

OIL AND GAS DEVELOPMENT COMPANY LIMITED

Nashpa Oil Field- KPK

SCHEDULE OF REQUIREMENT

ANNEXTURE - A-1

Subject: <u>Procurement of Corrosion Inhibitor Oil Soluble Chemical for Nashpa Oil Field.</u>

Corrosion Inhibitor Oil Soluble is required for Nashpa Oil Field flow lines to protect the internal corrosion of flow lines.

Terms and Conditions

1. Company Information

i.	Full Name, registered address, web site, email address, landline telephone numbers of bidder. Name of the authorized person(s) / signatory of the bid, his / her designation, contact numbers (both land line and cell number), email address for any correspondence etc. In case of local agent / representative, the bidder shall have to provide ORIGINAL AUTHORITY LETTER issued by manufacturer to bidder for quoting their product and	Bidder to provide as mandatory requirement & Original authority letter is also
ii.	ISO 9001-2008 quality management certificate for manufacturing plant / blending facility.	mandatory Bidder to provide firm info of only one facility / country.

2. <u>Product Information</u>

i.	Brand Name of offered product.	
ii.	MSDS Sheet clearly showing / mentioning range of active ingredients.	
iii.	Bidder should provide specific residual test method, residual test frequency and satisfactory range of residue along with bid.	Bidder to provide & Confirm all
iv.	Compatibility with other chemicals (i.e. demulsifier, scale inhibitors, encapsulated corrosion inhibitors).	required information
v.	Total 7 years of manufacturing & sale of chemicals for oil and gas field applications.	
vi.	Minimum shelf life of product should not be less than 3 years.	

vii.	Complete product data memorandum, chemical specification, application notes, storage, and handling, dosing rate and disposal recommendations.	
viii.	The supplier is required to provide verification / certification of quality control specifications of the offered corrosion inhibitor issued by blending factory.	
	Specs for Corrosion Inhibitor	
	Relative Density	
	• Odour	
	Quaternary Ammonium range of active ingredients compounds in aromatic solvent	
	• Specific Gravity 0.85-0.89 @ 60 °F.	
	• Viscosity 10-14 cst. (ASTM D-445)	
	Chemical Nature Fatty Alkyl Imidazoline Salts in	Bidder to provide
ix.	aromatic solvent	the specs and
	Appearance Clear amber green	range of active ingredients
	Solubility oil soluble	
	● pH 6-9	
	• Flash Point 81 °C	
	Stability for storage	
	Amine Contents 15% minimum of tertiary amines	
	Surfactant	
	Physical Appearance Amber liquid	
x.	For the proposed corrosion inhibitors based on specified water / crude / gas analysis, bidder to carry out Simulation / Laboratory Tests (Bubble test, Flow loop & Autoclave tests) or other high-tech selection criteria for compatibility and effectiveness of offered product and results to be attached with technical bid.	
xi.	Effective Dosage Rates of Corrosion Inhibitor in range of 0.25~1.0 Ltr / MMSCFD and 20-50 PPM based on specific lab tests as per attached data.	Bidder to provide & Accept
xii.	The bidder is also required to provide as evidence the end user comments/recommendations on the company letter head (supplied to any E & P company in Pakistan or worldwide) where the offered inhibitor has been supplied and used showing that the same offered product has worked with satisfactory results.	

3. Record / Clientage / Credentials (Both local & International)

(This is a mandatory requirement. Any bidder failing to provide shall be declared as Non-responsive.)

S.No.	Name of client / Company with address, phone No., email etc	Contact person(s) with designation	Contract / Purchase Order No. (copies to be provided)	Quantity supplied
i.				
ii.				
iii.				

4. Packing and delivery

i.	Pelletized packing as per International Standards and manufacture recommendation with proper labelling product name , Batch No, DOM & DOE.	
ii.	The drums shall be packed in wooden pallets as per internationally acceptable standards suitable for sea and road transportation.	
iii.	 Each drum shall contain minimum following information Product Name, supplier's name, consignee's name etc. Manufacturing and expiry dates. Product batch number, Contract details, Port of shipment Country of origin. Approx. weight of drum in Ltrs / US gallons. (55 US gallons /208Liters) 	Bidder to comply
iv.	Delivery period: Within 84 calendar days (12 weeks) after issuance of Purchase Order	Bidder to accept
٧.	Bidder will provide/deliver the chemical at Nashpa field, on FOR basis.	Bidder to comply
vi.	LD charges in case of Late delivery will be imposed as penalty up to maximum of 5% of the amount of PO excluding GST as per tender document in accordance to tender document clause # 14	Bidder to accept

5. <u>Inspection of Material</u>

i.	Supplier will provide material as per specification along with 3 rd party inspection firm vetted chemical analysis of batch(es) and Quality Inspection Report of Manufacturer, Foreign Documents as a proof of genuine buying etc.	Bidder to comply
ii.	Detailed Inspection of Supplied material will be carried out by OGDCL at site.	Bidder to accept

6. For Invoicing

Description with Brand Name	Quantity	Unit Rate	Total Cost		
Oil Soluble Corrosion Inhibitor (Brand XXX)		(PKR/Ltr)/drum	(PKR)		
	(PKR)				
	Total Cost Incl. G	SST (PKR)	(PKR)		

7. <u>Mode & Schedule of Payment</u>

i.	-	Payment will be made through cross cheque from H.O OGDCL, after delivery and inspection of supplied material at site.	Bidder to accept
ii	i.	Partial Payments will not be made, in any case.	
ii	ii.	Performance Bank Guarantee will be released as per clause # 10 of Tender Documents and Annexure-I	

8. <u>Bidding Ceremony</u>

i	OGDCL encourages the bidders to Participate in Bidding ceremonies, in	Bidder to accept
'	person.	bluder to accept

Note: Bidders are requested to read this document carefully and provide complete information required in this TOR. All information required in the <u>Technical Evaluation Criteria</u> must be provided. OGDCL reserves the right to reject Proposals with in-complete or partial information

9. Field Crude Oil And Water Analysis

7.1. <u>Produced Water Analysis/Nashpa Field (From HMC HP Separator)</u>

Test	Unit	Result
PH	-	5.89
TDS	mg/ltr	108
Chlorides	mg/ltr	22
TSS	mg/ltr	72
Calcium	mg/ltr	03
Iron	mg/ltr	9.76
Manganese	mg/ltr	10.25

7.2. Gas Analysis

Sr.No	Gas Components	Nashpa Raw Gas	High Pressure raw Gas (6" Line)	Sale Gas Outlet	LPG Run Down
01	Methane C1	82.7272	86.8059	90.5095	NIL
02	Ethane C2	8.2643	6.5300	6.8045	
03	Propane C3	4.7316	2.7740	0.4174	
04	Iso-Butane i-C4	0.7235	0.4647	0.0387	
05	N-butane n-C4	1.2293	0.7749		
06	Iso-pentane i-C5	0.3346	0.2361	0.000	
07	N-pentane n-C5 0.2829		0.2040	0.000	-
08	Hexane Plus C6+	0.2258	0.1840	0.000	-
09	Co2	1.2497	1.7832	1.9421	-
10	Nitrogen N2	0.2311	0.2432	0.2878	-
11	Specific Gravity	0.7011	0.6637	0.6127	-
12	Calorific Value Btu/Cu Ft	1204.62	1132.70	1048.80	-

7.3. Crude Analysis well wise

Sr.No	Location	Qgross (Bbls)	Qoil (Bbls)	Qwater (Bbls)	QNGL (Bbls)	QLPG (MT)	Qgas (MMSCF)	API Gravity	BS &W (%)	Salt (PTB)	Chloride	Remarks
01	Nashpa #01	2652	2580	72	222.1807	124.7639	31.0074	44.93	0.8	2.4	-	
02	Nashpa #02	2239	2149	90	72.1736	36.3161	9.3082	37.76	0.10	2.6	-	
03	Nashpa #03	1314	1249	65	112.0292	35.8183	9.5354	41.27	0.80	2.8	-	
04	Nashpa #04	1957	1902	55	29.3895	10.3241	2.8443	34.19	1.20	2.4	-	
05	Nashpa #05	0	0	0	0	0	0	0	0	0	-	Well Shut-in
06	Nashpa #06	488	235	253	6.2202	2.1475	0.6690	36.75	20.0	2.6	-	
07	Nashpa #07	1945	1860	85	340.2937	46.5968	7.4201	37.76	0.08	2.4	-	
08	Nashpa #08	1564	1475	89	274.4435	92.2860	28.2659	51.08	25.00	2.4	-	
09	Nashpa #09	686	604	82	28.8508	8.2572	1.6885	37.76	10.0	2.4	-	
10	Nashpa #10	708	678	30	22.4188	8.4901	2.0571	41.1420	1.00	2.4	-	