



भारत सरकार / Government of India
अंतरिक्ष विभाग / Department of Space
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यांत्रिकी संविरचन हेतु दर संविदा के लिए इच्छा की अभिव्यक्ति का आमंत्रण(ई ओ आई)
INVITATION FOR EXPRESSION OF INTEREST [EOI] for Rate Contract for
Mechanical Fabrication

अंतरिक्ष विभाग, भारत सरकार के अंतर्गत भारतीय अंतरिक्ष अनुसंधान संगठन (इसरो) का यू आर राव उपग्रह केंद्र (यू आर एस सी), भारत-निर्मित सभी उपग्रहों के अभिकल्पन, विकास, संविरचन तथा परीक्षण का अग्रणी केंद्र है। अंतरिक्षयान निर्माण के प्राधिकार के परिणामस्वरूप, केन्द्र अपने भारतीय राष्ट्रीय उपग्रह के लिए प्रासंगिक अत्याधुनिक प्रौद्योगिकियों के विकास में संलग्न है।

U. R. Rao Satellite Centre [URSC] of Indian Space Research Organisation [ISRO] under Department of Space, Government of India is the lead Centre of ISRO for Design, Development, Fabrication and Testing of all Indian made satellites. As a sequel to its mandate of spacecraft realisation, the Centre is engaged in the development of cutting-edge technologies of relevance to its Indian National Satellite.

यू आर एस सी, भारतीय उद्योगों/विक्रेताओं से यांत्रिक संविरचन के लिए दर-संविदा हेतु इच्छा की अभिव्यक्ति आमंत्रित करता है। पर्याप्त ज्ञान, अनुभव/विशेषज्ञता और सुदृढ़ वित्तीय पृष्ठभूमि वाले संभावित प्रतिष्ठानों/विक्रेताओं से यू आर एस सी, बेंगलुरु के लिए उपर्युक्त कार्यों को निष्पादित करने हेतु इच्छा की अभिव्यक्ति आमंत्रित की जाती है।

URSC invites the Expression of Interest [Eol] from Indian Industries/ Vendors for Rate Contract for Mechanical Fabrication. Potential Establishment[s]/Vendor [s] having sufficient know-how, experience/expertise and sound financial background are invited to express their interest to carry out above mentioned activities for URSC, Bengaluru.

ई.ओ.आई. दस्तावेज में संक्षिप्त विवरण उपलब्ध हैं, जिसे हमारे वेबसाइट www.isro.gov.in (निविदा सूचनाएँ के अंतर्गत) से डाऊनलोड किया जा सकता है।

Brief description is available in the Eol document which can be downloaded from our website www.isro.gov.in (under 'Tender Notices').

ई.ओ.आई. का मूल्यांकन बोली लगाने वाले के अनुभव, कार्यक्षेत्रों की उसकी समझी, उसकी सुविधा अवसंरचना, प्रस्तावित कार्यविधि एवं कार्य-योजना, उसकी कुशल श्रमशक्ति तथा उसके उद्योग के वित्तीय सामर्थ्य के आधार किया जाएगा। साथ ही, ई एम हार्डवेयर की आपूर्ति के लिए सुदृढ़ इंजीनियरिंग, अभिकल्पन एवं विश्लेषण पृष्ठभूमि के साथ वह भारतीय उद्योग होना चाहिए।

The EOI will be evaluated on the basis of bidder's experience, its understanding of scope of services, facility infrastructure, proposed methodology and work plan, skilled

manpower and the financial strength of the industry. Also, Indian Industry with strong engineering, design and analysis background for the delivery of EM Hardware.

यू.आर.एस.सी आवश्यकता पड़ने पर ई.ओ.आई. की प्रक्रिया रद्द करने या और सूचनाएँ/ब्यौरे मांगने के लिए इसे पुनः जारी करने का अधिकार रखता है।

URSC reserves the right to cancel/re-issue the process of EOI if the necessity so arises or to seek further information/details.

किसी भी प्रकार की भ्रष्ट या धोखाधड़ीपूर्ण गतिविधियों में लिप्त पाई गई कंपनियों/फर्मों को निविदा प्रक्रिया में भाग लेने से रोक दिया जाएगा और उनके ई ओ आई दस्तावेज़ पर विचार नहीं किया जाएगा। Companies/Firms, if found to have indulged in any corrupt or fraudulent practices, will be debarred taking part in the Tendering process and their EOI Document will not be taken up for consideration.

ई ओ आई का समापन /Completion of the EOI Response:

तदुपरांत, विक्रेताओं को निम्नलिखित विस्तृत जानकारियों के साथ इच्छा की अभिव्यक्ति का प्रत्युत्तर प्रस्तुत करना होगा।

Subsequently, the vendor (s) shall submit the response to Expression of Interest along with the following information in detail:

1.	फोन, फ़ैक्स, ईमेल, वेब आदि सहित पंजीकृत पता Registered address with Phone, Fax, Email, Web etc.
2.	स्वत्वाधारी, साझेदारों, बोर्ड के निदेशकों के नाम एवं पते के साथ कंपनी/संगठन की स्थिति (पी एस यू/स्वामित्व/साझेदारी/निजी लि. आदि) Company/Organization Status (PSU / Proprietary / Partnership / Private Ltd., etc.) with Name and Address of Proprietor, Partners, Board of Directors etc.
3.	सहयोगी: (क) भारतीय (ख) विदेशी: व्यापार साझेदारी का प्रतिशत (यदि कोई हो) Associates: (a) Indian (b) Foreign: Percentage of business partnership (if any).
4.	पूरे पते और संपर्क किए जानेवाले व्यक्तियों के विवरणों के साथ प्रमुख ग्राहकों की सूची List of Major Customers with full address and their Contact Persons Details.
5.	कार्यों को निष्पादित करने के लिए स्वामित्वाधीन या उपलब्ध अवसंरचना सुविधाओं के विवरण Details of Infrastructure Facilities owned/available to carry out activities.
6.	नवीनतम वार्षिक रिपोर्ट की प्रति सहित पिछले तीन वित्तीय वर्ष (31 मार्च 2024 को समाप्त वर्ष) हेतु लेखा परीक्षित वित्तीय विवरण Audited Financial Statements for the preceding Three Financial Years (year ending 31 March, 2024) with copy of latest Annual report.
7.	उपलब्ध वित्तीय क्षमता/क्रेडिट सुविधाएँ Financial Capacity/Credit facilities available.
8.	बैंकों के नाम व पते Name and Address of Bankers.

9.	व्यापार संघ, जिससे उद्योग संबद्ध है Trade Association to which industry belongs to
10.	प्रतिष्ठान/ बिक्री/जी एस टी पंजीकरण तथा पैन संख्या Establishment/Sales/GST Registration and PAN Number.
11.	व्यापार का प्रकार Nature of Business
12.	उनके बैंकरोँ द्वारा जारी फर्म की ऋणचुकाने की क्षमता/वित्तीय क्षमता । Solvency/Financial capacity of the Firm issued by their bankers
13.	उद्योगों की अन्य कोई प्रासंगिक जानकारीयाँ Any other information of the industries considered relevant.
14.	सामर्थ्य और कमियों के क्षेत्रों का स्पष्टतः प्रकट करते हुए कंपनी का/कंपनियों के प्रोफाइल The Profile of the Company/ies clearly bringing out the areas of Strength and Weaknesses
15.	ई ओ आई में भाग लेने के लिए तकनीकी तथा संगठनात्मक सामर्थ्य का स्व-मूल्यांकन Self-Assessment Technical and Organisational competence to take part in the EOI
16.	ई ओ आई में यथा-उल्लिखित प्रत्युत्तर प्रपत्र Response forms as mentioned in the EOI
17.	कंपनी के प्रमुख शेयरधारकों के नाम व पते तथा उनकी शेयर पूँजी के प्रतिशत Name and addresses of the major shareholders of the Company and the percentage of their share capital.

तालिका/Table-1:

ई ओ आई विवरण की प्रस्तुति Submission of EOI Details		
ई ओ आई का प्रत्युत्तर प्रस्तुत करने की अंतिम तिथि Last date for submission of response to Eoi	05.06.2025 HRS IST	14.00
ई ओ आई खुलने की तिथि Opening date of Eoi	05.06.2025 HRS IST	14.30

ई ओ आई का पूर्ण प्रत्युत्तर उपर्युक्त तालिका-1 में निर्धारित तिथि एवं समय पर, लेकिन उसके बाद नहीं, यू आर एस सी में नीचे दिए गए पते पर प्राप्त होना चाहिए। अनुलग्नक में उल्लिखित नियम व शर्तों के अनुसार, यांत्रिकी संविधान के लिए दर-संविदा हेतु हमारी संदर्भ संख्या एवं तिथि मोहर बंद लिफाफे के ऊपर लिखकर, विस्तृत सूचियों/पुस्तिकाओं/साहित्य सहित कृपया ई ओ आई संलग्न निविदा प्रपत्र के साथ प्रस्तुत करें।

Complete response to EOI must be received at URSC to the address given below, not later than date and time specified above in Table-1. Please submit your sealed EOI, in the Tender Form enclosed here along with the descriptive catalogues/pamphlets/literature, superscribed with our Ref. No. and Due Date for EOI for Rate Contract for Mechanical Fabrication as per the terms & conditions mentioned in Annexure.

व. प्रधान, क्रय व भंडार Sr. Head, Purchase & Stores

यू आर राव उपग्रह केन्द्र U R Rao Satellite Centre,

एच ए एल एयरपोर्ट रोड HAL Airport Road

विमानपुरा डाक, बेंगलूरु-560017, भारत

Vimanapura Post, Bangalore – 560017, India

ईमेल/E-mail: psf@ursc.gov.in

दूरभाष/Ph No.: 080 2508 4084

ई ओ आई के प्रत्युत्तर में संपर्क किए जाने वाले व्यक्ति के पदनाम, उचित संपर्क संख्या तथा ई-मेल सहित उसका नाम शामिल होना चाहिए।

Response to EOI must also include the name of the point of contact, together with the designation, appropriate contact number and e-mail address.

इस प्रस्ताव की शुरुआत ई ओ आई-पूर्व योग्यता के रूप में की गई है। चाहे जो भी कारण हो, यू आर एस सी बिना कारण बताए, सभी या इस प्रकार की किसी "इच्छा की अभिव्यक्ति" स्वीकृत या अस्वीकृत करने का अधिकार रखता है।

This proposal is initiated as a Pre-Eoi Qualification. URSC reserves the right to accept or reject all or any such "Expression of Interest" without assigning any reasons what so ever.

इस ई ओ आई में यदि कोई शुद्धिपत्र/अनुशेष होगा, तो उसे हमारे वेबसाइट www.isro.gov.in पर डाला जाएगा।

Addendum/Corrigendum, if any, to this Eoi, shall be hosted at our website, www.isro.gov.in

अस्वीकारण: इस आमंत्रण के अंग्रेजी और हिंदी पाठों में विसंगति या असंगति की स्थिति में अंग्रेजी पाठ को सही माना जाएगा।

Disclaimer: The English version shall always prevail in case of any discrepancy or inconsistency between English and Hindi version of this Invitation.

Sd/-

वरिष्ठ, प्रधान, क्रय व भंडार

SR. HEAD, PURCHASE & STORES

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1. MODUS OPERANDI:

The intending Vendor is advised to read the Eol documents, Terms and Conditions and other details carefully relating to the work contemplated for Precision Mechanical Fabrication. The intending Vendor shall mean Single Vendor only and no consortium is entertained. The Vendor shall be deemed to have known the nature, scope and magnitude of the work. Vendor should express the interest only if he considers himself eligible and if it is in possession of all documents required as per the Eol. The Vendor is required to study Eol document and express interest after carefully examining all instructions, eligibility criteria, forms, terms, standards and specifications as per the Eol document with full understanding of its implications.

If the Vendor is found ineligible after opening of the Eol, his Eol document shall become invalid *ipso facto*, and costs of the tender document and processing fees, as applicable shall not be refunded. Eol which are not in compliance with our Eol conditions shall be rejected, without assigning any reasons thereof. Failure to furnish all requisite information and/or documents shall result in repudiation of the Eol notwithstanding the foregoing. UR Rao Satellite Centre [URSC], Bengaluru reserves the right to assess the capability of the Vendor to execute the Contract keeping in view the overall interest of URSC. In the event, the Vendor capability and capacity are found to be unsatisfactory; URSC reserves the right to reject the Eol document, without assigning any reasons thereof.

Any neglect or omission or failure on the part of the Vendor in obtaining necessary information as stated above or in any other matter affecting the Vendor, shall not relieve him from any risks or liabilities or the entire responsibility for completion of the Rate Contract/ Purchase Order for Precision Mechanical Fabrication in accordance with the Eol documents followed by the Request for Proposal (RFP) documents and clearance by URSC as and when it happens.

The requirements stated herein below are preferable specifications and URSC reserves the right to request for any additional information and also reserves the right to reject the Eol response of any Vendor, if in the opinion of URSC, the qualification or data is incomplete or if the Vendor is found not qualified to satisfactorily execute the Contract. The Vendor shall bear all costs and expenses associated with preparation and submission of Eol document including post Eol clarifications, discussions, technical and other presentations and execution of trial work, and URSC shall in no case be responsible or liable for such costs, regardless of the outcome of the Eol process. The Vendor shall also not be entitled to claim any costs, charges and expenses incidental to or incurred by him through or in connection with the submission of the Eol or its

consideration by URSC, even though URSC may elect to modify or withdraw the Invitation to Eol or not to accept the Eol.

At any time prior to the deadline for submission of Eol, URSC may for any reason on its own initiative modify the Eol document by an amendment. The amendment shall be uploaded online on the website. Notwithstanding the above, URSC may at its discretion extend the deadline for submission of Eol in order to afford reasonable time to Vendor to take into account the amendment in preparing the Eol.

All the Eol must be submitted before the time and date fixed for the receipt of Eol as set forth in the Eol document. URSC shall not be responsible for non-receipt of Eol due to any postal delays/loss of Eol documents in transit and delay due to customs/courier, etc. and it shall be the sole responsibility of the Vendor to ensure delivery of the Eol within the time fixed. URSC reserves the right to accept or reject any of the Eol in full or part without assigning any reason thereof. Eol received after stipulated time and date shall be rejected.

Eol documents shall also be uploaded on the URSC website i.e., www.isro.gov.in. Interested Vendor may download the Eol document from website and submit their response to Eol as per details mentioned in the Tender Notification.

URSC, on successful completion of the Eol process may release an RFP based on the revisions in the specifications and other terms as may be agreed upon/felt necessary during the process of the Eol and Eol evaluation. URSC reserves the right to make necessary modification(s) in the specifications/terms at the time of release of RFP or not to release an RFP as a sequel of this Eol. All other standard commercial and regulatory terms and conditions will be released as part of the RFP, which need to be complied and responded by the vendors in the RFP response.

If the Eol opening date happens to be on an unidentified Holiday due to any reason, including *Force Majeure*, tender(s) shall be opened on the next working day.

Vendor shall submit Eol document only in sealed envelopes, super-scribing the Tender Number and the due date of opening of the Tender. The Eol shall be complete in respect of all technical specifications, instructions, drawings, pamphlets and catalogues, as per the Eol document. Failure to furnish all information as per the requirements of the Eol document and submission of Eol not substantially responsive to the Eol document shall render the Eol/Vendor liable for rejection. Any/all Eol by way of fax/e-mail shall not be accepted.

The Vendor should provide along with his Eol document the Name of his Bankers to UR Rao Satellite Centre [URSC], Bengaluru.

The Suppliers need to get enrolled in the e-tender portal to access tender and submit their offer online during Request for Proposal (RFP) stage. Vendor need to have Digital Signature Certificate as detailed on URSC e-portal and corporate e-mail ID to register on the above portal.

2. EOI OBJECTIVE:

MFF/URSC is planning for spacecraft hardware realization through industry participation for Precision Mechanical Fabrication. **URSC is planning to involve technically competent & most competitive additional Vendors to take up the realisation of subsystem mechanical hardware within INDIA (preferably at a distance of overnight journey from Bengaluru for convenient flow of free issue material).** MFF/URSC is already having parallel Purchase Order for precision mechanical fabrication, it is also aiming to have additional rate Rate Contract/Purchase Order to improve throughput from outsourcing.

The purpose of this EoI is to invite proposals from the potential Vendors for consideration. On successful completion of EoI and RFP stage, depending on the response of Vendors and their capabilities, most competitive Vendors shall be selected for entering into Rate Contract/Purchase Order.

3. INTRODUCTION TO SATELLITE SUBSYSTEMS:

UR Rao Satellite Centre [URSC] is one of the lead Centres of the Indian Space Research Organisation [ISRO] responsible for Design, Development, Assembly and Integration of Satellites for various applications.

URSC main campus is spread across a 32-acre campus at Old Airport Road, Vimanapura post in Bengaluru. To cater to the growing demand for satellite applications, ISRO Satellite Integration & Testing Establishment [ISITE], a 110-acre campus which is about 8 km away from the main campus was also established. URSC/ISITE houses state-of-the-art design, fabrication, and test facilities and large clean rooms for the assembly, integration and testing of various types of satellites. Laboratory for Electro-Optics Systems [LEOS], situated at Peenya Industrial Estate, Bengaluru is engaged in design, development and production of Electro-Optic sensors and camera optics for satellites and launch vehicles.

The URSC main campus and ISITE campus are hereinafter collectively referred to as 'URSC'. The specialised teams of scientists, engineers and technicians at URSC have built more than 110 complex and advanced satellites for various applications in areas of tele-communications, television broadcasting, VSAT services, tele-medicine, tele-education, navigation, weather forecasting, disaster warning, search & rescue operations, earth observations, natural resource management, space science and interplanetary missions etc.

The Satellite Programme at URSC is categorized into:

- Geo-Stationary Satellite Programme
- Satellite Navigation Programme
- Earth Observation & Small Satellite Programme

Based on the mass and power generation the satellites are also classified into mainly three bus platforms. Satellites built at URSC are realised around the configurations from this table.

1	IRS/Scientific Satellites
2	I-1K/I-2K/I-3K/I-4K Bus Satellite

URSC is presently engaged in the challenging task of building future generation advanced communication, remote sensing, navigation and space science satellites.

All these spacecrafts mechanical hardware is proposed to be realized through outsourcing in addition to in-house facilities.

Vendor shall provide required support as per the scope of work without compromising on ISRO's quality standards. Interested Vendors shall express their interest for the same. The details of URSC's requirements from Vendors are provided in the subsequent chapters.

4. INTRODUCTION TO PRECISION MECHANICAL FABRICATION:

Spacecraft subsystem hardware realization involves precision machining and dimensional inspection. Industries having spare capacity are requested to respond with regard to Precision Mechanical fabrication support.

This document describes the machines generally required and defines the prerequisites of the Vendor for short listing of Vendors for qualification.

5. DESCRIPTION AND SCOPE OF WORK DURING OPERATION OF THE RATE CONTRACT/ PURCHASE ORDER:

5.1. General Scope of work

Spacecraft subsystem hardware components having close geometrical and dimensional tolerances which are used for on-board flight, generally fabricated/machined from light alloys like Aluminium Alloys, Magnesium Alloys, Titanium Alloys, Stainless steel, non-metals like PTFE (Teflon), Delrin, CFRP/GFRP, etc. Four typical part drawings are attached to this EoI for reference purpose.

1. Fabrication involves CNC (Computer Numerical Control) Milling, CNC Turning, CNC-EDM (Electrical Discharge Machining)-Spark Erosion, CNC-EDM Wire-cut and other

machine tools. Dimensional Inspection including measurement with electronic digital height master, two dimensional measurements with optical comparator/video measuring machine with data processor, form and roughness measurement, CNC-CMM (Co-ordinate Measuring Machine), different plain and plug gauges etc.

2. Most of the jobs can be carried out with 3 axis machining with simple fixtures, but at times it calls for special fixtures/4 axes/ 5 axes CNC machine tools.
3. The components need to be fabricated out of Aerospace materials like Aluminum Alloys 2024, 6061, B51 SWP, Magnesium Alloys AZ31B H24, Titanium Alloys-6Al4V, Stainless Steel in 300 & 400 series, Beryllium Copper Alloy & Non-metals like GFRP, CFRP, PTFE, Delrin, Nylon etc.
4. Fabrication of components involves large material removal of the order of 70-90 percent, thin-walled sections, deep hole drilling on slender components, complicated profiles, and deep rectangular pockets. The size of the components is generally less than 500 mm, rarely the part sizes up to 3000mm.
5. Generally, drawings with CAD models are supplied by URSC. However, Vendor should have clear interpretation/understanding of fabrication drawing and CAD model. Wherever required he should be ready to modify the model based on specific instruction from URSC, then carry out the fabrication/machining.
6. Process Planning (PP) & Quality Plan (QP): Detailed PP & QP to be made by Vendor to meet all quality requirements specified in the drawing including schedule. Wherever required such PP & QP to be brought it to the notice of URSC. However, responsibility of achieving all the quality requirements rests with the Vendor.
7. Quality requirements of the hardware realized out of aerospace materials having:
 - i. Dimensional accuracies in the range between 5 microns to 50 microns.
 - ii. Geometrical accuracies like Flatness, Parallelism, and Perpendicularity etc. in the range between 8 microns to 50 microns.
 - iii. Positional accuracies in the range between 5 microns to 20 microns.
 - iv. Surface finish (Ra Value) of the order of 0.4 microns.
8. In process Inspection& Final Dimensional inspection:
 - i. Required in-process inspection/stage inspection to be carried out by the Vendors as per the process plan and maintain such records for audit by URSC.
 - ii. Dimensional Inspection of the fabricated/machined part to be carried out by Vendor indicating the nominal dimension with tolerance and actual

measured value for each of the dimension of the part. The inspection report to contain the instrument used for each of the dimension with instrument identification number, to track its calibration status during audits by URSC.

9. Generally, the quantity for fabrication will be of job order type and not of a large production batch. Generally, raw material will be supplied by URSC against equivalent bank guarantee, as the materials are qualified after due testing. Vendor should collect the raw material within twenty-four hours of intimation by URSC. Vendors who are willing to take up such type of jobs only need to respond for this EoI.
10. Delivery of hardware to URSC: After clearance by Vendor Quality Control (QC), hardware to be dispatched to URSC with a proper packing, to avoid any damages during transportation at free of cost. However, based on relevant inputs from URSC, vendor should obtain inspection report and certificate from third party inspection agency (NABL certified/ certified for ISO 17020 standard/ certified for any other equivalent standard). Identification of the certified third-party inspection agency lies in the scope of the vendor.
11. Vendor should carry out First Article Inspection for all the jobs and maintain the records of the same. The same records shall be shared with URSC as and when requested.
12. In addition to manufacturing facility, the Vendor should have an inspection facility so that all the parameters mentioned in drawings, like geometrical & dimensional accuracies of fabricated components, can be measured and recorded in inspection reports.
13. Vendor should procure raw material if required as per the specifications of URSC. Vendor also should test and qualify the raw material as per the URSC guidelines/material standards.

5.2. Vendor Performance Evaluation

The performance of the vendors would be evaluated on periodic basis, based on the principles laid down by the standard IS 12040:2016.

The Overall Rating would be an arithmetic sum of Quality Rating and the product of Schedule Rating and Load Factor, i.e.,

$$\textbf{Overall Rating = Quality Rating + (Schedule Rating X Load Factor)}$$

$$= Q_R + (S_R \times L_F)$$

The aforementioned Ratings would be calculated using the following formulae:

1. Quality Rating:

$$Q_R = \frac{Q_A + \boxed{[OWD \times \sum_{i=1}^3 WD_i \times Q_{Wi}]} + \boxed{[OJD \times \sum_{i=1}^3 JD_i \times Q_{Ji}]} + \boxed{[OID \times \sum_{i=1}^3 ID_i \times Q_{Ii}]} }{Q_T}$$

Rework Factor
Rejection Factor
Reinspection Factor

where, Q_R = Quality Rating
 Q_A = No. of components accepted (in first pass itself)
 Q_T = Total No. of components
 OWD = Overall Rework Demerit
 WD_i = Demerit for i^{th} Rework
 Q_{Wi} = No. of components for i^{th} Rework
 OJD = Overall Rejection Demerit
 JD_i = Demerit for i^{th} Rejection
 Q_{Ji} = No. of components for i^{th} Rejection
 OID = Overall Reinspection Demerit
 ID_i = Demerit for i^{th} Reinspection
 Q_{Ii} = No. of components for i^{th} Reinspection

2. Schedule Rating:

$$S_R = \frac{\text{No.of jobs delivered in time}}{\text{Total no.of jobs}}$$

$$L_F = \frac{\text{Cummulative hours executed by the vendor}}{\text{Maximum no.of cummulative hours executed by a vendor}}$$

The weightage for Quality Rating in Overall Rating is 40%, while that of Schedule Rating is 60%.

The values of various demerits used would be decided by 'Technical Evaluation Committee for Entering into Rate Contract for Precision Mechanical Fabrication Works' and would be fixed for the period of the Rate Contract/Purchase Order.

URSC reserves the right to terminate the Purchase Order with the vendors if their two consecutive half-yearly performances are less than 40%, arrived at using the above methodology.

6. PROCEDURE FOR FINALISING CONTRACT:

6.1. Procedure

The entire exercise of selecting viable vendors is for entering in to Rate Contract/ Purchase Order carried out in two stages i.e.,

- a) Expression of Interest (Eol) and qualification stage
- b) Request for Proposal (RFP) Stage.

The following is the work flow depicts the structure of process flow that would be adopted in the vendor selection process:

1. Call for Expression of Interest.
2. Eol Response Submission.
3. Eol Evaluation – initial short listing of vendors for trial work based on responses (Technical & Managerial Competence Audit with/without a facility visit).
4. Verification/Qualification trial work for the above short listed new vendors– to evaluate their fabrication competence and final short listing to participate in the RFP process.
5. Release of Request for Proposal (RFP) for entering in to Parallel Rate Contract/Purchase Order for the above final qualified vendors.
6. RFP response submission.
7. Evaluation of offers.
8. Placing Parallel Rate contracts/Purchase Order through negotiation/Counter offer.
9. Operation of RC through individual work orders.

6.2. Trial Work

1. After initial shortlisting of vendors based on Eol responses and facility visits, if any; trial work for evaluation shall be given to the shortlisted vendors.
2. This work is a **trial work** for evaluation (**fabrication of all the components is mandatory**) for empanelment in vendor list. **No payments** would be made for the execution of this trial work.
3. 2D drawings (4 copies each) of the components for trial work would be supplied by URSC for the following:
 - a. 1 Drawing for Programming/ Planning
 - b. 1 Drawing for Shop Use
 - c. 1 Drawing for inspection numbering/ballooning for reference of vendor

- d. 1 Drawing for inspection numbering/ballooning and return to URSC-ISRO along with the inspection report
4. Study the drawing thoroughly, any clarifications required with regard to View, Dimensions, Clarity & Understanding, the same may be obtained from focal point/Engineer, in writing. 3D CAD model and CAM Programming to be done by the vendor, wherever required.
 5. Components should be fabricated **only** out of raw material supplied for execution of this trial work by URSC. **Use of any other material is strictly prohibited.** Raw Material for each job will be supplied **only once.** **Rejection** of components would lead to **disqualification of the vendor.** Also, components fabricated from raw material other than that supplied by URSC would lead to **disqualification of the vendor.** Raw material signature would be taken by URSC and it would be compared with that of the finished components.
 6. No emery to be applied on the components, at any stage of machining. Exposed surface should have machining finish only. Blending of sharp edges to be done by Burr tool/formed blades only.
 7. Engraving of the component at defined location is important. It should be neat and legible.
 8. Inspection numbering of dimensions to be done legibly in clockwise/anticlockwise direction only, taking one drawing view at a time for easy follow-up. All dimensions/parameters (including surface finish) mentioned in the drawing need to be measured. Also, maximum & minimum readings of measured values against specified nominal values to be reported. Any deep scratches, dents, tool marks or any other deviations to be reported in the 'Remarks' column. Instruments used for measurement to be indicated against each dimension and instrument number/code to be mentioned for each instrument used, at the end of the report.
 9. Utmost care to be taken while handling the component.
 10. Components to be properly packed (avoid usage of plastic sheet less than 40 microns) and dispatched in order to avoid any damages during transportation.
 11. Raw Material to be collected from External Fabrication/Stores - URSC by authorized person (with proper authorisation) & finished components to be delivered to URSC External Fabrication/Stores with numbered/ballooned drawings and inspection reports. No payment would be made for collection of raw materials and delivery of the components. Vendor shall provide a Bank Guarantee/ Fixed Deposit/ Indemnity Bond in lieu of the Free Issue of Material for the trial work (approx. value of INR 10,000) in favour

- of Accounts Officer, URSC. Vendor has to provide Bank Guarantee/ Fixed Deposit/ Indemnity Bond with 15 days of intimation about the execution of trial work from URSC.
12. Vendor is requested to collect the raw material and four set of part drawings for four components from URSC within **15 days** of receipt of communication. The intimation to the vendor would be sent only after the confirmation regarding Bank Guarantee/ Fixed Deposit/ Indemnity Bond from the concerned bank.
 13. Delivery of the all-finished components with proper documents (ballooned drawings and inspection reports) should be made within **45 days** from the date of collection of Raw material. **Failing to do so would lead to disqualification of vendors.**
 14. Basis of acceptance of jobs:
 - a. All tolerated dimensions have to be achieved without any deviation.
 - b. All Geometrical accuracies and surface finish to be achieved without any deviation.
 - c. A maximum of 5% of all other dimensions are allowed to be out of specification by 50% of their general tolerance value or 0.1 mm, whichever is lower.
 - d. URSC reserves the right to reject the components having tool dig, dent marks, emery marks and any other noticeable defects.

7. TERMS AND CONDITIONS:

7.1. Terms and Conditions

1. All vendors who want to execute precision mechanical fabrication jobs under Rate Contract/Purchase Order shall participate in Eol.

The following vendors are exempted from qualification process:

- i. Vendors executing jobs under PO no URSC/GE/IS2024P0018501 dt. 2102/2025

7.2. Terms & Conditions: Organisation Portfolio

1. The applicant may be a Proprietorship, Registered Partnership Firm, Indian Company/Domestic Company-Private or Public Company-Listed or Unlisted. Vendor shall submit the interest in the given Eol response sheet.
2. An Indian Company would be deemed to be owned by Indian Citizen and by an Indian Company if more than 51 percent of equity interest in the company is beneficially owned by Resident Indian Citizens and Indian Companies that are, in turn, ultimately owned and controlled by Resident Indian Citizens.
3. Control has been defined as the right to appoint the majority of the Directors or to control management and policy decisions, including by virtue of their shareholdings or management rights or shareholders or agreement or voting arrangements.
4. The applicant must be registered in India as required by law with minimum three years of continuous operation up to the date of publication of this Eol.
5. The Vendor should also have a valid GST registration. The Vendor should submit Self attested copy(ies) of the Certificates of Incorporation and other certificates that are legally required for carrying out its business activities in India.
6. The certificates should be valid at the time of Eol submission and should be certified by an authorized signatory. A copy of PAN Card should also be submitted.
7. Income Tax Returns of the last three assessment years duly certified by a Chartered Accountant has to be submitted.
8. An undertaking (self-certificate) is to be submitted that, the Organization hasn't been blacklisted by any Central/ State Government Department/ Central Government funded organizations/ State Government funded organizations/ World Bank, or other World Bank organizations and is not under any illegal expression by Government of India.

9. The applicant, should not have, during the last three years, either failed to perform on any agreement, or been expelled from any project or agreement or have any agreement terminated for breach by the applicant.
10. Persons who are individually or institutionally, in any manner, involved with the selection/screening process of the EOI, and employees of ISRO are ineligible for applying.
11. An undertaking (self-attested) is to be submitted that there has been no outstanding bankruptcy, judgment or pending legal action that could impair operating as a going Concern. Also, the Vendor must be solvent, in the Legal Court of Law.

7.3. Terms & Conditions: General

1. This Eoi is not an offer and is issued with no commitment. URSC reserves the right to withdraw the Eoi or change or vary any part thereof at any stage. URSC also reserves the right to disqualify any Vendor/proposal, should it be so necessary at any stage.
2. Timing and sequence of events resulting from this Eoi shall ultimately be determined by URSC.
3. By submitting a proposal, each vendor shall be deemed to acknowledge that the Vendor has carefully read all chapters of this Eoi, and has fully informed himself as to all existing terms and conditions.
4. The proposal and all correspondence and documents shall be written in English.
5. Vendor shall compulsorily fill up the Response format and compliance matrix (Part- 1 & Part- 2) as given in Chapter 8 in the Eoi.
6. **Predatory Pricing:** The Vendor shall specifically take note that “Predatory Pricing” at the Request for Proposal [RFP] stage will not be accepted and such Bids not meeting even the basic cost of input i.e., quoting unreasonably low prices to undercut and obtain the Contract are liable to be ignored/rejected, in order to obtain quality products.
7. **Non-Disclosure Agreement (NDA):** All documents/part drawings part of this Eoi and subsequent documents/part drawings issued for evaluation and execution of works and any other communication revealed during the project will be exclusive property of URSC and Vendor shall have no right whatsoever on them and shall not disclose to any other person/party not involved in the execution of the allotted work. The qualifying vendor must take an undertaking on NDA as per the prescribed format.

8. Further, the Vendor must not quote any of these works in any publications or to any of their customers/public domain without explicit permission from URSC and adhere to strict confidentiality.
9. **GST Registration:** Government of India has implemented Goods and Services Tax (GST) w.e.f. 01.07.2017. The Vendor should mandatorily possess a valid GSTN along with GST registration Certificate.
10. The Vendor shall ensure that the persons involved in working on jobs for URSC are aware of the following:
 1. Their contribution to product or services conformity.
 2. Their contribution to product safety.
 3. The importance of ethical behaviour.
11. The Vendor shall plan, implement and control processes for the prevention of counterfeit or suspect counterfeit part use and their inclusion in components delivered to URSC.

8. EOI RESPONSE FORMAT:

Cover Letter

(Company letterhead)

[Date]

To,

**SENIOR HEAD, PURCHASE & STORES
UR RAO SATELLITE CENTRE
HAL AIRPORT ROAD, VIMANAPURA POST
BANGALORE -560017
KARNATAKA**

Dear Sir,

Ref: Expression of Interest for “Rate contract for Precision Mechanical Fabrication”

Having examined the Expression of Interest (Eoi), the receipt of which is hereby duly acknowledged, we, the undersigned, intend to submit a proposal in response to the Expression of Interest (Eoi).

We attach hereto the response as required by the Eoi, which constitutes our proposal. Primary and Secondary contacts for our company are:

	Primary Contact	Secondary Contact
Name		
Title		
Company Name		
Address		
Phone No.		
Mobile No.		
FAX No.		
Email ID		

We confirm that the information contained in this response or any part thereof, including its exhibits, and other documents and instruments delivered or to be delivered to URSC is true, accurate, verifiable and complete. This response includes all information necessary to ensure that the statements therein do not in whole or in part mislead URSC in its short-listing process.

We fully understand and agree to comply that on verification, if any of the information provided here is found to be misleading the short-listing process, we are liable to be dismissed from the selection process or termination of the contract during the execution of the contract.

We agree for unconditional acceptance of all the terms and conditions set out in the Eol document.

It is hereby confirmed that I/We are entitled to act on behalf of our company/ corporation/ firm / organization and empowered to sign this document as well as such other documents, which may be required in this connection.

Dated this

(Signature) (In the capacity of)

(Name)

Duly authorized to sign the Eol Response for and on behalf of:

(Name and Address of Company)Seal / Stamp of Vendor

Witness Signature:

Witness Name:

Witness Address:

CERTIFICATE AS TO AUTHORIZED SIGNATORIES

I,, the Company Secretary of,
certify that Who signed the above response to Eol
is authorized to do so and bind the company by authority of its board / governing body.

Date:

Signature:

(Company Seal)

Part-I

8.1 General Details of the Vendor

8.1.1	Name of the Vendor	
8.1.2	Year of Establishment	
8.1.3	Core capabilities of the Vendor, Standard products from vendors if any	Type brief profile of the Vendor in Annexure – A (without referring to attachment of any report/s)
8.1.4	Head office location and address with contact number & email id:	
8.1.5	Local address in Bangalore if any with contact number & email id:	
8.1.6	Addresses of manufacturing and/or operational setup in India (Highlight the address where URSC representative shall visit for audit)	1. 2. 3.
8.1.7	Corporate website URL, if any:	

8.2 Mandatory Supporting Documents

Auditor certified statements for the last three years, FY 2021-22, FY 2022-23 and FY2023-24 in Annexure-B (please provide the profit and loss statement and balance sheet).

	FY 2021-22	FY 2022-23	FY2023-24
Net Revenue from Operations (in INR Crores)			
EBTD [Earnings Before Tax and Depreciation]			
Percent of Revenue from Aerospace Segment/Unit			
Net worth			
Share Capital			
Percent of shareholding by Indian entities			
Percent of shareholding by foreign entities			

Part-2

8.3 : Form A Compliance Matrix to be filled by Vendors

Refer Chapter No	Description	Understanding and Compliance (Yes/No)	Remark
1	Modus Operandi		
2	Eol Objective		
3	Introduction to Satellite Subsystems		
4	Introduction to Precision Mechanical Fabrication		
5	Description and Scope Of Work		
6	Procedure For Finalizing Contract		
7	Terms & Conditions		
8	Eol Response Format		

8.4: Form B- Compliance Matrix to be filled by Vendors with respective to Organisation, Experience and Infrastructure

Sl. No	Description	Compliance /Non-Compliance	Remarks*/ Supporting documents
1.	In-house experience having completed similar nature of work of <i>purchase orders of total worth, preferably Rs.50 Lakhs or more in a year during the last 3 years.</i> (Provide copies of the orders clearly showing the scope of work, magnitude of the work involved, proof of completion and delivery)		Attach as per Annexure -C.
2.	Past experience in handling fabrication of thin-walled structure work, large material removal, thin-walled section, deep hole drilling on slender components, complicated profiles, and deep rectangular pockets etc.		Provide the detail about work, and work order value with relevant purchase order copies if any. Attach as Annexure - C.
3.	In-house availability of qualified work force and Management structure (Please provide a table of the available workforce with details of trade, qualification, number, years of total experience, years of employment/experience with the vendor etc.)		
4.	Mandatory: In-house expertise of 3D CAD modelling & CAM programming software/package. Specify the CAD/CAM package being used.		
5.	Mandatory: In-house availability of either 3 (or) 4 (or) 5 axis CNC Milling machines- minimum 2 Nos. Specify number of machines available. Attach details like make, model, size and features of machines with photographs.		
6.	Mandatory: Any 1 of sl. No. 6 to 8 In-house availability of either CNC Turning or CNC Turn mill machines – minimum one number. Specify number of machines available. Attach details like		

	make, model, size and features of machines with photographs.		
7.	In-house availability of CNC EDM Spark erosion machine – minimum one number. Attach details like make, model, size and features of machine with photographs.		
8.	In-house availability of CNC EDM Wire cut machine– minimum one number. Attach details like make, model, size and features of machine with photographs.		
9.	In-house availability of Bench work facility containing Bench drilling, tapping etc. Also, availability of Jigs/ Fixture and tooling, tool holders etc. Describe the same separately.		
10.	Available Machine shop floor area.		
11.	Mandatory: In-house availability of dimensional Inspection infrastructure like surface plate, Electronic Digital Height Master, Digital micrometer, Digital caliper, protractor, cylindrical pin gauges up to 6mm in steps of 0.01mm, Thread plug gauges & Thread Ring gauges up to M6, Radius gauges, slip gauges set etc., Specify the details of all inspection facility.		
12.	Certificates held like ISO 9001, AS 9100, NABL Accreditation, or any equivalent is preferred.		Provide documentary proof. Attach as Annexure -D.
13.	List of aerospace Customers within the State/Country/abroad		
14.	Specify standard product(s) of the company, if any		

Signature:

Name of the authorized signatory for the company:

Date:

Place:

Note: Vendors failing to meet the **mandatory** requirements would not be considered for trial work.

8.5: Form C- Compliance Matrix to be filled by Vendors with respective to Additional Infrastructure

Sl. No	Description	In-house / Outsource facility	Compliance /Non-compliance	Remarks*
1.	3/4/5 axis CNC Milling machines of large sizes (above 800 mm). Attach details like make, model, size and features of machines with photographs.			
2.	CNC Turning/CNC Turn mill machines of large sizes. Attach details like make, model, size and features of machines with photographs.			
3.	Plano milling machine, Vertical Turret lathe, ultrasonic machining etc. Advanced fixtures like vacuum fixture, tool holders like shrink fit tooling etc. Any other information / Facilities related to Laser hole drilling/machining. Attach details like make, model, size and features of machines with photographs.			
4.	Additive manufacturing, Plasma/water jet cutting, Deburring machine, Ultrasonic cleaning, Secondary coating/plating etc., Special operations if any. Attach details like make, model, size and features of machines with photographs.			
5.	Heat treatment facility/stress relieving facility, welding shop with SMAW, TIG, Sheet metal press tooling etc. Attach details like make, model, size and features of machines with photographs.			
6.	Dimensional Inspection infrastructure like large size			

	surface plate (more than 1000mm), profile projector with data processor/Video measuring machine, CNC-CMM (Coordinate Measuring Machine), surface roughness tester, Cylindrical PIN gauges up to 6 mm in steps of 0.005mm, thread gauges above M6. Metal sorter for identifying raw material to maintain traceability.			
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*** Remarks:**

1. Provide Documentary Proof as supporting documents to the topics in the above table.
2. Clearly fill the column with the regard to the availability of facilities in-house (OR) outsourcing.
3. In case of outsourcing, mention the full address, details and their expertise shall be mentioned.

Signature:

Name of the authorized signatory for the company:

Date:

Place:

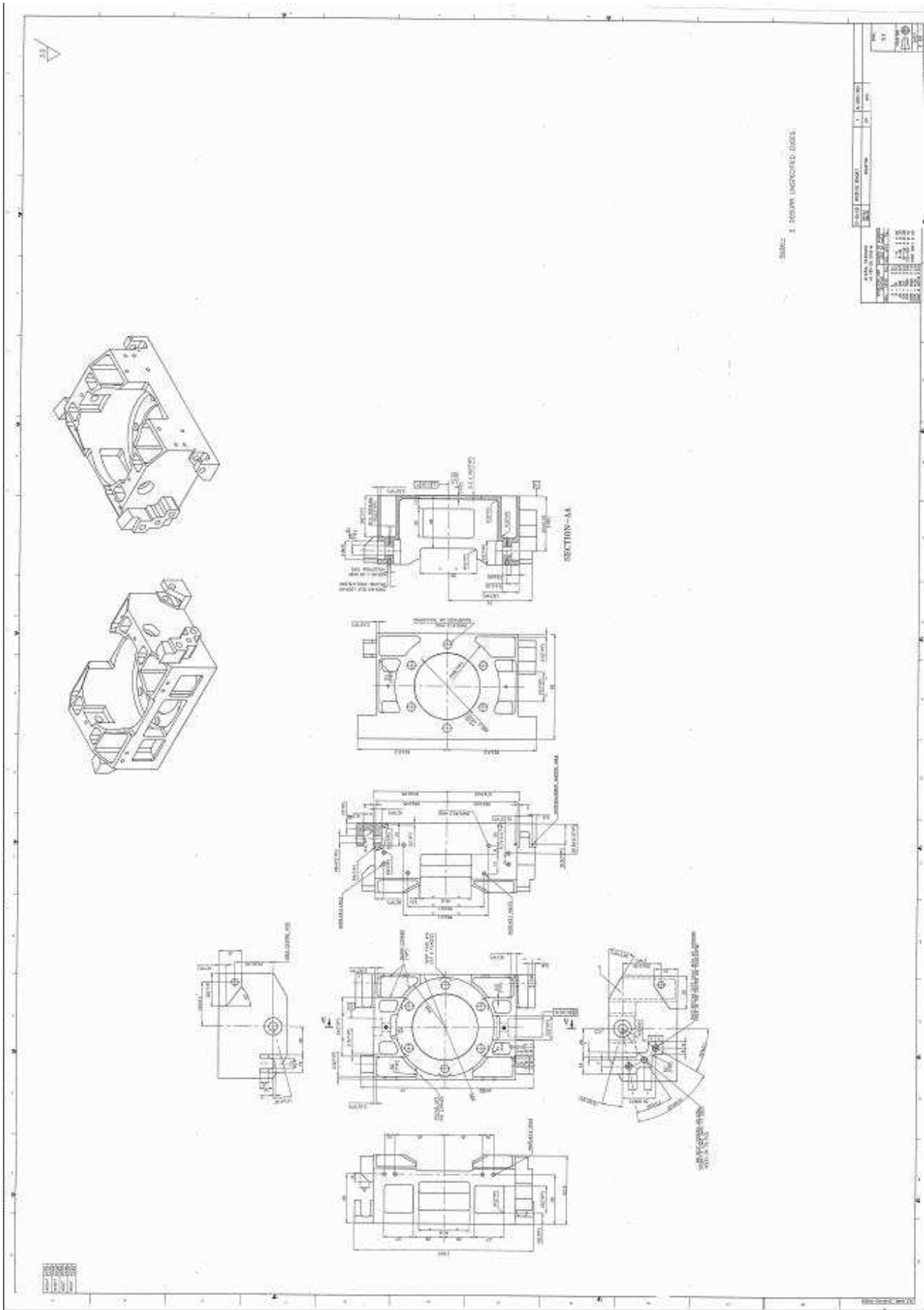
8.6 Eol Response Format Contents

The proposal should be submitted as an Expression of Interest (Eol) as a collation of the following table of contents as below, in the enclosed format, clearly providing the details requested below with documentary proof/supporting documents as Annexure.

The vendor has to provide the information as per the formats as prescribed in chapter 8 Response Format. The overall compliance matrix as per section 8.3, 8.4, 8.5 should also be submitted as per the Eol proposal. All these inputs may be furnished in a neatly typed document in the said formats.

The proposal and all correspondence and documents shall be written in English.

Sl. No	Contents	Page No
1.	Covering Letter	
	Part-I	
2.	General particulars of Vendor	
3.	Mandatory Supporting Documents	
	Part-2	
4.	Form A Compliance Matrix to be filled by Vendor	
5.	Form B Compliance Matrix to be filled by Vendor	
6.	Form C Compliance Matrix to be filled by Vendor	
List of Annexure		
	Annexure- A	Brief Profile of the vendor
	Annexure-B	Auditor certified statements
	Annexure-C	Copies of PO/Work order/Contract copy
	Annexure-D	Quality Certification copies (ISO 9001 : 2008 or equivalent)



SAMPLE DRAWINGS FOR TRIAL WORK

