

INVITATION TO SUBMIT EXPRESSIONS OF INTEREST (“EOI”)



INTRODUCTION

BHP Billiton Petróleo Operaciones de México, S. De R.L. De C.V. (“BHP”) is currently progressing appraisal activities in the Trion field in Mexico to assess the viability of its development. If the field is declared commercial, the development will require an in-field drilling and completion program (“Drilling Program”) with the use of Surface Controlled Subsurface Safety Valves (SCSSSV).

PURPOSE OF THIS EOI

BHP is soliciting the interest of reputable Drilling Contractors (hereinafter referred to as “Contractors”) experienced in the provision of Surface Controlled Subsurface Safety Valves (SCSSSV), to develop a list of suitable Contractors who may subsequently be invited into the bidding process for the execution of the herein described Scope of Work. This process may eventually lead to the award of a contract for the provision of SCSSSV.

The EOI seeks to provide prospective Contractors with relevant background information regarding the Trion project and to describe the information to be submitted by prospective Contractors in order to assist BHP in compiling a list of suitable Contractors for further assessment.

Key project metrics and specifications are as follows:

Trion Surface Controlled Subsurface Safety Valves (SCSSSV) SOW Summary	
General Data	
<i>Location</i>	Deep Water Mexico, Trion Contract Area
<i>Water Depth</i>	~ 2,500 m / 8,200 ft
<i>Well Depth Range</i>	~ 4,500 - 5,500 m MD/ 14,800 - 18,000 ft MD
<i>BHT Range</i>	55 - 85 °C / 132 - 185 °F (4°C / 40°F Seabed Temp)
<i>Number of wells</i>	11 to 18
<i>Casing* @ Setting Depth</i>	Bae Case: 14” 115 ppf P110 HC (REQUIRED) Contingency: 9.875” 62.8 ppf P110 (DESIREABLE)
<i>Setting Depth</i>	820-915m Below Mud Line (2,700’-3,000’)
<i>Rig</i>	TBD
<i>Work Schedule</i>	Work execution estimated between: 2024 – 2027 Surface sections to be batch drilled. Average total well drilling duration (including batch section) is 26 days. Average total well completion duration is 36 days.
Well Design - Equipment & Tools	
<i>Brine System</i>	9.6 ppg – 10.8 ppg CaCl ₂ / 7% KCl / 30% MEG system Packer fluid will contain corrosion inhibitor & biocide
<i>Production Wells</i>	Intermediate Casing: 14” 115 ppf P110 HC, WLSF Tubing: 4.5” 12.6 ppf 13Cr95 Produced Fluids: Oil, gas, and water (0 H ₂ S, >1.5 mole % CO ₂) Flowing Press & Temp @ Valve: 800-6,000 psi / 65-73C (149-164F)

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Trion Surface Controlled Subsurface Safety Valves (SCSSSV) SOW Summary	
<i>Water Injection Wells</i>	<p>Intermediate Casing: 14” 115 ppf P110 HC, WLSF</p> <p>Tubing: 5.5” 17 ppf 1Cr95 x 4.5” 15 ppf 1Cr95 (valve @ crossover)</p> <p>Injected Fluids: Seawater (< 40 mg/L SO₄, <10 ppb O₂)</p> <p>Flowing Press & Temp @ Valve: 3,800-10,200 psi / 6-8C (43-47F)</p>
<i>Gas Injection Wells</i>	<p>Intermediate Casing: 14” 115 ppf P110 HC, WLSF</p> <p>Tubing: 4.5” 12.6 ppf 13Cr95</p> <p>Injected Fluids: Produced gas (0 H₂S, >1.5 mole % CO₂, 2 gal/MMSCF water)</p> <p>Flowing Press & Temp @ Valve: 6,800-9,000 psi / 0-8C (32-47F)</p>
<i>*Contingency Casing Tie-Back</i>	In event that 14” casing does not pass hydro-test, a 9-7/8” 62.8# tie-back will be run. SCSSSV must be installable complete with all required bypass lines.
<i>Hydraulic Supply</i>	Water-based control fluid. Maximum available hold-open pressure at valve estimated to be 12600 PSIA at 11500 ft (3500m) TVD
<i>Lines to Pass SCSSSV</i>	<p>1 ea CI (0.535” encapsulated OD)</p> <p>1 ea DHFC (0.41” x 0.99” encapsulated OD)</p> <p>1 ea TEC (0.433” encapsulated OD)</p> <p>1 ea DAS (0.433” encapsulated OD)</p>
<i>Back-up Equipment</i>	100% Tool redundancy on rig
Services	
<i>Technical Support and Facilities</i>	<p>All necessary equipment and services required to execute the drilling programs and well designs including:</p> <ul style="list-style-type: none"> • Onshore support base • Valve Design Calculations and/or modeling • Technical engineering support in BHP's office in CDMX. • Appropriate facilities for storage and maintenance of equipment. • Qualified engineers, technicians, supervisors and operators for equipment maintenance and services. <p><i>Note: All fluids, equipment and facilities must be fully compliant with local regulations and industry best practices.</i></p>
Logistics	
<i>Trion Field Location</i>	180 km East off the coast of Tamaulipas (Matamoros)
<i>BHP Rig operations Shorebase</i>	<p>Likely to be in Altamira/Tampico</p> <p><i>Note: If required contractor to provide transportation of the Contractor's Equipment and Contractor's Goods and Consumables between Contractor's Operations Base and BHP's Supply Base or Shorebase.</i></p>
<i>Heliport</i>	Likely to be in Matamoros
Minimum Personnel Requirements	
<i>Contract Coordinator / Engineer</i>	Yes, at supplier's Mexico office

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Trion Surface Controlled Subsurface Safety Valves (SCSSSV) SOW Summary	
Field Engineer	Yes, offshore (1)
HSE	
Minimum requirements	Must comply with BHP's HSE requirements and local regulations, including COVID-19 protocols (if applicable).

Any entity responding to this EOI must have the capacity and capability to provide and safely provide and install the SCSSSV with the related equipment that meet or exceed the specification noted above without co-venturing for supply.

Note: The scopes and specifications presented in this document are the most accurate estimates at this time and are subject to change. Any information included in this EOI is not to be associated with any other EOI or tender from BHP.

INFORMATION REQUIRED FROM PROSPECTIVE CONTRACTORS

Interested Contractors must provide the information requested below in order to be considered for further assessment (this information is also listed in the attached Expression of Interest (EOI) Response Form).

Company Name:	
Legal Entity Name (if different from Company Name):	
Company Type (Please check one):	<input type="checkbox"/> Local <input type="checkbox"/> Foreign <input type="checkbox"/> Joint Venture (JV) <i>If JV, please list involved Companies:</i>
Mailing Address:	
Country:	
Designated Contact (name and title):	
Email Address:	
Telephone:	
Year Company founded:	
Website URL:	
Please list your top three (2-3) competitors:	
Please list your top five (5) clients:	
Number of years' experience operating in Mexico:	
Deepwater Operating Experience:	
Anticipated lead time (per well if possible) required to support the proposed scope:	

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Anticipated Mexican content (local Content) in your operation:	
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Confirmation of Interest – prospective Contractor is requested to confirm their company interest and compliance with requirements outlined in this EOI Letter by completing and signing the EOI Response Form.

EOI RESPONSE SUBMISSION REQUIREMENTS

Prospective Contractors interested in participating in the identification/assessment process must download, complete and sign the EOI Response Form attached. This Form should be signed by a legal representative of the Contractor. The representative’s name should also be printed where requested. The electronic version of the Form is located at <https://www.bhp.com/our-businesses/petroleum/trion/>, and submit to the following inbox:

BHP Petroleum (BHP)
Jessica.Ruiz@bhp.com

Submissions should be made electronically by no later than close of business 5:00 pm (CST) on 15th April 2021. BHP reserves the right not to accept submissions after this time. Submissions must be kept short and concise. Please endeavor to keep the submission under **5 MB**, if possible.

Please note that this invitation to submit expression of interest does not constitute a formal request for quotation or proposal, nor is it intended to create any expectations regarding future business dealings between BHP and recipient.

All EOI documents will become and remain BHP’s property. BHP shall not be liable in any respect for any costs, damages, charges or expenses incurred by the contractor in relation to preparing or submitting this EOI response. BHP reserves the right to accept or reject any or all EOI submissions that may be received related to the services requested. BHP reserves the right to change the requirements of this EOI, terminate further participation in the EOI process and change or terminate the contracting process at any time.

Thank you in advance for your willingness to respond to this EOI. We look forward to hearing from you. Should you have any questions or issues regarding the process outlined above, please contact the undersigned at Jessica.Ruiz@bhp.com

Sincerely,

Jessica Ruiz Velasco
Principal Category Management
BHP Billiton Petroleum

Enclosures:
Expression of Interest (EOI) Response Form