses as stipulated in section 7.3 should be submit in the form of a cashier check or bank draft issued by a commercial bank with branches in Thailand which is payable to DMF. The date of the cheque or draft must be the actual payment date or not more than three (3) working days before the payment.

8. Required Documents

All required documents for Techno-Commercial Evaluation must be signed by an authorised signatory of each Pre-Qualified Bidder. The required documents for Techno-Commercial Evaluation are as follows:

8.1 Participation documents

1) The Pre-Qualified Bidder must submit the Application for Petroleum Production Sharing Contract: Form DMF/P11 under the Ministerial Regulation Prescribing Rules, Procedures and Conditions on the Application and Award of Production Sharing Contract B.E. 2561 as shown in Appendix 5.

If more than one company applies for the PSC in a single application, the designated operator must be a Pre-Qualified Bidder and must have a minimum of 35% of rights in the PSC.

2) Application Fee under Ministerial Regulation Prescribing Schedule of Fees for the Concession, Production Sharing Contract and Service Contract B.E. 2561.

3) Bid Bond

4) Proof of payment of the Participation Fee

8.2 Qualification Documents required under Section 24 of the Petroleum Act B.E. 2514 (1971)

1) Documentary evidence proving the existence of the applicant including:

Certificate of Incorporation; (copy of the Certificate shall be certified within the last three months by an agency responsible for corporate registration. The certificate should include this following information:

- 1.1) Company Name
- 1.2) Date of Incorporation
- 1.3) Head Office Address
- 1.4) Registered Capital
- 1.5) Business Purposes
- 1.6) List of Shareholders

2) Evidence showing that the authorized signatory has ability to sign on behalf of the applicant; for example, list of board of directors, authorized signatory or power of attorney.

3) Evidence that the company commands assets, machinery, equipment, tools and professional experts to such an extent that it shall be capable to explore for, produce, sell and dispose of petroleum, for example, an annual report of the company, audited financial balance sheet or operational report for the recent three years with certification from a reliable institution.

If a consortium submits the application, all companies in the consortium must submit all the evidence required under item (1), (2) and (3). In the case where the assets, machinery, equipment, tools or experts commanded by a applicant are inadequate or incomplete, the applicant may furnish evidence that another company, which the Government of Thailand finds to be reliable, guarantees to make available to the party assets, machinery, equipment, tools or experts to such an extent that the applicant shall become capable to explore for, produce, sell and dispose of petroleum. The applicant must furnish evidence showing the guarantee in making available to the applicant, assets, machinery, equipment, tools or experts and evidence showing the relationship in capital or in management between the guarantor company and the applicant, as well as the evidence required under item (1), (2), and (3) hereof of the guarantor company.

In the case that the applicant and/or the guarantor company is a company established under foreign laws, the evidence required under item (1), (2) and (3), must also be accompanied by a verification issued by the embassy, legation or consular office of the country of its establishment, in Thailand, or issued by notary public or, if there is no notary public in the country where the applicant and/or the guarantor company was established, issued by a person having the same powers and duties as the notary public. The issued date in the verification must be notarized within 6 months.

8.3 Technical Proposal Documents

Technical Proposal must contain the following as stipulated under section 4

1) Preparation Period Work Plan

The Pre-Qualified Bidder must submit the Preparation Period Work Plan as stipulated in 4.2

2) Exploration Work Plan

The Pre-Qualified Bidder must submit the Exploration Work Plan which includes all details mentioned in Appendix 3

3) Field Development Plan

The Pre-Qualified Bidder must submit the Field Development Plan which includes all details mentioned in Appendix 4

8.4 Commercial Proposal and Thai Employee Ratio

The Commercial Proposal must include the Price Constant (Pc), Percentage of Contractors' Share of Profit Petroleum, Production Bonus, Supporting Contribution for the Petroleum Development in Thailand, Other Bonuses, and Thai Employee Ratio. Commercial Proposal should be submitted as per the example provided in Appendix 6

8.5 State Participation

Pre-Qualified Bidders must submit a State Participation proposal. The State Participation proposal must contain the terms and conditions as stipulated in section 4.4.10.

9. Reserves of Rights and Government Support

9.1 Reserves of Right

9.1.1 Ministry of Energy reserves the right to reject applications in which the Pre-Qualified Bidder:

- 1) Provides a submission after the date specified in section 5
- 2) Fails to pay the Application Fee and the Participation Fee required as per the Bidding Process, and submit the Bid Bond as stated in section 7
- 3) Fails to furnish the required documentation and information as stipulated in section 8
- 4) Provides a submission which is considered to be internally inconsistent including, but not limited to, inconsistencies or discrepancies between the technical and commercial proposals
- 5) Provides a submission which contains any false, inaccurate or misleading information, data or other details

9.1.2 Ministry of Energy reserves the right to cancel this Bidding Process, or to not award the PSC to any Pre-Qualified Bidder. The Successful Bidder is not entitled to claim for damage or for any rights from the Government of Thailand.

9.1.3 Terms, commitments, obligations and conditions stated in this document, and Techno-Commercial Proposal submitted by the Successful Bidder will be incorporated in the PSC.

9.1.4 The return of any Bid Bond or Performance Guarantee will not include any accumulated interest.

9.1.5 The Successful Bidder that has signed the PSC must undertake petroleum operations in strict compliance with the petroleum act and other relevant laws and regulations in Thailand.

9.1.6 No company or its Affiliates may make more than one submission for the exploration block, either individually or in a joint venture or consortium.

Affiliate means an affiliate company or an affiliate partnership pursuant to Section 39 of Revenue Code, including any companies or partnerships having relationship with the company in a manner that one party has a power to control the appointment and removal of all or most of the managing directors or managing partners of another party.

9.1.7 DMF has the right to contact any Pre-Qualified Bidder for clarification or request for additional document, without incurring any advantages or disadvantages to the other Pre-Qualified Bidders

9.1.8 Each Pre-Qualified Bidder shall bear all costs and expenses incurred in the preparation and submission of its application. Regardless of the final outcome of the Bidding Round (including any cancellation of the Bidding Round), Ministry of Energy will in no case be responsible or liable for any such costs and expenses incurred by the Pre-Qualified Bidder.

9.2 Government Support for Petroleum Exploration and Production Operation

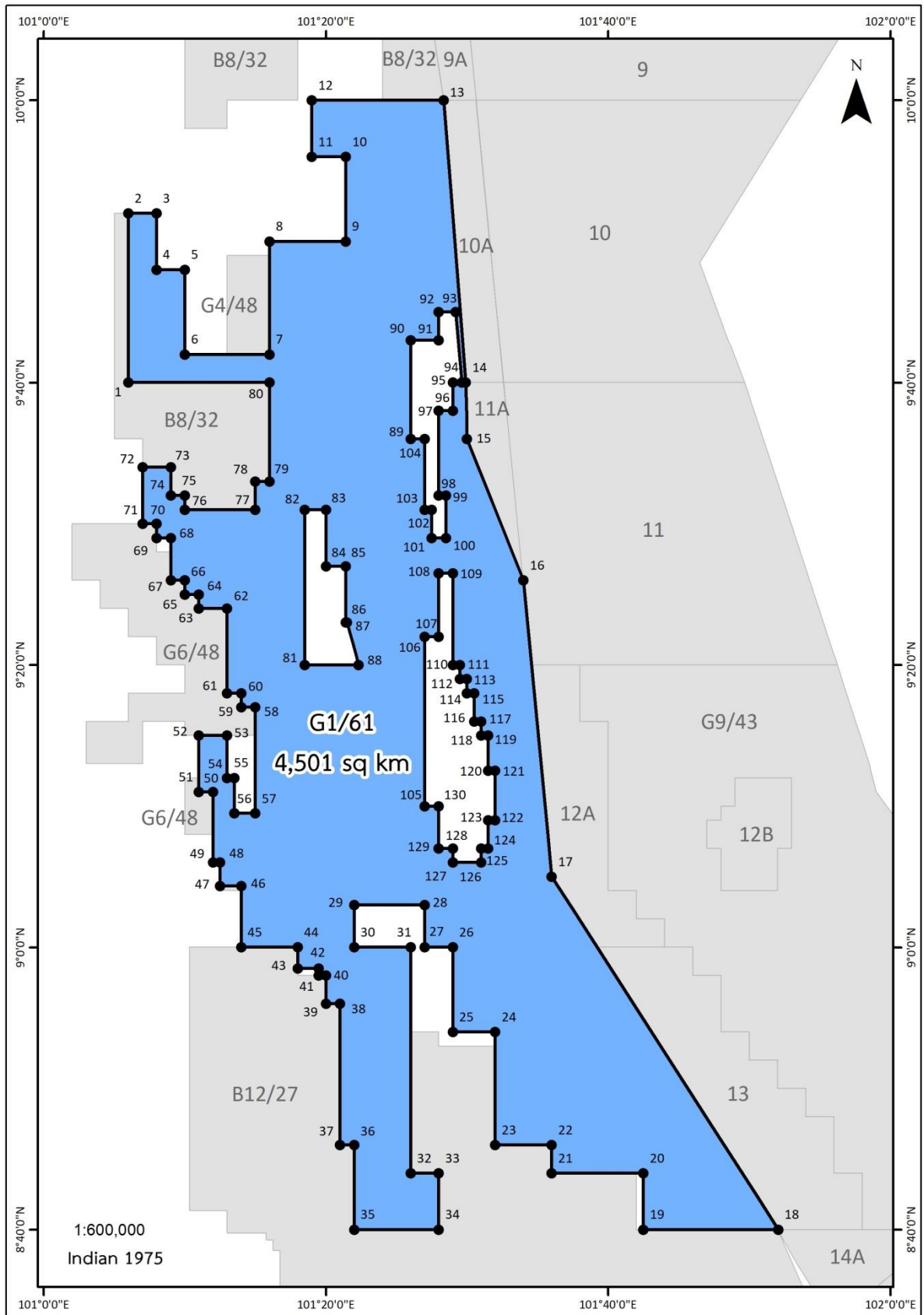
The Ministry of Energy will facilitate and will support coordination with other related parties to enhance the continuity and efficiency of petroleum production in this exploration block.

10. Points of Contact / Communication

More information is made available at DMF official website (www.dmf.go.th/bidding2018). Any questions regarding the Bidding Process must be submitted to DMF via email at PetroleumBidding@dmf.go.th by September 3, 2018. DMF may opt to respond to submitted questions via email to all Pre-Qualified Bidders. The last day for DMF's response to queries will be on the September 7, 2018.

Appendix 1: Map and Coordinates of Area Open for Bidding

Map 1 Exploration Block No. G1/61



Exploration Block No. G1/61 covers around 4,501 square kilometers in the Gulf of Thailand which marked by lines that connect between point number 1 to point number 130. The geographical indications of these 130 points are indicated as below.

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 1 | 09° 40' 00" | 101° 06' 00" |
| 2 | 09° 52' 00" | 101° 06' 00" |
| 3 | 09° 52' 00" | 101° 08' 00" |
| 4 | 09° 48' 00" | 101° 08' 00" |
| 5 | 09° 48' 00" | 101° 10' 00" |
| 6 | 09° 42' 00" | 101° 10' 00" |
| 7 | 09° 42' 00" | 101° 16' 00" |
| 8 | 09° 50' 00" | 101° 16' 00" |
| 9 | 09° 50' 00" | 101° 21' 25" |
| 10 | 09° 56' 00" | 101° 21' 25" |
| 11 | 09° 56' 00" | 101° 19' 00" |
| 12 | 10° 00' 00" | 101° 19' 00" |
| 13 | 10° 00' 00" | 101° 28' 20" |
| 14 | 09° 40' 00" | 101° 29' 55" |
| 15 | 09° 36' 00" | 101° 30' 00" |
| 16 | 09° 26' 00" | 101° 34' 00" |
| 17 | 09° 05' 00" | 101° 36' 00" |
| 18 | 08° 40' 00" | 101° 52' 04" |
| 19 | 08° 40' 00" | 101° 42' 30" |
| 20 | 08° 44' 00" | 101° 42' 30" |
| 21 | 08° 44' 00" | 101° 36' 00" |
| 22 | 08° 46' 00" | 101° 36' 00" |
| 23 | 08° 46' 00" | 101° 32' 00" |
| 24 | 08° 54' 00" | 101° 32' 00" |
| 25 | 08° 54' 00" | 101° 29' 00" |
| 26 | 09° 00' 00" | 101° 29' 00" |
| 27 | 09° 00' 00" | 101° 27' 00" |
| 28 | 09° 03' 00" | 101° 27' 00" |
| 29 | 09° 03' 00" | 101° 22' 00" |
| 30 | 09° 00' 00" | 101° 22' 00" |
| 31 | 09° 00' 00" | 101° 26' 00" |
| 32 | 08° 44' 00" | 101° 26' 00" |
| 33 | 08° 44' 00" | 101° 28' 00" |
| 34 | 08° 40' 00" | 101° 28' 00" |

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 35 | 08° 40' 00" | 101° 22' 00" |
| 36 | 08° 46' 00" | 101° 22' 00" |
| 37 | 08° 46' 00" | 101° 21' 00" |
| 38 | 08° 56' 00" | 101° 21' 00" |
| 39 | 08° 56' 00" | 101° 20' 00" |
| 40 | 08° 58' 00" | 101° 20' 00" |
| 41 | 08° 58' 00" | 101° 19' 30" |
| 42 | 08° 58' 30" | 101° 19' 30" |
| 43 | 08° 58' 30" | 101° 18' 00" |
| 44 | 09° 00' 00" | 101° 18' 00" |
| 45 | 09° 00' 00" | 101° 14' 00" |
| 46 | 09° 04' 20" | 101° 14' 00" |
| 47 | 09° 04' 20" | 101° 12' 30" |
| 48 | 09° 06' 00" | 101° 12' 30" |
| 49 | 09° 06' 00" | 101° 12' 00" |
| 50 | 09° 11' 00" | 101° 12' 00" |
| 51 | 09° 11' 00" | 101° 11' 00" |
| 52 | 09° 15' 00" | 101° 11' 00" |
| 53 | 09° 15' 00" | 101° 13' 00" |
| 54 | 09° 12' 00" | 101° 13' 00" |
| 55 | 09° 12' 00" | 101° 13' 30" |
| 56 | 09° 09' 30" | 101° 13' 30" |
| 57 | 09° 09' 30" | 101° 15' 00" |
| 58 | 09° 17' 00" | 101° 15' 00" |
| 59 | 09° 17' 00" | 101° 14' 00" |
| 60 | 09° 18' 00" | 101° 14' 00" |
| 61 | 09° 18' 00" | 101° 13' 00" |
| 62 | 09° 24' 00" | 101° 13' 00" |
| 63 | 09° 24' 00" | 101° 11' 00" |
| 64 | 09° 25' 00" | 101° 11' 00" |
| 65 | 09° 25' 00" | 101° 10' 00" |
| 66 | 09° 26' 00" | 101° 10' 00" |
| 67 | 09° 26' 00" | 101° 09' 00" |
| 68 | 09° 29' 00" | 101° 09' 00" |
| 69 | 09° 29' 00" | 101° 08' 00" |
| 70 | 09° 30' 00" | 101° 08' 00" |
| 71 | 09° 30' 00" | 101° 07' 00" |

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 72 | 09° 34' 00" | 101° 07' 00" |
| 73 | 09° 34' 00" | 101° 09' 00" |
| 74 | 09° 32' 00" | 101° 09' 00" |
| 75 | 09° 32' 00" | 101° 10' 00" |
| 76 | 09° 31' 00" | 101° 10' 00" |
| 77 | 09° 31' 00" | 101° 15' 00" |
| 78 | 09° 33' 00" | 101° 15' 00" |
| 79 | 09° 33' 00" | 101° 16' 00" |
| 80 | 09° 40' 00" | 101° 16' 00" |

However, this exploration block does not include these 3 following areas

Area 1 marked by lines that connect between point number 81 to point number 88. The geographical indication of points 81 - 88 are indicated as below.

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 81 | 09° 20' 00" | 101° 18' 30" |
| 82 | 09° 31' 00" | 101° 18' 30" |
| 83 | 09° 31' 00" | 101° 20' 00" |
| 84 | 09° 27' 00" | 101° 20' 00" |
| 85 | 09° 27' 00" | 101° 21' 24.5" |
| 86 | 09° 23' 00" | 101° 21' 24.5" |
| 87 | 09° 23' 00" | 101° 21' 30" |
| 88 | 09° 20' 00" | 101° 22' 19" |

Area 2 marked by lines that connect between point number 89 to point number 104. The geographical indication of points 89 - 104 are indicated as below

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 89 | 09° 36' 00" | 101° 26' 00" |
| 90 | 09° 43' 00" | 101° 26' 00" |
| 91 | 09° 43' 00" | 101° 28' 00" |
| 92 | 09° 45' 00" | 101° 28' 00" |
| 93 | 09° 45' 00" | 101° 29' 11.088" |
| 94 | 09° 40' 00" | 101° 29' 38.182" |
| 95 | 09° 40' 00" | 101° 29' 00" |
| 96 | 09° 38' 00" | 101° 29' 00" |
| 97 | 09° 38' 00" | 101° 28' 00" |
| 98 | 09° 32' 00" | 101° 28' 00" |
| 99 | 09° 32' 00" | 101° 28' 30" |
| 100 | 09° 29' 00" | 101° 28' 30" |
| 101 | 09° 29' 00" | 101° 27' 30" |

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 102 | 09° 31' 00" | 101° 27' 30" |
| 103 | 09° 31' 00" | 101° 27' 00" |
| 104 | 09° 36' 00" | 101° 27' 00" |

Area 3 marked by lines that connect between point number 105 to point number 130. The geographical indication of points 105 - 130 are indicated as below

| <u>No.</u> | <u>Latitude (North)</u> | <u>Longitude (East)</u> |
|------------|-------------------------|-------------------------|
| 105 | 09° 10' 00" | 101° 27' 00" |
| 106 | 09° 22' 00" | 101° 27' 00" |
| 107 | 09° 22' 00" | 101° 28' 00" |
| 108 | 09° 26' 30" | 101° 28' 00" |
| 109 | 09° 26' 30" | 101° 29' 00" |
| 110 | 09° 20' 00" | 101° 29' 00" |
| 111 | 09° 20' 00" | 101° 29' 30" |
| 112 | 09° 19' 00" | 101° 29' 30" |
| 113 | 09° 19' 00" | 101° 30' 00" |
| 114 | 09° 18' 00" | 101° 30' 00" |
| 115 | 09° 18' 00" | 101° 30' 30" |
| 116 | 09° 16' 00" | 101° 30' 30" |
| 117 | 09° 16' 00" | 101° 31' 00" |
| 118 | 09° 15' 00" | 101° 31' 00" |
| 119 | 09° 15' 00" | 101° 31' 30" |
| 120 | 09° 12' 30" | 101° 31' 30" |
| 121 | 09° 12' 30" | 101° 32' 00" |
| 122 | 09° 09' 00" | 101° 32' 00" |
| 123 | 09° 09' 00" | 101° 31' 30" |
| 124 | 09° 07' 00" | 101° 31' 30" |
| 125 | 09° 07' 00" | 101° 31' 00" |
| 126 | 09° 06' 00" | 101° 31' 00" |
| 127 | 09° 06' 00" | 101° 29' 00" |
| 128 | 09° 07' 00" | 101° 29' 00" |
| 129 | 09° 07' 00" | 101° 28' 00" |
| 130 | 09° 10' 00" | 101° 28' 00" |

Appendix 2: Summary of Preparation Period Work Plan

| Preparation Plan | Commencement | Target Completion |
|--|---------------------|--------------------------|
| 1. Annual Preparation Work Plan | | |
| 2. First Year Work Program and Budget | | |
| 3. Facility Access Agreement | | |
| 4 Detailed facilities and infrastructure assessment | | |
| 5 Commercial Agreement | | |
| 6 Common Use of Production Facilities Agreement | | |
| 7 Staff and Job Handover Agreement | | |
| 8 Gas Sales Agreement | | |
| 9 Environmental Impact Assessment | | |
| 10 Well head platform construction | | |
| 11 Drilling for petroleum production | | |
| 12 Application of Petroleum Production Area | | |

Appendix 3: Exploration Work Plan

Exploration Work Plan must at least include detail for the following topics

1. Geology
 - 1.1. Geological Structure
 - 1.2. Stratigraphy sequences
 - 1.3. Petroleum System
2. Geophysical data and well data
 - 2.1. Seismic exploration and its interpretation
 - 2.2. Well data and its interpretation
 - 2.3. The analysis of current seismic exploration and well data and its interpretation
 - 2.4. Others (if available)
3. Exploration Plan

Table of Key Exploration Activities and Expenses

| Work Plan | | | | | Expenditure (MMUS\$) | | | | |
|-------------------------------|-------------------------|-----------------------|---------------------------------|-------------------------|-----------------------------|-------------------------|-----------------------|---------------------------------|-------------------------|
| 2D/3D Seismic (km/km2) | Exploration Well | Appraisal Well | Geology & Geophysics | Other Activities | 2D/3D Seismic | Exploration Well | Appraisal Well | Geology & Geophysics | Other Activities |
| | | | | | | | | | |

Appendix 4: Field Development Plan

The Field Development Plan must include details of all topics stipulated in section 4.4.3. A summary of the Field Development Plan must also be submitted as per the example table below:

Summary of Field Development Plan (1)

| YEAR | Activities | | | | | | | | | Expenditure(MMUS\$) | | | | | | | | | | | | |
|-------------------|------------|-----------|-----------|-----|-----|----|-----|---------------|-------|---------------------|-----------|-----------|-----|-----|----|-----|---------------|-----------------|-----------|-------|-----|-----------|
| | | | | | | | | | | Capital Costs | | | | | | | | Operating Costs | | | | |
| | Exp. Well | App. Well | Dev. Well | WHP | CPP | LQ | FSO | Sealines (km) | Other | Exp. Well | App. Well | Dev. Well | WHP | CPP | LQ | FSO | Sealines (km) | Other | Sub Total | Opex. | FSO | Sub Total |
| 2018 | | | | | | | | | | | | | | | | | | | | | | |
| 2019 | | | | | | | | | | | | | | | | | | | | | | |
| 2020 | | | | | | | | | | | | | | | | | | | | | | |
| 2021 | | | | | | | | | | | | | | | | | | | | | | |
| 2022 | | | | | | | | | | | | | | | | | | | | | | |
| 2023 | | | | | | | | | | | | | | | | | | | | | | |
| 2024 | | | | | | | | | | | | | | | | | | | | | | |
| 2025 | | | | | | | | | | | | | | | | | | | | | | |
| ... | | | | | | | | | | | | | | | | | | | | | | |
| End of PSC | | | | | | | | | | | | | | | | | | | | | | |
| ... | | | | | | | | | | | | | | | | | | | | | | |
| End of Field Life | | | | | | | | | | | | | | | | | | | | | | |
| Total | | | | | | | | | | | | | | | | | | | | | | |

Summary of Field Development Plan (2)

| YEAR | Sale Volume | | | Revenue | | | Decommissioning Activities | | | | | | | | | Decommissioning Expenditures (MMUS\$) | | | | | | | | | |
|-------------------|-------------|------------|---------|----------|------------|----------|----------------------------|-----------|-----------|-----|-----|----|-----|---------------|-------|---------------------------------------|-----------|-----------|-----|-----|----|-----|---------------|-------|-----------|
| | Gas | Condensate | Oil | Gas | Condensate | Oil | | | | | | | | | | | | | | | | | | | |
| | (MMscf) | (MMbbl) | (MMbbl) | (MMUS\$) | (MMUS\$) | (MMUS\$) | Exp. Well | App. Well | Dev. Well | WHP | CPP | LQ | FSO | Sealines (km) | Other | Exp. Well | App. Well | Dev. Well | WHP | CPP | LQ | FSO | Sealines (km) | Other | Sub Total |
| 2018 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2019 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2020 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2021 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2022 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2023 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2024 | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2025 | | | | | | | | | | | | | | | | | | | | | | | | | |
| ... | | | | | | | | | | | | | | | | | | | | | | | | | |
| End of PSC | | | | | | | | | | | | | | | | | | | | | | | | | |
| ... | | | | | | | | | | | | | | | | | | | | | | | | | |
| End of Field Life | | | | | | | | | | | | | | | | | | | | | | | | | |
| Total | | | | | | | | | | | | | | | | | | | | | | | | | |

Appendix 5: Application for Petroleum Production Sharing Contract Form (DMF/P11)

DMF/P11



Application for a Production Sharing Contract

Written at.....

Date..... Month..... Year.....

We,

(1) (Company)..... established or permitted under the laws of (country)..... having head office at..... and a main office in Thailand at..... having.....% rights in the application, represented by..... who has the power to sign on behalf of the company and the authority to bind the company, and

(2) (Company)..... established or permitted under the laws of (country)..... having head office at..... and a main office in Thailand at..... having.....% rights in the application, represented by..... who has the power to sign on behalf of the company and the authority to bind the company, and

(3) (Company)..... established or permitted under the laws of (country)..... having head office at..... and a main office in Thailand at..... having.....% rights in the application, represented by..... who has the power to sign on behalf of the company and the authority to bind the company,

With (Company)..... as the operator under the document attached hereto, hereby files with the Department of Mineral Fuels an application for a production sharing contract for the purpose of exploring for and/or producing petroleum for an Onshore Exploration Block and/or Offshore Exploration Block (Gulf of Thailand/Andaman) No. having an approximate area of square kilometers

The details of the area descriptions are as follows

.....
.....
.....
.....

The Exploration Block is located within the boundaries as shown in the map attached hereto. If the detailed area descriptions as stipulated herein do not confirm to the boundaries as shown in the map, the Exploration Block shall be determined in accordance to the description area.

Signature.....PSC Applicant

Signature..... PSC Applicant

Signature..... PSC Applicant

- Remarks
1. Please cross out unwanted words or paragraphs
 2. If the applicant consists of more than three companies, please specify in the application form the name of the other company, details of establishment, address of the head office and the main office in Thailand, percentage of the right in the application, and authorised representative who has the power to sign on behalf of each company and the authority to bind the company
 3. The operator must also be the applicant

Record of the Competent Officer

Received and registered this Application for a profit sharing contract on Date
Month..... Year..... Time

Signature

Position

Appendix 6: Summary of Bidding Proposal

1. Price Constant (Pc) Baht per million BTU (2 decimal places)
2. Percentage of Contractors' Share of Profit Petroleum of % of the total petroleum profit (2 decimal places)
3. Signature Bonus of million Baht
4. Production Bonus of million Baht for each time the cumulative petroleum produced and sold reaches 100, 200 and 300 million barrels of oil equivalent (BOE)
5. Supporting Contribution for the Petroleum Development in Thailand of million Baht per year throughout the entire contract duration.
6. Other Bonuses with the total value of million Baht
.....
.....(Description of other bonuses proposal)
.....
7. Thai Employee Ratio of at least 80% of total employee in the first year and at least 90% at the end of the fifth year
 - 7.1. % of total employee in the first year
 - 7.2. % of total employee at the end of the fifth year

Note: Values are to be expressed in letters and numerals