## PROCEEDINGS OF THE PRE-BID CONFERENCE HELD ON 30-Nov-2021 THROUGH WEBEX TOWARDS PROCUREMENT OF PNEUMATIC PRESSURIZATION SYSTEM WITH DIGITAL CONTROLLER.

The Pre-bid Conference was held and the following T&PC members attended the meeting: -

SI. No.	Name & Designation		Role	
1	Dr. M. Ramesh Kumar,	Chief Scientist, ACD	Chairman	
2	Dr. Soumendu Jana,	Chief Scientist, PR	Member	
3	Dr. J. N. Balaraju,	Sr. Principal Scientist, SED	Member	
4	Mr. S. G. Ramanathan,	Principal Scientist, ALD	Member	
5	Dr. C.M. Manjunatha,	Chief Scientist, Head , SID	Member	
5	Mr. M. Mohan Kumar,	Sr. Principal Scientist, SID	Member - Convener (TSC)	

The list of Prospective bidders who attended the Pre-bid Conference is as per Annexure-I.

At the outset, the Chairman welcomed all the Members and the representatives of the Bidders and briefed in general the scope of the Project. The Indenting Officer to read out the clarification sought by the bidders and the replied thereto as detailed in Annexure-II (Part A: Technical Clarification and Part B: Commercial Clarification, if any).

The representatives present were satisfied with the replies given and it was informed that the corrections / additions / clarifications given, as discussed during the Pre-Bid Conference would be hosted on the website of CSIR-NAL and all prospective bidders are required to take cognizance of the proceedings of the Pre-Bid Conference before formulating and submitting their bids as stipulated in bidding Documents.

The meeting ended with a vote of thanks to the Chair.

Encl: as above.

Dr. Soumendu Jana Member

S. G. Ramanathan Member Dr. C.M. Manjunatha, Member W. Wohnly

Member

M. Mohan Kumar, Member - Convener (TSC)

> Dr. M. Ramesh Kumar Chairman-T&PC

#### CSIR-NATIONAL AEROSPACE LABORATORIES BENGALURU - 560 017

TENDER NO.: NAL/PUR/SID/222/21-Z[0]

DATE & TIME: 30-Nov-2021 @ 11.00 am

VENUE: THROUGH WEBEX

Pre-Bid Conference for Pneumatic Pressurization System with Digital Controller

#### ATTENDANCE SHEET - T&PC MEMBERS

Sr. No.	Name		Signature
1	Dr. M. Ramesh Kumar, Chief Scientist, ACD	Chairman	danishdenry
2	Dr. Soumendu Jana, Chief Scientist, PR	Member	_
3	Dr. J. N. Balaraju, Sr. Principal Scientist, SED	Member	dealing
4	Mr. S.G. Ramanathan, Principal Scientist, ALD	Member	
5	Mr. M. Mohan Kumar, Sr. Principal Scientist, SID	Member- Convenor -TSC	SJ. Stober
5	Dr. C.M. Manjunatha, Chief Scientist, Head, SID	Member	Baris.

ANNEXURE - I

# CSIR-NATIONAL AEROSPACE LABORATORIES BENGALURU

#### **TECHNICAL QUERIES & CLARIFICATION**

Tender No.

: NAL/PUR/SID/222/21-Z[0]

Item Description

: Pneumatic Pressurization System with Digital Controller

### MTS Testing Solutions India Pvt. Ltd.

Sr. No.	Query / Clarification Sought	Clarification/Amendment
1.	Maximum Supply pressure 120 Psi ( or 8.28 bar ) please confirm the same	Confirmed with no changes
2.	Max flow capacity specified is -3-4 m3 / sec (it is nothing but 3000 to 4000 litres/second!!!) @ 6.89 bar; please check this parameter and confirm - is such high flow required? If yes, please confirm proposed or available pipe size? Please confirm diameter - input and output size and also share drawing/details of process connection.	Confirmed with no changes.
3.	Test Pressure-Down Time;  Up to 2 psi < 300 second.  NAL suggesting to de-pressurise the system from 100 Psi to 2 Psi in 300 seconds. Please confirm  Up to Ambient pr. < 600 second.  NAL suggesting to de-pressurise the system from 2Psi to atmospheric pressure in next 300 seconds. Please confirm	Confirmed with no changes
4.	Features: Why only 2 bar pressure switch is selected; when pressurization is done upto 6.83 bar (100 Psi ). Please clarify	Though we had asked for maximum supply pressure of 120 psi, we may operate much lower magnitude in our test applications and 2 bar Pressure switch may be sufficient. The vendor may provide the same

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## **Moog Motion Controls Private Limited**

Sr. No.	Query / Clarification Sought	Clarification/Amendment
1.	What is the exact volume to be filled and @ what is the time available to fill that volume?	The vendor may provide the system catering to the max supply pressure and flow capacity as per the specification requested.
2.	In other word , does pressurization cycle has any particular curve ( or any predefined chart ? ) - if so please share with us ?	Pressurisation cycling is required but Right now cannot share any info but we may require it in future
3.	The referred flow in the enquiry is 3-4 m³ / sec @ 100 psi (6.894 bar ); is this the maximum flow or desired flow capacity? these are very high flow rates and we need clarification.	Confirmed with no changes.
4.	We can roughly handle flows around 8000 to 10000 LPM at 6 bar pressure ( considering 2 " pipe lines ) ( this is due to pressure regulation; if unregulated flow, that means only if it ON / OFF during pressurization, still we can higher flows)	The system should cater to the max flow capacity specified
5.	We are thinking of using 2 inch pipe connection (process inlet and process out let) please share the process inlet connection size available in site	The Vendor may provide their standard in pipe size. Inlet connection will be modified accordingly later by us.
6.	Please share the details of hoses required (process input side and process outlet side) please specify number of hoses and the length of hoses	Standard hoses with a length of 10 metres may be provided.
7.	Do we need to provide signal for pressurization as well as depressurisation separately? (please clarify if we need to give analogue signals (voltage or current? one for pressurization and other for depressurization)	The pneumatic controller shall accept an analogue command signal from controller to vary the up/downstream pressure in response to the command signal
8.	If we do not have to follow any chart / curve for pressurization, we can simply switch ON and build pressure, pls confirm.	Demand signal in terms of pressure cycle will be the input to the controller
9.	In the enquiry the test pressure is not clear! what is the maximum test pressure ( only maximum supply	Max test pressure is 120 Psi

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	pressure and flow @ 100 psi has been mentioned)	
10.	We are also not clear why 2 bar ( guage pr) has been requested ? and what is the use? since indicated test pressures are high and sensor with only 2 bar gauge pressure has been asked; we need clarification on same!	Though we had asked for maximum supply pressure of 120 psi, we may operate much lower magnitude in our test applications and 2 bar Pressure switch may be sufficient. The vendor may provide the same.
11.	Test pressure -Down Time; do we need to come down from 100 psi to 2 psi in 300 seconds?? and then from 2 psi to ambient pressure in next 300 seconds?> in other words is a predefined depressurisation chart available with all the desired parameters, kindly confirm?	Confirmed with no changes

(M MOHAN KUMAN)
Signature of 10 & PL

(DR. C.M. MANJUNATHA)
(PL)

#### **CSIR-NATIONAL AEROSPACE LABORATORIES BENGALURU**

#### **COMMERCIAL QUERIES & CLARIFICATION**

Tender No.

: NAL/PUR/SID/222/21-Z[0]

Item Description

: Pneumatic Pressurization System with Digital Controller

Sr. No.	Query / Clarification Sought	Clarification/Amendment
1.	6.2 Technical Qualification Criteria	
	b) 'The bidder' should have manufactured and supplied (/erected/commissioned) at least 10 numbers (herein after referred as 'The Qualifying Quantity') of 'The Product' in at least one of the last five (5) years ending on 'The relevant Date', and out of which i) At least 04 numbers of offered version/model of 'The product' should be in successful operation for at least 02 years on the date of bid opening	Citing the vendors reason of pandemic situation across the globe from past 2 years, The point At least 04 numbers of offered version/model of 'The product' should be in successful operation for at least 02 years on the date of bid opening is changed to 05 years on the date of bid opening
2.	The Product' - does it mean both "The Pressurization System and Pressurization Digital Controller" should be supplied to Aerospace Industries and in successful operation for at least 02 years on the date of bid opening?	Product means both both "The Pressurization System and Pressurization Digital Controller"
3.	Quotation submission date to be extended to 30 Dec 2021 from the existing 13 Dec 2021.	Agreed for the extension upto 30 Dec 2021.

Sr. Controller of Stores & Purchase For and on behalf of CSIR

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