

**QUESTIONNAIRE FOR TURBOCHARGER (TC) FOR P-75 SUBMARINES
(MAKE -II)**

Ser	<u>Determinants</u>	<u>Firm's Remarks</u>
<u>Company Details</u>		
1.	Name and registered office address	
2.	Factory/ Work address	
3.	Category of industry – Large scale/ SME/ MSME	
4.	Details of Supply Orders executed in last 03 yrs	
5.	Organisation structure and details of manpower held:- (a) Technical – Skilled and unskilled. (b) Administrative.	
6.	Past business details with <i>IN</i>	
<u>Financial Status</u>		
7.	Profit and Loss Account	
8.	Average Annual Turnover, in last 03 years	
9.	Present Net worth	
10.	Present source of finance and borrowing limit (Bank details)	
<u>Technical Details</u>		
11.	Competence in design, manufacture and simulation of Diesel Engine (DE) Turbochargers.	
12.	Capability to integrate the developed turbochargers with in service DE.	
13.	R&D capability and facilities:- (a) Details of R&D infrastructure held (b) Details of technical manpower held for R&D efforts	
14.	In-house manufacturing facilities and infrastructure:- (a) Forging (b) Casting (c) Machining (d) Heat treatment (e) Metallurgy (f) CAD/CAM (g) Robotics	

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	(h) Tools/ Metrology (facility and calibration accreditation)	
15.	In-house testing facilities	
16.	Capability for simulation testing of developed TC.	
17.	Details of IPR held	
18.	Details of IPR translated to field products	
19.	<p>Quality Assurance:-</p> <p>(a) Organisation structure of QA and QC department.</p> <p>(b) Compliance to ISO 9001:2015 Quality Management system (Certificate to be enclosed)</p> <p>(c) Are the manufacturing/ assembly processes statistically quality controlled.</p> <p>(d) Are all Critical to Quality Processes (CTP) and parameters Critical to Quality (CTQ) identified.</p> <p>(e) Is the process Capability index (Cpx) measured and ensured more than 1.33.</p>	
20.	Estimated timelines for prototype development with milestones	
21.	Estimated timelines for production of final product as per <i>IN</i> requirement, post successful prototype development	
22.	Details of standards to be followed for development, manufacture and testing of Turbocharger.	
23.	Envisaged indigenous content in the TC and controls	
24.	<p>Adequacy of infrastructure capabilities for TC production and spare manufacture to meet <i>IN</i> requirements:-</p> <p>(a) Requirement of setting up of new assembly line or augmenting/repurposing the existing assembly line.</p> <p>(b) Requirement of erecting a new test bed or augmenting/ repurposing the existing test bed.</p>	
25.	<p>Costing:-</p> <p>(a) Cost of prototype development and their basis.</p> <p>(b) Cost of final product and their basis.</p>	
26.	<p>Roadmap for providing onsite after-sales basis:-</p> <p>(a) Spares (indigenous and imported)</p> <p>(b) DI and repair services.</p>	

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	(c) Capability to undertake AMC/ RRC/RC	
27.	Any other details that the vendor like to put forwards to the feasibility study board	
28.	Contact details	Name of Officer – Lt Cdr K Rumesh Menon Designation – Lt Cdr (Marine Engg) Tele No. – 011-23010294 Fax No. – 011-23011352 Mobile No. – 9495900304 Email ID – dme-navy@nic.in