

**SARDAR VALLABHBHAI NATIONAL INSTITUTE
OF TECHNOLOGY, SURAT – 395 007**

TENDER DOCUMENT

FOR

**SUPPLY OF
RECIRCULATING SEDIMENT TRANSPORT FLUME
AND RELATED ACCESSORIES**

AT

**ADVANCED HYDRAULICS LABORATORY OF
CIVIL ENGINEERING DEPARTMENT
S. V. NATIONAL INSTITUTE OF TECHNOLOGY
SURAT – 395 007, GUJARAT.**

TENDER NOTICE

Sealed Tenders are invited for Recirculating Sediment Transport Flume and Related Accessories under FIST program of Department of Science and Technology (DST) at Advanced Hydraulics Laboratory (AHL) of Civil Engineering Department. The details Tender documents, technical specifications of the flume, schedule of issue, receipts of Tender documents are available on Institute web site www.svnit.ac.in.

DIRECTOR

TENDER DOCUMENT FOR SUPPLY OF RECIRCULATING SEDIMENT TRANSPORT FLUME AND RELATED ACCESSORIES IN ADVANCED HYDRAULICS LABORATORY OF CIVIL ENGINEERING DEPARTMENT AT SVNIT, SURAT

Tender reference no: CED/WRE/DST-FIST/Retender/1414 /2017-18

Date: 03.07.2017

Section I : PREAMBLE

The Sardar Vallabhbhai National Institute of Technology, Ichchhantah, Surat (SVNIT, Surat) invites sealed bids from eligible bidders for **Supply, Installation, Commissioning and training of personnel for use of Recirculating Sediment Transport Flume and Related Accessories in Advanced Hydraulics Laboratory of Civil Engineering Department** as per the requirements & technical compliance, defined in the section “**Schedule of Technical Requirements**” in this tender document; at the terms and conditions specified in the section “**General Terms & Conditions**”; provided the vendor satisfies the pre-qualification requirements as listed out in the section “**Prequalification Requirements of the Bidder**” to bid for the tender.

- The entire tender document comprises of various sections, as listed below:
 1. Preamble (this page)
 2. Schedule of Tender & Tender Form Covering letter
 3. Prequalification Requirements of the Bidder
 4. Schedule of Technical Requirements
 5. General Terms & Conditions
 6. Declaration to be honored and signed by the bidder
 7. Summary Sheet
 8. Form No. 1
 9. Form No. 2
- The tender form should downloaded from the institute web-site, the **tender fees have to be remitted with the bid**. Without the tender fees being remitted, the tender will not be considered. For tender fee, the Demand Draft in favour of **Director, Sardar Vallabhbhai National Institute of Technology, payable at Surat** must be submitted along with tender document
- All bids must be accompanied by a **bid security** as specified in the bid document and must be delivered to the above office latest by the date and time indicated.
- Bids will be opened in the presence of Bidders' representatives who may choose to attend on the specified date and time.
- In the event of the date specified for the bid receipt and opening, being declared as a closed holiday for SVNIT, the due date for submission of bids and opening of bids will be the following working day at the appointed times.
- **The bid from the vendor who is found in fraud activity with SVNIT or on the name of SVNIT shall not be allowed for bidding and the bid from such vendor will not be accepted and will be rejected. The bid submitted in consortium with such vendor will not be considered and if such information is found later then the work order issued will be terminated immediately without any notice.**

Section II : SCHEDULE OF TENDER

- | | |
|--|--|
| 1. Issue of the Blank Tender Form | 4th August 2017 |
| 2. Pre-bid Conference | 10th August 2017 (3.0 pm at Advanced Hydraulics Lab., Civil Engg Depatt, SVNIT, Surat) |
| 3. Last date of submission of Tender at SVNIT: | 28th August 2017(before 5:00 pm) |
| 4. Date of Opening of Tender of Pre-qualification requirements: | 29th August 2017 (12.30 pm) |
| 5. Date of Opening of Technical offer:
Commercial offer: | 30th August 2017 (12.30 pm)
1st September 2017 (12.30 pm) |
| 6. Place of opening of bids: | Advanced Hydraulics Lab.,
Civil Engg Department, SVNIT, Surat |
| 7. Address for communication: | Director, S V National Institute of Technology,
Ichchhanath, Surat – 395007 |
| 8. Tender fee of Rs. 2,000/- (Rupees Two Thousand Only) to be remitted with tender by DD drawn in favour of “Director, SVNIT, Surat” | D. D. No. _____ Date : _____
Name of Bank : _____
Branch : _____ |
| 9. EMD of Rs. 3,60,000/- (Rupees Three Lakh Sixty Thousand Only) to be remitted with tender by DD drawn in favour of “Director, SVNIT, Surat”.

(DD of EMD and Tender fee must be separate otherwise tender will be rejected.) | D.D. No. _____ Date : _____
Name of Bank: _____
Branch: _____ |

Important Notes:

- Tender offers must be sent by Registered Post A.D./Speed Post/Hand delivery only.
- Price in Indian Rupees at F.O.R SVNIT, Surat should be quoted.

TENDER FORM

FROM : _____

To,
The Director,
SVNIT, Surat

Sub.: **Tender for Supply of Recirculating Sediment Transport Flume and Related Accessories in Advanced Hydraulics Laboratory of Civil Engineering Department at SVNIT, Surat**

Sir,

With reference to above, we submit the following particulars of our Firm/Agency.

1. Name of the firm & address with direct phone numbers :

2. Name of the proprietor/chief of the firm :
3. Registration number & date :
4. Date of Establishment :
5. Present strength of the firm
 - Any Certification Standards : _____
 - No. of Major Clients with execution of work : _____
orders involving similar scope and magnitude of : _____
work : _____
 - No. of similar supply : _____
6. Annual turnover in Rs. lakh : _____
(only in providing similar services)

Section III: Prequalification Requirements of the Bidder

Following are the specific pre-qualification requirements which should be satisfied by the supplier, manufacturer, etc. (henceforth referred to as the “bidder”) for being **primarily considered** for bidding for aforementioned supply at SVNIT, at the terms & conditions, mentioned in the appropriate section in this document:

Sr No	Details	Documentary Evidence Required to be attached	Compliance YES/NO	Corresponding Document as Proof in our Prequalification Requirements Document Set on PAGE NO
1	List of similar single supply orders executed for reputed organization from India (like IITs’ and NITs’) or abroad in past three years.	Copy of Work Orders for last 3 years & detail as per Form No. 1 should be attached		
2.	The tenderer/Manufacturer should have executed at least one supply order of similar nature of financial value of Rs. 2.0 Crore in last three years	Copies of the supply order		
3.	Satisfactory Performance Certification from existing client mentioned at Sr. No. 2 must be submitted	Copy of satisfactory performance Certification from clients at Sr. No. 2.		
4.	Minimum financial turnover Rs. 800 Lakh at least in one of the last three years excluding current financial year.	Copies of the Annual Audited Account Statement		
5.	Details of Service Centers and information on service support facilities that would be provided after the warranty period.	Self - certification with complete list of branch offices (for service) throughout the country and copy of any of the following : Property tax bill/Electricity Bill/Telephone Bill/VAT/CST Registration/Lease agreement Form No. 2		
6.	Copies of original documents defining the constitution or legal status, place of registration and principle place of business of the company or firm or partnership, etc.	Self-certification with copies of the supporting documents		
7.	Currently Valid Solvency certificate should be of at least Rs. 2.0 Crore from any Nationalized / Public / Private Sector bank	Certification from the bank		
8.	The bidder should furnish a brief write-up, backed with adequate data, explaining his available capacity and experience (both technical and commercial) for the manufacture and supply of the required systems and equipment within the specified time of completion after meeting all their current commitments.	Self-certification with copies of the supporting documents		

9.	Reports on financial standing of the Bidder such as profit and loss statements, balance sheets and auditor’s report for the past three years, banker’s certificates, etc.	Copies of the Annual Audited Account Statement		
10.	The bidder should have fulfill the ISO 9000 or TQM standard / legislative requirements of item of similar nature.	Attach certificate copies of the documents		

If complying all of the above conditions and appearing to be qualifying to bid, the prospective bidder shall provide appropriate documents stating compliance of the above, **put them in a separate envelope along with a compliance statement** stating compliance to all the above requirements, super scribe it with “**Prequalification Requirements of the Bidder**” and enclose it in the main envelope along with the techno-commercial bid (**which should be supplied in other separate envelope**).

Place:
Date:

Signature of the Bidder:
Name & Address of the Bidder with office Stamp

Section IV : Schedule of Technical Requirements

RECIRCULATING SEDIMENT TRANSPORT FLUME AND RELATED ACCESSORIES

The flume should consist of a channel of size as given below in the technical specifications. At the inlet, a flow steadying section should be provided so that there should be no disturbance to the test section. The gates should be provided at the downstream of the test section to regulate the depth of flow. Depth measurements can be measured with the help of a hook or pointer gauge mounted on a trolley which should have longitudinal and transverse movement. The slope of the bed can be adjusted, manually and electrically both, to give positive or negative slopes.

The requirement is a recirculating sediment transport flume suitable for measurement of bed load and suspended load. This requires that suspended sediment in the working section can be fully circulated via the return pipe work, pump and flowmeter for eventual re-deposition in the working section. A sediment trap requires trapping the bed load and its measurement by weight.

There should also be provision for collecting and weighing the bed load.

The flume should have clear sides and calibrated instrument rails.

The design offered should be of a modular form. The flume should be supplied in 2.5m long modules. This modular design would allow for relocation at some future point and/or extension/reduction, all with relative ease.

SPECIFICATIONS:

Sr. No.	Item Name
01	<p>Recirculating Sediment Transport flume and related accessories Recirculating Tilting flume –14.4 meter length Section (<i>Inside Dimensions</i>) : 0.60 m width x 0.80 m height Water discharge : 120 LPS with pump and necessary piping</p>

DIMENSIONS:

Total Length L (Length) = (Inlet tank + inlet duct chamber) + Working section + Outlet Tank = **14.4 m**

Total Width = 2.400 m

Total Height = 2.217 m when horizontal from GL (ground level)

2.0 m	Length of Inlet tank including 0.5 m internal flow strengtheners within the inlet tank
0.85 m	inlet duct chamber
10.0 m	Working Section Longitudinal (<i>Stainless Steel base planes</i>) arrangement for Camera setup
1.55 m	Outlet Tank with Sediment catch and weigh area arrangement

Functional Description

This section outlines the system and hardware functional design description of the required system. This flume is for conducting fluid mechanics research, which will include the use of sediment. The working length should not be less than 10m.

The extent of supply to be tendered is:

- Inlet tank complete with inlet manifold
- Discharge tank complete with bed load weighing system
- Precision working section topped by load bearing instrument rails
- Jacking system
- Control console
- Service system
- Software package

PRECISION CHANNEL WORKING SECTION

The flume has to be of a proven design and comprise a glass sided channel suspended within a mild steel painted frame. The working section base should be constructed from Stainless Steel.

Toughened glass side panels should be provided over the full length, to the full depth, on both sides of the working section.

The modular design of the flume must allow for easy replacement of side panels either caused by damage or should it be a requirement to replace a glass panel with an alternative material, such as marine ply, in order to mount structures or other objects from a side.

The joints between panels should be sealed by a jointing compound which will remain plastic, water-tight and bond itself to the glass and metal bed sections.

Several low point drains should also be fitted.

TANKS

An inlet and an outlet tank should be provided. These should be constructed from GRP (Glass Reinforced Plastic) and their purpose should be the introduction and extraction of flow when the recirculating system is in operation. They should be profiled and contain stilling architecture to assist flow stability.

FUNCTIONAL REQUIREMENTS

It is a requirement that the flume be provided with both positive and negative slope. A jacking system is therefore necessary and the size, weight and required stability of the installation makes this element of crucial importance.

Both the pedestals and the jacking mechanism should be designed to exceed the requirements and ensure there is no risk of the flume tipping over through inadvertent side loading or vibration from high flow rates transmitting to the working section.

Jacking will be mechanical by the use of screw jacks which are to be driven from a variable speed electric motor, the series of screw jacks are then mechanically linked via specific ratio gearboxes to ensure there is no deviation of support between the jacking stations across the range of negative and positive tilt (+2.5% to -0.50% *with least resolution of $\pm 0.001\%$*).

The tilting system should be controlled either via the push button manual control on the provided console or via the pc interface program supplied with the flume. The system to be fitted with an inclinometer showing tilt position. The design will incorporate a pivot mechanism at each jack station to ensure free movement of jacks at all degrees of incline.

A fault detection system should be included permitting operation only if all jacks move together. This detection system should also guard against overload conditions.

Shafting to be fitted with 'soft' bearings to limit noise during jacking operations.

FLOW RATE

There should be one Variable Speed Pump.

The pump to be fitted with an A.C. motor and variable speed control system which will be housed in the control console. Performance curves must be provided.

Discharge capacity: Up to 120 LPS (*liter per sec*),

The pump will have the capacity to handle solids to a maximum of 4mm diameter and must be Belzona lined to protect against damage from the suspended solids. The pump and pipe work should be designed to recirculate sediment up to 4mm. **Evidence must be provided via reference of extensive experience in the design of sediment transport flumes and the knowledge of pump and pipe work sizing and design to ensure that the sediment remains in suspension throughout the pipe work and pump with special considerations in pump selection to ensure compatibility with sediment transport requirements (abrasion resistance to the impeller and casing to be included).**

A 3-phase electrical supply is expected.

Pump Data:-	Quantity:	One
	Type:	Open impeller centrifugal close coupled
	Materials:	- Cast iron Belzona coated casing and impeller
		- 316 Stainless shaft
		- Single mechanical seal
	Solids Capability:	Up to 4mm diameter
	Power:	10kw 380/415v - 3ph - 5Hz
	Noise Level:	Not to exceed 61dBa
	Speed	0 - 1450 Rpm (maximum)

The **Inlet Tank** should be fabricated from GRP, with a bespoke inlet arrangement which blends the flow from the pumps providing a uniform flow. To ensure excellent velocity profiles in the working section, the tank design should be optimized to be carefully shaped and incorporate stilling and smoothing devices.

The inlet tank contraction should be 1.6:1 as this offers the best conditions across a wide flow range. For the higher flow rates cheek plates are to be provided which eliminate the contraction and thus avoid a standing wave at the inlet.

The tank should be supported on suitably robust fabricated painted mild steel under frame giving sufficient clearance to accommodate the inlet pipe work.

The tank to be suitably stiffened to ensure no deflection of side walls when running full.

The **Discharge Tank** should be fabricated from GRP and be designed to both extract the flow efficiently and at the same time reduce drawdown on the flow in the working section.

This to be achieved by careful design of the discharge contraction and anti-vortex baffles.

The discharge tank is to be fitted with a basket weighing system as described later in this document. The tank to be fitted with a 'low point' valve to allow draining.

WORKING SECTION

Toughened 15mm thick glass side panels will be provided over the full length, to the full depth, on both sides of the working section, certified for use with laser systems. Spacing between support members will be maximized for clearest possible observation.

Eight blind tapped holes will be provided in the bed at intervals to be agreed for mounting models. There will also be tapping points for water depth and other measurements (2 per bed section).

The modular nature of the flume design to be such that increasing the length or moving to an alternative location will be achievable at minimal cost and little or no disruption to the infrastructure.

The joints between panels must be sealed by a jointing compound which will remain plastic, water-tight and bond itself to the glass and metal bed sections.

The compound to be a clear silicone with a tensile strength of 2.2 MPa.

STANDARDS/LEGISLATION

The flume system will fulfill the following legislative requirements.

Machinery Directive 2006/42/EC, Low Voltage Directive 2006/95/EC, Electromagnetic Compatibility Directive 2004/108/EC.

CONSTRUCTION AND TOLERANCES

Deformation test

The following maximum tolerances shall be maintained or improved;

With the channel is empty:

Parameter	Delivered Value
Bed will be horizontal over the whole length, measured at jacking stations	<1mm
Deviation from the channel centre line over whole length	<3mm
Deviation of the side walls from vertical	<1.5mm
Bed to be horizontal over the whole length	<2mm
Width deviation between both walls to be within (over any section – distance between jacking stations)	<1mm

With the channel filled to 80% of the maximum available depth with water:

All of the above tolerances to be increased by 50%.

Loadings for all static calculations: **For static load calculations it has been assumed that the channel is 100% full of water.**

OPERATIONAL REQUIREMENTS

Suspended Medium

The system must be designed to recirculate suspended medium up to 4mm in diameter. If larger size grain size is being used within the flume additional pre discharge sieve/filter will need to be fitted to ensure medium above 4mm does not enter the pump.

Floor Loads

Parameter	Delivered Value
Max Weight (footprint load)	0.2 N/mm ²

Vibration/Noise

System modules and components assembled within the product must be designed to withstand vibrations associated with moving product/ excessive noise when in operation, to be achieved through use of low speed high flow pumps; these significantly reduce running noise and reduce the heat energy being transferred into the water.

Life time and Service requirements

It must be possible to service, exchange or repair the system components and modules without dismantling the flume channel.

A maintenance schedule must be provided with the flume.

CONTROL FUNCTION

The system to be supplied with a floor standing control panel. This will have user manual controls for manual operation of the pump and the flume tilting mechanism with pump flow rate meter and tilt reading. The cabinet to house the frequency inverter to control the tilt and pump motor speed. The cabinet to have a remote setting which allows the user to control both pump and tilting mechanism using the acquisition software which is part of the required proposal.

This software to have a pressure transducer interface with a series of tapped orifices at the base of the flume. The data acquisition unit to have 10 static pressure sensors and 1 differential pressure sensor with full data sampling capability with configurable sampling times and data output.

Software Architecture and Automation

Software control functions and interface are defined as.

Parameter	Delivered Value
<i>Compatible with Windows</i>	7, 8,10
<i>Circulating Pump 1</i>	Variable - Inverter Speed Control/ PID Loop (constant flow rate)
<i>Electro Magnetic Flow Meter</i>	Read Out 0 – 120 l/s to 2dp
<i>Electronic Manometer</i>	10 locations +/-690H ₂ O
<i>Low range differential pressure sensor</i>	0 – 25mm H ₂ O
<i>Thermistor (water temperature)</i>	0 – 50°C
<i>Voltage Input Channel x 2</i>	+/-5V
<i>Graph Plotting</i>	Yes
<i>Export Data</i>	Excel
<i>Inclination</i>	Keyed +/-

A software package with appropriate electronic hardware built into the control console to be included. This software will be capable of controlling the pump and therefore the flow rate from the computer (computer included in the supply). It will be possible to define flow rate patterns such that the user can use the computer to define a number of time slots of variable length and the flow rates to be used during these time periods.

On starting the sequence, the flow rates will be controlled automatically by the computer according to the pre-defined flow rate without further operator input. During the time slots the pump speed is adjusted in a control loop in order to maintain the required flow rate, as measured on the flow meters.

Flow to be controlled exclusively via the computer (or the manual control via the supplied panel). We do not want valves for control where sediment is in circulation due to the risk of damage to the valves and their propensity to trap sediment.

USB PC interface and software to allow data logging of the above parameters. The software to include sophisticated sampling, calibration and graph plotting facilities including the ability to save or export the data in Microsoft Excel format.

The water flow rate from the pump can be controlled using a PID control loop whereby the required flow is entered as the set-point of a PID loop and the speed of the pump is then varied by the PC to maintain the required flow rate.

The PID parameters can be varied by the operator if required to change the characteristics of the controller.

Three copies of operation manual are mandatory.

External Communication ports

<i>Parameter</i>	<i>Delivered Value</i>
<i>USB Port</i>	<i>X1</i>
<i>PLC Programming Port</i>	<i>X1</i>
<i>Voltage Input Channel</i>	<i>X2</i>

Monitor Detection Signals

All detection signals to have a visible alert.

<i>Parameter</i>	<i>Delivered Value</i>
<i>Electronic Manometer x 10 locations</i>	<i>6767N/m² (+/-690mm H₂O)</i>
<i>Low range differential pressure sensor</i>	<i>0 – 245 N/m² (0 – 25mm H₂O)</i>
<i>Thermistor (water temperature)</i>	<i>0 – 50°C</i>
<i>Voltage Input Channel x 2</i>	<i>+/-5V</i>

PERIPHERAL SYSTEM DESIGN

Instrument Rails

Parameter	Delivered Value
<i>Length</i>	<i>10000 mm</i>
<i>Support Load</i>	<i>40Kg</i>
<i>Length Markings</i>	<i>Every 1mm</i>

A pair of instrument rails to be mounted on the support structure of the working section.

BASKET WEIGHING SYSTEM

A basket weighing system which will consist of a stainless steel catch tray must be provided. This is suspended by a set of 4 x stainless steel wires with adjustable stainless steel turnbuckles.

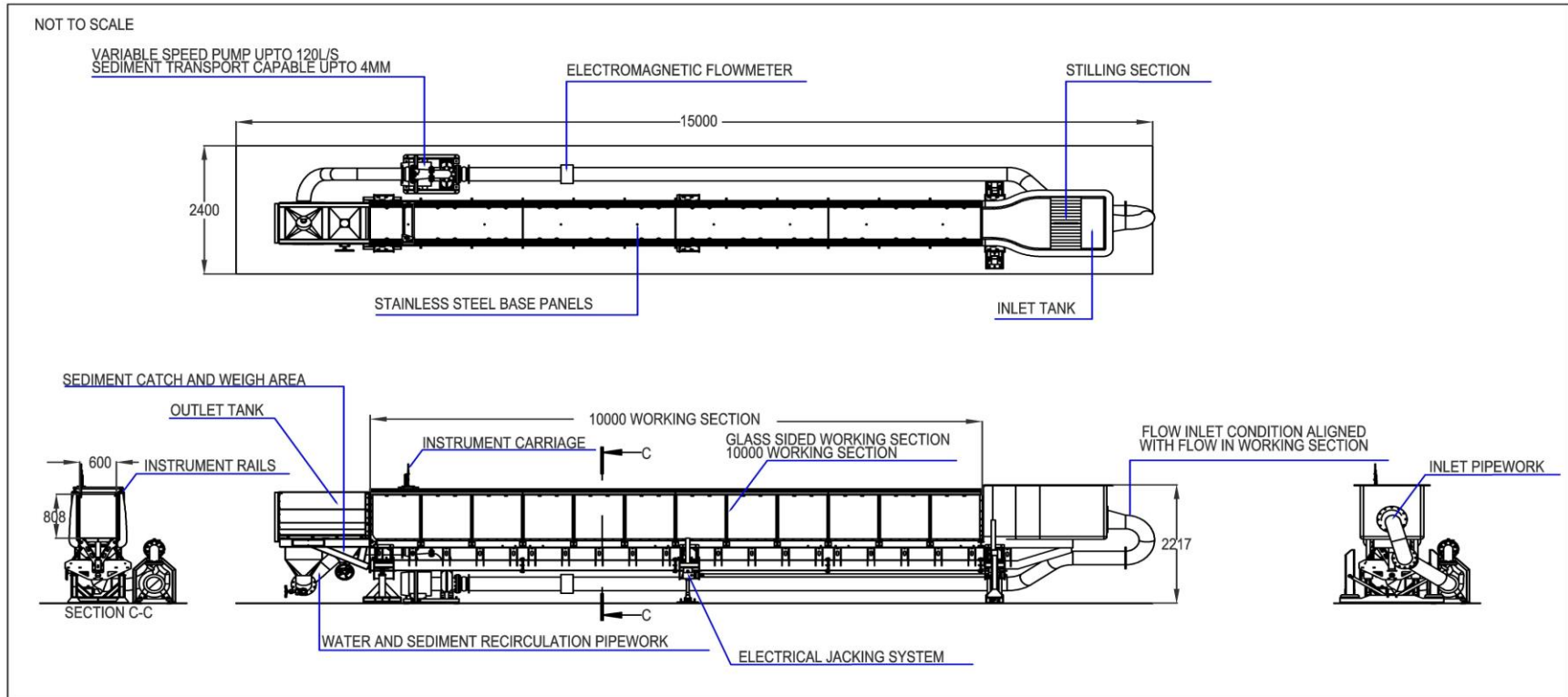
The basket to be fitted with low friction contact points to reduce the impact of flow against the basket where in contact with the sediment 'drop out' section. The basket must be certified for safe working load.

A Sediment diverter plate assists to 'drop out' fast moving particulate, the plate to be perforated to reduce flow disturbance. The use of this diverter plate will be of benefit when smaller particle sizes are used in the flume, this is a removable unit and should be fitted as required.

The basket support wires to be mounted to a support beam which has a lifting eye fitted to it. The support beam to rest in a pair of mount blocks which are fitted to 2 x load cells. The system will be integrated into the software package and allow the operator to log weight against time and zero the scale. The unit can be zeroed either without flow or under flow conditions depending on user requirements.

SARDAR VALLABHBHAI NATIONAL INSTITUTE OF TECHNOLOGY, SURAT – 395 007

Tel Nos: 0261-2259571, 82 to 84 TeleFax: 0261-2228394 director@svnit.ac.in; <http://www.svnit.ac.in>



UNLESS OTHERWISE SPECIFIED: DIMENSIONS ARE IN MILLIMETERS TOLERANCES: MACHINED LINEAR DIMS: ± 0.25 UNMACHINED LINEAR DIMS: ± 0.5 ANGULAR DIMS: ± 0.5° DEBURR AND BREAK SHARP EDGES ALL MACHINED SURFACE 3.2	MATERIAL:	TITLE		DATE	REVISIONS	REV.
	FINISH:	14.4m X 0.60m X 0.80m (L X W X D)		DRAWING NO.	DESCRIPTION	ISSUE
		WITH FULL SEDIMENT RECIRCULATION				
		SCALE: 1:100	USED ON:			
THIRD ANGLE PROJECTION	DATE:	SIZE	A2			

Signature of the bidder with stamp

Section V : GENERAL TERMS AND CONDITIONS

1. The bidder must comply all the pre-qualification conditions mentioned in the head “**PRE QUALIFICATION REQUIREMENTS OF THE BIDDER**”
2. Tenders should be enclosed in a **sealed covers**, super scribed “**Tender For: Supply of Recirculating Sediment Transport Flume and Related Accessories in Advanced Hydraulics Laboratory of Civil Engineering Department.**” addressed to the “Director, Sardar Vallabhbhai National Institute of Technology, Ichchanath, Surat–395 007.”
3. The main sealed cover should contain within it, apart from the other required documents/items, the following at least Four envelopes viz.
 - a. A sealed Envelope super scribed as “**Prequalification Requirements of the Bidder**”
 - b. **A sealed envelope to contain the Demand Draft for EMD and the Demand Draft for tender fees.**
 - c. A sealed Envelope super scribed as “Technical Proposal”
 - d. A sealed Envelope super scribed as “Financial Proposal”

It should very clearly be noted that **any bid without these Four envelopes, enclosed in the main envelope, will be treated as an incomplete bid and is liable to be rejected.**

4. The tender documents without the earnest money deposit will be rejected. EMD shall not bear any interest and will be refunded on request only to the contractors who does not qualify or receive the work order.
5. The tender documents with earnest money deposit previously for any other tender will not be considered and in such case tender will be rejected.
6. The tenders received after due date will be rejected.
7. The Techno-commercial offer of only those tenders will be considered who satisfies pre-qualifying criteria.
8. The validity of offer must be at least **120 days** from the date of opening of the price bid.
9. Deviations from the mentioned conditions if any shall be mentioned in the technical proposal itself.
10. The rates shall be quoted including standard accessories and spares etc. to be supplied with the unit.
11. The bidder should preferably visit the site where equipment is to be install and shall satisfy himself about the local conditions, locations, and obtain clarification in writing from the Coordinator, DST FIST Project, Civil Engg Deptt of SVNIT, Surat if required.
12. No claim of any nature on any ground on inadequate site information or knowledge or misunderstanding or otherwise in such respects will be admissible, later on. Interested parties may contact Coordinator, DST FIST Project, Civil Engg Deptt., SVNIT, Surat if required for inspection of site during working hours of the institute.
13. The rates quoted once will be treated as final. No alteration either in rates or in tender documents will be entertained.

14. No negotiation meetings will be conducted.
15. In case of any dispute, the decision of SVNIT authority/Director shall be final and abiding to the Contractor.
16. The bidder must meet necessary statutory and legal compliances. SVNIT will not be responsible for any legal action arising out of non-compliance to statutory & other similar legal compliances.
17. The bidder must take necessary insurance for their personnel deputed at the institute. The institute will not be responsible for any damage caused to these personnel by way of accident including the loss of life.
18. No attempt shall be made by the bidder or the staffs deputed by the bidder at SVNIT Surat to unlawfully reveal, misuse or encroach upon the intellectual or private data/information at the SVNIT, Surat to which they may have access, too, as part of the maintenance work carried out.
19. Any loss or damage caused to the institute property by the personnel deputed by the bidder will be recovered from the bidder and the decision of institute authority in this matter will be treated as final and abiding to the bidder.
20. In case the unit is internationally certified for quality and bears the ISO 9000 or TQM certification, a copy of relevant certificate must be enclosed.
21. In case of the authorized dealers quoting on behalf of manufacturers a copy of certificate stating that the equipment being quoted by the party is on behalf of the concerned manufacturer and manufacturer undertake the responsibility to provide the after sales maintenance of the equipment must be enclosed. Also, the dealership certificate must be enclosed with the Tender documents.
22. The supplier or the Indian representative should install the system and bring into complete operation, at Advanced Hydraulics Laboratory, Civil engineering department, SVNIT Surat and to satisfaction, without any charge.
23. The supplier or the Indian representative should give performance warranty for -
 - The complete system for the warranty period specified by the supplier from the date of the completion of the satisfactory installation.
 - The warranty period shall be **Three years** from the date of satisfactory installation.
24. The bidder should provide necessary professional handy training for Management & trouble shooting with valid certification of Six (06) concerned SVNIT staff for operation, configuration, management, and servicing of entire system at Advanced Hydraulics Laboratory, Civil Engineering Department, SVNIT Surat. No extra charges will be paid for the training, complete expenses including TA / DA and any other expense towards the same will be bare by the bidder.
25. The supplier shall arrange for repair/replacement of the defective/worn out components of the unit at this Institute premises during the warranty period and within 15 (fifteen) days of purchaser's first communication in this regard. This will be carried out at the cost of supplier and no charges whatsoever will be paid by the Purchaser including T.A. and D.A. of the Service Engineer for the same.
26. If Supplier is not able to rectify the defect or make the alternate arrangement within stipulated time limit i.e. 15 days. Institute can get it rectified and the amount so spent will be deducted from security deposit plus 10 % of the expense made.
27. In the event of material supplied are not being in accordance to the specifications of items

ordered or is found in damaged condition, the supplier will at his cost and risk, arrange to replace the same without any claims whatsoever for the same.

28. The rate for every individual equipment/instrument should be quoted in Indian rupees for all Indigenous goods. In case of imported equipments/instrument the institute is exempted from the payment of Excise and Customs duty only against the DSIR certification. In case of foreign instruments, prospective Supplier should handle the custom clearance and transportation up to the destination i.e. SVNIT Surat.
29. The prospective supplier immediately on intimation after successful bid, shall furnish the Security Deposit which will be equivalent to 10% of the overall cost of the bid. The prospective Supplier will enter into an agreement with the Director, S V National Institute of Technology Surat, (herein after referred to as THE DIRECTOR) for the due fulfilment of the contract.
30. This security shall be in the form of Bank guarantee and will remain valid for the entire warranty period of three years or more as specified. Failure on the part of the prospective Supplier to provide the service as per the terms and conditions in this document, shall constitute a breach of the terms and conditions of the contract and will entail forfeiture of the security money deposit, solely to the discretion of the Director, SVNIT.
31. **After accepting work order** the bidder shall complete the installation, commissioning and providing training of the entire system **within 120 days**.
32. The financial bid shall not contain any conditions. The financial bid shall also contain cost of extra items as proposed by the bidder in the technical bid.
33. The successful bidder must submit a letter of accepting the work order within 15 days of receipt of work order otherwise the work order is liable to be canceled without intimation.
34. The bidder must deposit a Security Deposit at a rate of **10%** of work order at the time of accepting the work order within 15 days of receipt of work order otherwise penalty of 2% of the work order leveled. **The contract will commence only after Security Deposit and penalty if applicable is deposited.**
35. Security deposit shall be released only after the satisfactory completion of three year warranty period, due if any and faithful performance of the work. No interest will be paid on security deposit, in case of any default on the part of the supplier, the security deposit will be forfeited and the decision of SVNIT authorities in this regard will be treated as final and abiding to the contractor.
36. In the event of any correction of defects or replacement of defective material during the warranty period, the warranty for the corrected/replaced material shall be extended to a further period of 36 months and the Performance Bank Guarantee for proportionate value shall be extended 60 days over and above the extended warranty period.
37. The bidders are STRONGLY advised **to fill in the cost of the equipment including accessories in the SUMMARY SHEET** provided at the end of this document – which shall become the basis for the financial comparison of the bid. Any bids without the summary sheet may be rejected.
38. **All applicable Taxes should be mentioned separately.**

39. Comparison will be made based on base rate.

40. The rates quoted should be exclusive of all the taxes, duties, levies including sales tax, service tax and turnover tax etc. as applicable on work contract in the state of Gujarat.

41. Price in Indian Rupees at F.O.R SVNIT, Surat should be quoted for cases where the equipments are to be imported by the party on behalf of the institute.

Note: The Institute doesn't issue 'C' or 'D' forms for tax concessions.

42. The purchaser being an Educational Technical Institute, the concession applicable in rates / Taxes under State / Central Government notification should be considered while quoting. Though Institute cannot issue 'C' or 'D' forms, a certificate regarding the exclusive use of equipment/Instrument to be procured for the purpose of teaching/research can be issued if any concession in this regard be made available to the purchaser, CST shall be charged at concession rate on scientific equipment/instruments as per notification of the state in which city is situated. The certificate for CST concession (Concessional rate of Central Sales Tax) for availing concessional rate will be issued by this Institute in respect of its purchase made in course to Inter-State trade or commerce from dealer/manufacturer outside the Gujarat State.

43. The rate for every individual equipment/instrument should be quoted in Indian rupees for all Indigenous goods. In case of imported equipments/instrument the institute is exempted from the payment of Excise and Customs duty only against the DSIR certification. In case of foreign instruments, prospective Supplier should handle the custom clearance and transportation up to the destination i.e. SVNIT Surat.

44. The supplier should clearly state the delivery period and time required for installation and commissioning of equipment from the date of receipt of firm order. But, it should be within 120 days from the date of purchase order. In case, if the supplier anticipates delay in delivery of any or all items due to the reasons beyond his control, the supplier shall apply for suitable extension stating the reasons for the same and state his expected date of delivery. The Institute, if feels suitable, may extend the date of delivery.

45. Payment Terms :

(i) No Advance payment will be released for annual contract.

(ii) On Delivery and Final installation: Full payment of contract price shall be paid to the supplier within 60 days on receipt of Goods, upon submission of the documents and after the satisfactory installation and commissioning of the goods and training of personnel for use and servicing of the equipment.

(iii) The necessary deduction of income tax at source will be done as per government norms.

(iv) This Institute is a Technical Education National Institute under MHRD, Govt. of India. All payments shall be made as per the prevailing norms of Govt of India and SVNIT, Suart.

46. The bid from the vendor who is found in fraud activity with SVNIT or on the name of SVNIT shall not be allowed for bidding and the bid from such vendor will not be accepted and will be rejected. The bid submitted in consortium with such vendor will not be considered and if such information is found later then the work order issued will be terminated immediately without any notice.

- 47. The bid from the vendor who has been black listed at any Government organization / Semi-Government Organization will be rejected.**
48. At any time prior to the deadline for submission of bids, SVNIT may, for any reason, whether at its own initiative or in response to a clarification requested by a prospective bidder, modify the bidding documents by amendment.
49. All prospective bidders should keep looking at the institute website for information concerning the changes/amendments on the website. No claim of any nature on any ground on inadequate information or knowledge or misunderstanding or otherwise in such respects will be admissible, later on.
50. It is compulsory to attach all the mentioned and required documents at time of submission of tender. No additional attachment is permitted later on.
51. All documents along with tender form must be numbered.(1...n) and corresponding page number must be entered in the pre-qualify sheet, no further clarification will be entertained.
52. The Bidder has to examine all instructions, forms, terms, conditions and specifications in the bidding documents. Failure to furnish all information required by the bidding documents or submission of a bid not substantially responsive to the bidding documents in every respect will be at the Bidder's risk and may result in rejection of its bid.
- 53. SVNIT reserves the right to change any bid condition of any item even after inviting the bids, with/without prior notification**
54. Arithmetical errors will be rectified on the following basis: If there is a discrepancy between the unit price and the total price that is obtained by multiplying the unit price and quantity, the unit price shall prevail and the total price shall be corrected. If there is a discrepancy between words and figures, the amount in words will prevail. If the prospective Supplier does not accept the correction of errors, its bid will be rejected and its bid security may be forfeited.
55. Dispute, if any will be subject to Surat jurisdiction only.

DIRECTOR, SVNIT.

Section VI : DECLARATION

Tender reference no: CED/WRE/DST-FIST/Retender/1414 /2017-18

Date: 03.07.2017

I/We hereby declare I/We have read all the terms and conditions of the Tender stated in all the sections in this tender document and as may be modified/mutually agreed upon, are acceptable and binding to me/us.

I/We have also verified that the bidding document contains at least the following

- A sealed Envelope superscripted as “**Prequalification Requirements of the Bidder**” containing compliance statement for all the prequalification requirements.
- **A sealed envelope to contain the Demand Draft for EMD and the Demand Draft for tender fees.**
- A sealed Envelope superscripted as “**Technical Proposal**” to contain at least the following:
 - The Tender document appropriately signed and stamped at all pages
 - General Conditions of Contract
 - Acceptance to all the Requirements;
- A sealed Envelope superscripted as “**Financial Proposal**” to contain at least the following
 - **Price Schedules of each and every item quoted as per Summary Sheet in the format laid in this Document.**

I also understand that my bid without these four envelopes, enclosed in the main envelope, superscribed as “Tender for Supply of Recirculating Sediment Transport Flume and Related Accessories in Advanced Hydraulics Laboratory of Civil Engineering Department at SVNIT, Surat” will be treated as an incomplete bid and is liable to be rejected.

Place:

Signature:

Date:

Name & Address of the Bidder with office Stamp with all contact details

Section VII SUMMARY SHEET

Tender reference no: CED/WRE/DST-FIST/Retender/1414 /2017-18

Date: 03.07.2017

Sr.No	Description of Item	Number of units	Rate per Unit in Rs.	Total Amount in Rs.
1	Recirculating Sediment Transport Flume 0.6mx0.8mx14.4m along with the basic accessories	1		
	Includes			
	Inlet Tank	1		
	Discharge Tank	1		
	Intermediate Section	4		
	Inlet tank flow straighteners	1		
	Tilting Jack frames	3		
	Pivot section	1		
	Blend Chamber	1		
	Pump and Pipe Assy	1		
	Stop Weir	1		
	Electrical System	1		
	Instrument Carriage	1		
	Instrument Rails	1		
	Inlet Support Frame	1		
	Discharge Support Frames	8		

SARDAR VALLABHBHAI NATIONAL INSTITUTE OF TECHNOLOGY, SURAT – 395 007Tel Nos: 0261-2223371,82 to 84, TeleFax: 0261-2228394 director@svnit.ac.in; <http://www.svnit.ac.in>

	Glass	8		
	Pump	1		
	Flow meter	1		
	Console	1		
	Tilting Mechanism	1		
	Data Logger	1		
Total in Rs.....				
Rebate / Concession for Academic Institute in Rs.				
Taxes as Applicable in Rs.				
Total Cost in Rs.....				
Rupees (In Words)				

Note :

- (i) All taxes should be mentioned separately.
- (ii) This summary sheet must be enclosed in Commercial envelop only, otherwise the bid will be rejected.
- (iii) Unit prices of each item should be quoted, without which bid will be rejected

Date :
Place :

Signature & Stamp of Bidder

Form No. 1

The Bidder should be supplying Recirculating Sediment Transport Flume and Related Accessories since last 3 financial years.

Name of the Bidder :

Sr. No	Name of the Customer	Address of the Installation	Start date of Project	Completion date of Project	Scope of the Work	Value of the Project in Rupees	Work Order attached (Yes/No)

Note: - Please attach purchase order/ contract agreement and completion certificate for each of project details mentioned

Date :
Place :

Signature & Stamp of Bidder

Form No. 2

Detail of Office Locations

Sr. No.	Address	Contact Person	Contact No.	Type of Supporting Document Attached
1.				
2.				
3.				

Date :
Place :

Signature & Stamp of Bidder