

Tender Ref. No.: NTSC/COMPTRG/AR-VR/2018/44

TENDER DOCUMENT

for

Supply, Installation & Commissioning of AR/VR Lab Equipment

NSIC Technical Services Centre The National Small Industries Corporation Ltd.

(A Government of India Enterprise)
Okhla, Industrial Estate, Phase III,
New Delhi-110020

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NOTICE INVITING TENDER

The NSIC Technical Services Centre, Okhla invites sealed tender in two bid system (Technical & Commercial bid in two separate envelopes) from eligible & qualified Original Equipment Manufacturers (OEMs)/ Authorised Distributors of OEMs/ Authorised Dealers of OEMs, for the Supply, Installation, Commissioning on site & Training on Operation(s) & Maintenance of the supplied machines, for setting up of AR/VR training lab.

The details are summarized below: -

a)	Tender number	Reference number for inviting bids through this tender is NTSC/COMPTRG/AR-VR/2018/44
b)	Eligible Bidder	Original Equipment Manufacturers (OEM) / Authorized Distributors of OEM / Authorized Dealers of OEM (as per the eligibility details placed in the tender at Para 2 of "Instructions to the Bidders".
c)	Purchaser	The NSIC-Technical Service Centre, (A Government of India Enterprise) which is one of the Technical Centre of National Small Industries Corporation.
d)	Usage of Machines	The purchaser would place the machines in their training centre and shall be utilized for imparting skill/entrepreneurship development training and rendering services to the industries.
e)	Scope of Tender	Supply, Installation, Commissioning & Training to trainers, Comprehensive Warranty of 2 years + Maintenance Contract of 3 years after expiry of warranty.
f)	Specification/ Details of machines	The detailed specifications of machines are specified in tender document placed at Annexure-A.
g)	Web page for details of tender	Web page: http://www.nsic.co.in/Tenders The prospective bidders are advised to visit the website periodically for any update in respect of this tender. No separate advertisement/communication will be sent to the individual and/or parties.
h)	Addresses of supplies	The machines(s) is/ are proposed to be supplied at NSIC-Technical Services Centres at Okhla, Industrial Estate, Phase III, New Delhi-110020
j)	Earnest Money Deposit (EMD) along with Tender	Interest free, EMD of Rs. 1,50,000/-(RupeesOne Lakh Fifty thousand Only) shall be submitted in the form of D.D. in favour of 'NSIC Ltd-NTSC A/C' payable at New Delhi and to be placed in the Technical Bid envelope while submitting the tender. Alternatively, EMD can be submitted through Online Banking Mode for which the details are given below in "Instructions to Bidders" section. UTR No. and date of the online banking transaction on letter head of the bidder is to be submitted in the Technical Bid envelope while submitting the tender.
k)	Exemption from the payment of EMD and Tender fee	The exemption for the payment of EMD as well as tender fee will be applicable under Rule 170 & 173 of General Financial Rules (GFR), 2017 for Micro & Small Enterprises (MSEs) as per the "Public Procurement Policy for Micro & Small Enterprises Order 2012". To claim the exemption, self-certified copy of valid certificate/proof of registration



		for the goods for which this tender floated, must be enclosed with Technical Bid.
l)	Security Deposit	The successful bidder has to submit interest free security deposit amount to the value equalling to 10% (Ten percent) of the total value of order within five working days from the date of issue of purchase order by Purchaser.
m)	Cost of Tender Documents	The tender document can be collected from the office of the Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-20 in between the period from 19.08.2019 to 06.09.2019 between 10:30 hours to 15:45 hours against payment of Rs.1180/-(Rupees One thousand one hundred eighty rupees only) (Non-refundable, Inclusive of GST) by way of demand draft, in favour of 'NSIC Ltd-NTSC A/C' payable at New Delhi. Alternatively, tender document form can be downloaded from our website www.nsic.co.in from 19.08.2019 to 06.09.2019. In case the tender document downloaded for submission of offer, the non-refundable tender fee of Rs.1180/- in form of demand draft in favour of 'NSIC Ltd-NTSC A/C' payable at New Delhi shall be enclosed with Technical Bid of the tender while submitting the tender or through Online Banking for which details are given below in "Instructions to Bidders" section.
n)	Last date of submission of bid	Tender must be delivered to the address below on or before 06.09.2019 up to 15:45 hours (Time). The bids received after the due date and time shall be rejected. Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-20.
0)	Date of opening of Technical Bid (Envelope-1)	The technical bid for the tender shall be opened on 06.09.2019 at 16:30 hours at the address as under: Office of the Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-20.
p)	Date of opening of Commercial Bid (Envelope-2)	The date for opening second envelope containing Commercial Bid will be intimated to the technically qualified bidders separately.

Note: In case of any further details required, the same can be collected from the office of the Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-20 from **19.08.2019 To 06.09.2019** (except Saturday & Sunday) between 10:30 hours to 15:45 hours.

Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-110020.



INSTRUCTIONS TO THE BIDDERS

The Tender shall be submitted in accordance with these instructions, as under.

1. Abbreviations:

Throughout this tender document, the word/ term:

- a) "NTSC" means NSIC-Technical Services Centre
- b) "NSIC" means The National Small Industries Corporation Ltd.
- c) "day" means Calendar day
- d) "working day" means Monday to Friday in week
- e) "tender" means tender number NTSC/COMPTRG/AR-VR/2018/44.
- f) "machines" means the machines/ equipment/software/accessories as detailed at Annexure-A.
- g) If context so requires, "singular" means "plural" and vice versa.
- h) "EMD" means Earnest Money Deposit, without interest.
- i) "Purchaser" means The National Small Industries Corporation Ltd
- j) "Bid" means the document and financial details submitted by bidder in response to this tender.
- k) "Bidder" means the eligible and qualified bidder i.e. Original Equipment Manufacturers / Authorized Distributors/ Authorized Dealers.
- 1) "OEM" means Original Equipment Manufacturer

2. Eliqible Bidder:

- a) The intending Bidder, in case of Original Equipment manufacturers shall submit a self-declaration on their letter-head, along with the Technical Bid, confirming that they are regular in manufacturing & supplying the similar machines, as asked in this tender, for the last Ten (10) years.
- b) The original equipment manufacturers shall possess ISO Certificate for their establishment. The copy of the valid ISO Certificate shall be placed with the Technical Bid.
- c) The intending Bidder, in case of Authorized Distributor of OEM / Authorized Dealer of OEM shall possess valid authorized Distributorship / Dealership license from Original Equipment Manufacturer and to be engaged in regular supply of similar machines for the last ten (10) years. The OEM shall have ISO certificate. Also the authorised Distributor/Dealer shall be associated with OEM on the basis of which the said tender is participating, for the last three years. The Bidder shall enclose the copies to substantiate their engagement in supplies for the machines/ equipment for which the above said tender is being issued, for the last five years and associated with OEM for the last three years. The copy of the same should be enclosed in Technical bid while submitting the bid.
- d) The intending bidder has never made any default in supplying the machines/ equipment to Government / Semi Government/ Central or State Public sector enterprise(s) for any reasons in the last three years.



3. Scope of Supplies:

- a) The material shall be supplied in compliance to the specifications mentioned in Annexure- A of the tender document.
- b) The specifications of the machines as mentioned in the Annexure-A are the minimum requirements of tender, however higher specifications of machines may be considered subject to their cost economics i.e. competitiveness in financial terms for the address(es) of supply.
- c) After the supply of machines by the successful bidder as mentioned in the Annexure A, the successful bidder has to execute its installation & commissioning in the designated site(s) at the address. No extra cost shall be paid for this purpose.
- d) After the installation & commissioning of machines i.e. AR/VR Lab Equipment, the training to the local trainers shall be given for ten (10) working days wherein the training about the machines's operations, maintenance, information about Do's & Don'ts as well as trouble shooting & all other areas which are necessary for smooth functioning of machines shall be provided to the persons designated by purchaser, at site, by the successful bidder. No extra cost shall be paid to the successful bidder for imparting this training.
- e) The successful bidder shall give on-site comprehensive warranty of machines for minimum two years from the date of successful commissioning of machines at the designated address. The purchaser is not liable to pay any extra charges on any account during warranty period.
- f) The successful bidder shall give and cover the machines(s) under Maintenance Contract for three years after the expiry of comprehensive warranty period of two years without claiming/charging for any additional financial charges from purchaser, in this regard.
- g) The purchaser shall inform the colour code of the machines to be supplied against the above order while issuing the purchase order and bidder has to comply.

4. Address of supplies:

a) The details of addresses where the machines(s) supplied through this tender are as under:

#	Location	Address for supplies
1	NTSC-Okhla,	NSIC- Technical Services Centre, Okhla, Phase III,
	New Delhi	Near Govindpuri Metro Station, New Delhi-110020.

b) The bidder is free to inspect the address(s) in the premises before submitting the bid under this tender.

5. Special Provision for Micro & Small Enterprises:-

Micro and Small Enterprises (MSEs) participating in the tender will be given benefit as per Public Procurement Policy, 2012. Further, the MSEs owned by SC/ST/Women entrepreneurs will also be given benefits as per Public Procurement Policy, 2012. The definition of MSEs owned by SC/ST/Women is as given under:

- (a) In case of proprietary MSE. Proprietor shall be SC/ST/Women
- (b) In case of partnership MSE, the SC/ST/Women partners shall be holding at least 51% shares in the unit



(c) In case of Private Limited Companies, at least 51% share shall be held by SC/ST promoters.

Document to claim benefits shall be enclosed in Technical Bid.

6. Delivery

- a) The purchaser expects to complete delivery of machines by the successful bidder within sixty (60) calendar days from the date of issue of supply order at the designated address(es). However, the bidders have an option to submit the best delivery time while submitting the Technical Bid, but in any case, the delivery should be before 90 days from the date of issue of supply order by purchaser.
- b) The machines/ equipment shall be inspected by the purchaser, on receipt at site and successful bidder shall be responsible for any damage during the transit of machines/ equipment. The Purchaser shall not be responsible for any damage due to any reason during the transportation of machines/equipment to the designated site of the purchaser.
- c) The successful bidder shall not be allowed for part shipments and/or trans-shipments without the permission of purchaser. The insurance cover including insuring the machines/ equipment against the loss or damage incidental to manufacture or acquisition, transportation, storage and delivery/ Installation & Commissioning, shall be obtained by the bidder in his own name and not in the name of purchaser. The purchaser will as soon as possible but within 30 days from the date of arrival of machines/ equipment at destination notify the bidder of any loss or damage to the machines/ equipment.

7. Comprehensive Warranty

- a) The successful bidder shall offer on-site comprehensive warranty of machines for **two years** from the date of successful commissioning of machines at the designated address & shall cover each and every part of the machines including parts having limited life etc. The purchaser is not liable to pay any extra charges on any account during warranty period.
- b) Any part or parts fail or proved defective within the on-site warranty period specified above, owning to defect in design, material or workmanship, the bidder shall have to replace them with original spares only without asking for any charges.
- c) The successful bidder shall have to visit the address at which the machines supplied once in a quarter as a "Preventive maintenance service" to check the working of hardware & software of machines, associate systems, efficiency of operational areas etc., during the warranty period.
- d) During the warranty period, expert(s) shall be deputed at site by the successful bidder within two working days from the date of request from purchaser, to rectify and fix the defects/ malfunctioning of machines, within next three working days, at the location where machines(s) are supplied. The cost of deputation of expert(s) and any other associated expenditure to attend the rectification/ fixing of fault, shall be borne by the bidder.
- e) In case the successful bidder is not able to rectify the fault and / or fails to rectify the fault within the period of three days, the Purchaser has right to demand for demurrages because of loss to purchaser due to "under repair" situation for the machines.

8. Three Years Maintenance Contract

a) The bidder shall cover the machines(s) under Maintenance Contract for three (03) years after the expiry of comprehensive warranty period of two years without any



additional claim of financial charges from purchaser for the said maintenance contract. The commercial bid for the machines(s) shall be quoted accordingly.

b) The bidder shall have to visit the address at which the machines supplied once in a quarter as a "Preventive maintenance service" to check the working of hardware & software of machines, associate systems, efficiency of operational areas etc., during the three years maintenance period. The parts, if any, to be replaced or changed shall be purchased by purchaser.

9. After Sales Services

- a) The successful bidder shall ensure to render after sales services during the comprehensive warranty period (2 years) and in the period of Maintenance Contract (3 years) to the satisfaction of purchaser.
- b) The successful bidder will depute their engineer within two working days to attend the service call received in writing from purchaser during the comprehensive warranty period as well as during the Maintenance Contract Period.

10. Manuals:

The successful bidder to supply three (03) sets of the following manuals in hard format and one (01) soft format along with machines:

- i. Installation Manual
- ii. Operation Manual
- iii. Maintenance Manual
- iv. Training Manual

11. Tender documents:

- a) The tender document can be collected from the office of the Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-20 in between the period from **19.08.2019 to 06.09.2019** (Except Saturday & Sunday) between 10:30 hours to 15:45 hours against payment of Rs. 1000/-+18%GST = Rs.1180/- (Rupees One thousand and One Eighty only) (Non-refundable, inclusive of GST) by way of demand draft, in favour of NSIC Ltd-NTSC A/c payable at New Delhi.
- b) Alternatively tender form can be downloaded from our website www.nsic.co.in from 19.08.2019 to 06.09.2019 In case the tender downloaded for submission of offer, the tender fee of Rs. 1180/- in form of demand draft in favour of NSIC Ltd-NTSC A/c payable at New Delhi, shall be enclosed with Technical Bid of the tender while submitting the tender.

The other option is to pay Rs.1180/- by RTGS/NEFT to the bank of purchaser as detailed under:

ACCOUNT NAME	BANK NAME	BANK A/C NO.	BANK IFSC CODE
NSIC LTD.NTSC A/C	PUNJAB NATIONAL BAI OKHLA, NEW DELHI	K, 0602002100009880	PUNB0060200

The bidder is requested to attach the UTR No. / Bank Statement / RTGS Slip in the Technical Bid, to prove the transfer of payment to the purchaser's Account.



- c) At any time prior to the deadline for submission of bids, the Purchaser may amend the Tender Documents by issuing addendum/ corrigendum which will be placed on website
- d) only. The prospective bidders are advised to visit the Website (www.nsic.co.in) for any update in respect of this tender.

12. Authorization for Submission of Tender:

- a) The original and all copies of the bid shall be signed and stamped, on every page, by a person duly authorized to sign on behalf of the Bidder. The written confirmation of authorization (in form of letter on the bidder's letter head) to sign on behalf of the bidder confirming the signature as a person duly authorized to sign should be attached with the technical bid of the tender.
- b) The person signing the tender document or any other documents on behalf of the Bidder shall be deemed to warrant that he has authority to bind the Bidder. If it subsequently comes to light that the person so signed had no authority to do so, the purchaser may without prejudice to any, consider civil & criminal remedies cancel the tender and hold the Bidder liable for all costs, charges and damages.

13. Earnest Money & Tender Fees:

- a) The EMD shall be submitted in the first envelope super-scribed as "Technical Bid", of prescribed amount by way of Demand Draft drawn in favour of "NSIC Ltd-NTSC A/C", or online banking mode, only for the Machines(s) quoted by the Bidder. No cash towards EMD shall be accepted. The bids without EMD from the Bidders shall be rejected.
- b) In case tender documents downloaded from website, Tender Fee of Rs. 1180/- shall be submitted by way of D.D. drawn in favour of "NSIC Ltd-NTSC A/c" along with the Technical Bid of the tender documents. Tender fee is non-refundable. The option for payment of EMD/Tender fees by RTGS/NEFT is also available and bank details of purchaser, are as under:

ACCOUNT NAME	BANK NAME	BANK A/C NO.	BANK IFSC CODE
NSIC LTD.NTSC A/C	PUNJAB NATIONAL BANK, OKHLA, NEW DELHI	0602002100009880	PUNB0060200

The bidder is requested to attach the UTR No. /Bank Statement / RTGS Slip in the Technical Bid, to prove the transfer of payment to the purchaser's Account.

- c) The exemption for the payment of EMD as well as tender fee will be applicable under Rule 170 & 173 of General Financial Rules (GFR), 2017 for Micro & Small Enterprises (MSEs) as per the "Public Procurement Policy for Micro & Small Enterprises Order 2012". To claim the exemption, self-certified copy of valid certificate/proof of registration for the goods for which this tender floated, must be enclosed with Technical Bid.
- d) The Purchaser shall not be liable for payment of any interest on EMD/Tender fees.
- e) Any request by the bidders to consider their EMD already furnished by them to any of the other office of the purchaser, for any other contract/ tender will not be considered as EMD for this tender.
- f) The EMD will be returned to the unsuccessful bidders within 30 days after the orders are placed on the successful bidder. In case of successful bidder, the EMD will be released along with 20% payment schedule, as per payment terms mentioned at Para 29 of "Instructions to the Bidders".



14. Security Deposit:

- a) The successful bidder shall submit interest free security deposit amount to the value equalling to 10% (ten percent) of the total value of order which includes basic price + GST, within five working days from the date of issue of purchase order by the purchaser for supply by successful bidder.
- b) The security deposit will be returned to the successful bidder along with 20% payment schedule, as per payment terms mentioned at Para 29 of "Instructions to the Bidders".

15. Submission of Bid:

- a) The prospective bidders should examine all instructions, forms, terms and specifications in the tender documents and to furnish with its bid all documents or information as required by bidding/ tender document.
- b) The language for all the correspondence and documents related to this tender shall be in English/ Hindi only. Moreover, the printed literature/technical details for the machines shall also be in English/ Hindi.
- c) The bid must be placed in a properly sealed bigger envelope addressed to The Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase III, New Delhi and the said bigger envelope shall contain two sealed envelopes, each containing, Technical & Commercial bids, respectively. The bigger envelope must be super-scribed "Tender for Supply, Installation and Commissioning of AR/VR Lab Equipment" with tender inquiry number and its due date. The two sealed envelopes inside the bigger envelope must be super-scribed as:

Envelope No-1: The said envelope is for technical bid & shall be super-scribed as "Tender for the Supply, Installation, Commissioning AR/VR Lab Equipment-Technical Bid".

Envelope No-2: The said envelope is for commercial bid & shall be super-scribed as "Tender for the Supply, Installation, Commissioning of AR/VR Lab Equipment-Commercial Bid".

- d) If both or either of the envelopes are not sealed and marked as required, the Purchaser shall not be responsible for the misplacement or premature opening of the bid.
- e) All the columns of the tender document/form shall be duly, properly and exhaustively filled in. Any cutting/over writing etc. in the tender document/form must be signed by the person who is signing the tender/bid.
- f) Tenders received in open covers/ letters/ fax/ email will not be considered.

16. Commercial Bid Submission:

- a) Bidder shall take into account all costs including Packing, Freight, Transportation, Insurance Cost including unloading of machines at the address of the purchaser for giving delivery of machines/ equipment at site as detailed at Para 4 of "Instructions to the Bidder" before quoting the "Price of Lab Equipment before GST" in the Commercial Bid.
- b) The "Price of Lab Equipment before GST" shall remain firm & inclusive of all costs involved for the delivery to the destination(s) including the cost mentioned in Para 16(a) as above, also include the cost of Installation & Commissioning at destination, Training to the local trainers (as detailed at Para 3(c & d) of "Scope of Supplies" of this tender), Cost of services to be provided during Comprehensive Warranty of two years. (Refer Para 3(e) of "Scope of Supplies" of this tender) and cost of services to be provided in the period of Maintenance contract for three years after the expiry of



warranty period of two years (Refer Para 3 (f) of the "Scope of Supplies" of this tender.)

- c) No extra payment or revision of "Price of Machines before GST" shall be accepted on account of any discrepancy in nomenclature of items. The prospective bidders are advised to seek clarification, if any, desired before submitting the bid.
- d) No representation for the revision of the quoted "Price of Machines before GST" shall be considered till the supplies are completed to the designated location(s).

17. Last date of submission of Bid:

- a) The bid should reach the office of the Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase III, New Delhi by 06.09.2019 up to 15:45 hours.
- b) The purchaser may, at its discretion, extend the deadline for the submission of bids by amending the Tender Documents, in which case all rights and obligations of the Purchaser and Bidders previously subject to the deadline shall thereafter be subject to the deadline as extended. The prospective bidders are advised to remain in touch with website for any update in respect of this tender.
- c) The purchaser shall not consider any bid that submitted/received after the deadline i.e. date and time for submission of bids. Any bid received by the Purchaser after the deadline for submission of bids shall not be considered and shall be rejected.

18. Rights of Purchaser:

- a) It may be noted that the Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase III, New Delhi, without assigning any reason whatsoever, reserves the right to cancel the procurement even after calling the offers from bidders but before the issue of supply order to execute the supply by the successful bidder. The reason for cancellation of supply would not be disclosed and the bidder has no right to ask for so.
- b) The Purchaser reserves the right to accept or reject any bid, without assigning any reason, thereof, and to annul the bidding process and reject all bids at any time prior to supply order, without thereby incurring any liability to Bidders. In case of annulment, all bids submitted and specifically Bid document, EMD deposits shall be returned to the Bidders.

19. Opening of Technical Bid:

a) The technical bid of tenders will be opened at office of Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase III, New Delhi on **06.09.2019 up to 16:30 hours.** The Bidder or their authorized representative (One person only) may be present at the time of opening of the Bid.

20. Opening of Commercial Bid:

a) The Commercial Bid of only technically qualified bidders will be opened on the stipulated date. The date & time for opening of Commercial Bid shall be intimated to the technically qualified bidders through email, after the evaluation of Technical Bid.

21. Validity of Tender:

a) The tender shall be valid for a period of 90 days from the date of opening of the Technical Bid of this tender. Terms and financial details submitted in the bid shall be treated as firm during the said period of 90 days.



b) In exceptional circumstances, prior to the expiry of the bid validity period, the Purchaser may request bidders to extend the period of validity of their bids. The request and the responses shall be made in writing.

22. Evaluation of Bids:

- a) If there is discrepancy between the amount quoted in Commercial Bid in the column "Unit Price of Machines before GST" and the amount reflected in column "Total price of Machines(s) before GST" which is the multiplication of quantity offered for supplies with "Unit Price of Machines before GST", the "Unit Price of Machines before GST" shall prevail. Accordingly, the Total price of Machines before GST shall be corrected, unless in the opinion of the Purchaser there is an obvious misplacement of the decimal point in the unit price, in which case the line item total as quoted shall govern and the unit price shall be corrected.
- b) If there is an error in a total corresponding to the addition or subtraction of sub totals, the subtotals shall prevail and the total shall be corrected; and
- c) If there is a discrepancy between words and figures, the amount in words shall prevail, unless the amount expressed in words is related to an arithmetic error, in which case the amount in figures shall prevail subject to (a) and (b) above.
- d) To assist in the examination, evaluation, comparison of the bids and qualification of the Bidders, the Purchaser may, at its discretion, ask any Bidder for a clarification of its Bid. Any clarification submitted by a Bidder in respect to its Bid and that is not in response to a request by the Purchaser shall not be considered. The Purchaser's request for clarification and the response shall be in writing only.
- e) If the Bidder does not provide clarifications of its bid by the date and time set in the Purchaser's request for clarification, its bid shall be rejected.
- f) The Purchaser shall compare the "Unit Price of Machines before GST" of all the responsive bids to determine the lowest bid for a particular address.
- g) The bidder shall note that they are not supposed to put any GST amount in the Commercial Bid. However, after the supplies, they have to issue the GST invoice indicating the Price of machines as quoted in the Commercial Offer and thereafter specify the GST as applicable at the time of delivery. The Purchaser shall pay total amount which includes the unit price of machines as well as the GST as applicable at the time of delivery.
- h) The Purchaser is authorized to ask the evidence from bidder to counter-check that the GST as claimed by the bidder at the time of issue of invoice after the supply of machines.

23. Earnest Money Forfeit:

- a) If any Bidder withdraws his bid/tender before the period of 90 days from the date opening of technical bid or makes any modifications in the terms and the conditions of the tender which are not acceptable to the purchaser, then the purchaser shall, without prejudice to any other rights or remedy, be at liberty to forfeit the EMD.
- b) The EMD will also be forfeited in following cases:
 - i. If the successful bidder fails to accept, the supply order issued, based on his/her offer (bid) within the prescribed time.
 - ii. If the successful bidder fails to supply the Machines with specifications as mentioned in Annexure –A



- iii. If the successful bidder delays supplies/ machines/ equipment beyond a reasonable time resulting in disruption of project.
- iv. Successful Bidder for any reason whatsoever withdraws the tender after it is accepted or become unable or fails to execute the supply orders within stipulated delivery period.
- v. Submission of misleading/contradictory/false statement or information and fabricated/invalid documents is detected before or after the issue of order to execute the supplies.
- vi. The successful bidder does not submit Indemnity Bond within the prescribed time.
- vii. The successful bidder does not submit the security deposit within the time.

24. Security Deposit Forfeit:

The security deposit will also be forfeited in following cases:

- i. If the bidder fails to accept, the supply order issued, based on his/her offer (bid) within the prescribed time.
- ii. If the bidder fails to supply the Machines with specifications as mentioned in Annexure –A
- iii. If the bidder delays supplies/ machines/ equipment beyond a reasonable time resulting in disruption of project.
- iv. Successful Bidder for any reason whatsoever withdraws the tender after it is accepted or become unable or fails to execute the supply orders within stipulated delivery period.
- v. Submission of misleading/contradictory/false statement or information and fabricated/invalid documents is detected before or after the issue of order to execute the supplies.

25. Notification of Award:

Prior to the expiry of the period of bid validity, the purchaser shall notify the successful Bidder, in writing, that its Bid has been accepted. The notification letter shall specify the sum that the Purchaser will pay to the bidder in consideration of the supply of Machines with the details of selected location(s)/ address(es).

26. Pre-dispatch Inspection:

- a) A pre-dispatch inspection by 3rd party/ technical team of purchaser may be carried out at bidder's site of manufacturing machines. This pre-dispatch inspection will not absolve bidder's responsibility to execute supply in accordance with the tender terms.
- b) In case during inspection by the inspection team of purchaser find some areas needs to be attended by bidder and/or test reports asked, the successful bidder has to complete the findings of inspection team within 10 days & confirm in writing to purchaser. If need be the re-inspection would be carried out at the cost & expenses of the successful bidder.

27. Packing:

a) The successful bidder shall provide packing of the machines/ equipment, as is required to prevent their damages or deterioration during the transit to their final destination. The packing shall be sufficient to withstand, without limitation, rough handling during transit. In case the consignment of machines/ equipment received with damaged packaging, the purchaser shall not accept the delivery of the same.



- b) The machines & equipment shall be securely boxed, crated and protected from mechanical damage, moisture etc. suitable for both storage and transit according to
- c) the nature of the material and mode of transport. The bidder shall be responsible for any loss/ damage to material during transportation to the designated address.

28. Delivery Time:

- a) The bidder shall indicate the period within which the ordered quantity will be supplied. The bidder shall note that in case bidder fails to supply within the period of delivery indicated by the bidder in technical bid of this tender, penalty @2% of value of the order per week of delay would be levied subject to maximum 4 weeks. It means, the bidder shall have the liability of delayed supply to the maximum of 4 weeks after expiry of scheduled delivery date. After that the supply order shall be cancelled and EMD and Security Deposit will be forfeited and bidder will be debarred from participation in any future tenders. Also purchaser reserves the right to ask for demurrages even after adjustment of EMD & security deposit from the bidder because of delay in supplies, as agreed.
- b) The successful Bidder shall, within a week from the date of receipt of communication of acceptance of quotes from purchaser shall intimate his acceptance of the order. The successful bidder shall complete supplies strictly as per the accepted delivery period.
- c) The post-delivery activities i.e. Installation, Commissioning, Training to Trainers etc. shall be started within 7 days from the date of receipt of machines at site by the purchaser.

29. Payment:

- a) The 70% payment of total bill will be made by the purchaser by crossed account payee cheque/ RTGS/ NEFT for which the bidder shall send bills in duplicate (original + copy) after Supply, Installation & Commissioning of machines, giving the reference number of the supply /purchase order along with copies of delivery note & satisfactory report on the Installation of machines(s), from designated purchaser department. The details about the designated purchaser department who is authorized to take the delivery of machines(s) shall be informed to the successful bidder through the supply order placed for the supply of machines(s).
- b) The 20% payment of total bill along with interest free EMD and Security Deposit will be released to successful bidder after one month from the date of completion of training to trainers at site and on submission of Indemnity Bond by the successful bidder for rendering services during warranty period and maintenance period.
- c) The remaining 10% payment will be retained and shall be released against submission of Performance Bank Guarantee, issued by Nationalised Bank, by the successful bidder of equal value of 10% with validity of five years from the date of commissioning and completion of training of trainers, whichever is later.

30. Causes of Rejection of Bid:

- a) While submitting the Bid, if any of the prescribed conditions are not fulfilled or are incomplete in any form, the Bid shall be rejected.
- b) If any Bidder stipulates any condition of his own, such conditional Bid shall be liable to be rejected.

31. Claims:

a) If the machines/ equipment supplied are found to be of size and shape different than those in the accepted offer and are of specifications lower than those stipulated in the accepted offer, the purchaser shall have right to totally reject the machines/



equipment and/or to claim for compensation from successful bidder. The successful bidder shall pay to purchaser, the claim demanded in writing within 15 (fifteen) days of its demand. The bidder shall also compensate for losses, if any, sustained by

- b) purchaser due to lower specification/defective packing and/or wrong marking of the machines/ equipment, etc.
- c) The successful bidder shall be responsible for arranging the rejected machines/ equipment to be removed at his cost from purchaser premises.

32. Address for communication:

All the communication with respect to the tender shall be addressed to:

Centre-Head, NSIC-Technical Services Centre, Okhla Industrial Estate, Phase III, New Delhi-20. Ph: 011-26826801, 26826847;Fax: - 011-26826783

Email: ntscok@nsic.co.in Website: www.nsic.co.in

33. Force Majeure:

In the event of any unforeseen circumstances directly interfering with the supply of machines/equipments/work/service arising during the execution of order such as war, hostilities, acts of the public enemy, civil commotion, sabotage, fires, floods, earthquakes, explosions, epidemics, quarantine restrictions, strikes, lockouts, or acts of God, the successful Bidder shall, within 7 working days, from the commencement thereof, notify the same in writing to the Purchaser with reasonable evidence thereof. Either party shall have the option to terminate the contract on expiry of 90 days of commencement of such force majeure by giving 14 days "notice to the other party in writing. In case of such termination, no damages shall be claimed by either party against the other.

34. Code of Ethics:

The Purchaser as well as the Bidder shall observe the highest standard of ethics including laws against fraud and corruption in force in India namely "Prevention of Corruption Act 1988", during the procurement or execution of such contracts. If the bidders are found in Bid pooling, cartelisation or against law on fraud and corruption then their firms may be blacklisted.

35. Jurisdiction:

In the event of any dispute the legal matter shall be subjected to the jurisdiction of the court at Delhi.

We confirm with our acceptance to the instructions (S. No. 1 to 35 above) as given above.

BIDDER'S NAME & SIGNATURE WITH SEAL

The duly signed pages of "Instructions to the Bidders" as above shall be attached with technical bid of the tender as a mark of acceptance of bidder and any bid/ tender not confirming the instructions as above, is liable to be rejected.



ANNEXURE-A

Details of requirements and technical specifications of Devices

Name of the Machines: AR/VR Training Lab Equipment

S.No.	Machines Name	Technical Specification	Quantity (in Nos.)
1	VR Optical Glasses	VR Optical Glasses with integrated touch pad Field of view-101°, USB Type-C, Micro USB port module for VR, Micro USB, Sensors- Gyro sensor / Proximity sensor, Compatibility, 5/6" Mobile - Note9*, S9, S9+, Note8, S8, S8+, S7, S7 edge, Note5, S6 edge+, S6, S6 edge, A8 Star, A8, A8+	4
2	VR Headset PC Version	VR Headset PC Version with Precision Eye Tracking (Multiplayer Support) & Pro Machines Hi-Res Audio Certification, Powerful Digital Amplifier, Dual Microphones - Active Noise Cancellation, Ambient Mode and Conversation Mode, 2880 x 1600-615 PPI, 37%-PPI Increase, 78%-Pixel Increase, 7M x 7M room scale for multiple users, Sub-Millimetre Precise Tracking, Large-Scale Tracked Area, Ideal for Multi-user VR	2
3	VR System	VR Headset PC Version with Controllers & Base Station (For Sigle Player) Headset Specifications: Screen: Dual AMOLED 3.6" diagonal, Resolution: 1080 x 1200 pixels per eye (2160 x 1200 pixels combined), Refresh rate: 90 Hz, Field of view: 110 degrees Safety features: Chaperone play area boundaries and front-facing camera Sensors: SteamVR Tracking, G-sensor, gyroscope, proximity Connections: HDMI, USB 2.0, stereo 3.5 mm headphone jack, Power, Bluetooth Input: Integrated microphone Eye Relief: Interpupillary distance and lens distance adjustment Controller specs Sensors: SteamVR Tracking Input: Multifunction trackpad, Grip buttons, dual-stage trigger, System button, Menu button Use per charge: Approx. 6 hours Connections: Micro-USB charging port upto 3.5M X 3.5M ROOM-SCALE STAGE	2
4	Tripod Stand	Tripod Stand For VR Headset - Folded height: 3.18 feet Maximum height: 8.53 feet Net weight per light stand:1.4 Kg (3 Lbs) Max. load capacity: 6.8 Kg (15 lbs) Spigot: 1/4 (with adapter to convert to 3/8) Min. Tube Diam: 25.7mm Max. Tube Diam: 31.5mm	4



5	Speakers	Digital Dolby Sound	5
	(4.1 with	Digital Bolby Southa	
	Bluetooth)		
6	Standalone VR	Standalone VR Headset with Controller	3
	Head Set	Standalone VR - (Android/ IOS Apps Support),	
	Ticaa Scc	32GB HDD, Product Dimensions: 21.1 x 21.1 x	
		12.2 cm, Weight: 354 g	
7	VR Headset	VR Headset With Controller & Sensor	3
,	with	Type: Virtual reality headset, Display PenTile[2]	
	Controller &	OLED 2160x1200 (1080x1200 per eye) @ 90 Hz	
	Sensor	Sound: Integrated 3D audio headphones (user	
	3011301	removable / exchangeable)	
		Input: 6DOF (3-axis rotational tracking + 3-axis	
		positional tracking) through USB-connected IR	
		LED sensor, which tracks via the "constellation"	
		method	
		Controller input: Xbox One game controller,	
		Oculus Touch motion tracked controllers,	
		Connectivity: HDMI 1.3, USB 3.0, USB 2.0,	
		Mass 470 g (1.04 lb)	
8	AR Optical	AR Optical Headset - Mobile Based	3
	Headset	Ultra-Wide - 90° Field of View, Time warped 6DoF	
		2560x1440 pixels (1280x1440 each eye),	
		Android & IOS Mobile Support	
		Bluetooth Controller	
9	MR Head Set	MR Headset	2
		Optics – See-through lenses (waveguides),	
		Resolution – 2k 3:2 light engines, Holographic	
		Density - >2.5k radians (light points per radian),	
		Eye-based Rendering - Display optimization for	
		3D eye position	
		Sensors & Audio: Depth – Azure Kinect sensor,	
		IMU Accelerometer, Gyroscope, Magnetometer,	
		Camera – 8MP stills, 1080p30 video Microphone	
		Array – 5 channels, Speakers – Built-in, Spatial	
		Audio	
		Human Understanding: Hand Tracking – Two-	
		handed fully articulated model, direct	
		manipulation, Eye Tracking – Real-time tracking,	
		Voice – Command and control on-machines,	
		Natural Language with internet connectivity	
		Environmental Understanding: 6DoF Tracking	
		- World-scale positional tracking, Spatial Mapping	
		- Real-time environment mesh, Mixed Reality	
		Capture – Mixed hologram and physical	
		environment photos and videos	
		Compute & Connectivity: SoC: Qualcomm Snapdragon 850 Compute Platform, HPU: 2nd	
		Generation Custom-built Holographic Processing	
		Unit, WiFi: 802.11ac 2×2, Bluetooth: 5.0,	
		USB: USB Type-C	
		Power: Battery Life – 2-3 hours of active use,	
		Charging – USB Power Delivery – Fast Charging,	
		Thermals – Passively Cooled	
10	Magic Leap	Standalone VR/MR Machines with	2
	ag.a Laap	Controller CPU: NVIDIA®	_
	I	010111011	I



		Parker SOC; 2 Denver 2.0 64-bit cores + 4 ARM Cortex A57 64-bit cores (2 A57's and 1 Denver accessible to applications), GPU: NVIDIA Pascal™, 256 CUDA cores; Graphic APIs: OpenGL 4.5, Vulkan, OpenGL ES 3.3+, RAM: 8 GB, Storage Capacity: 128 GB (actual available storage capacity 95GB) Power: Built-in rechargeable lithium-ion battery up to 3 hours continuous use. Battery life can vary based on use cases. Power level will be sustained when connected to an AC outlet: 45-watt USB-C Power Delivery (PD) charger Connectivity: Bluetooth 4.2, Wi-Fi: 802.11ac/b/g/n, USB-C	
11	Mobile Devices	Android OS, OS Version - 8.0 or above, Internal Memory 64GB or above, RAM - 4GB or above, Octa-core Processor, Camera 8MP or above, Autofocus, Flash, Screen Size - 5"or above and shipped with Google Playstore	3
12	Tablet (Full-HD)	Android OS, OS Version - 8.0 or above, Internal Memory 32GB or above, RAM - 2GB or above, Processor - 1.8 GHz or above, Camera 8MP or above, Autofocus, Flash, Screen Size - 8"or above	2
13	TV (49" LED)	49" LED Ultra HD 4K	2
14	Adjustable VR Head set	Optical VR Glasses with Headphone (For any Mobile) 42MM PMMA Lenses, FOV of 120 Degrees, Item Weight: 435 g, Product Dimensions: 21.5 x 19 x 11.5 cm	5
15	Mixed Reality Room Setup	Setup of room(500 SFT) for the training of 20 Trainees on MR.	1
16	Motion Detection/ Capturing Devices	Motion Detection/ Capturing Devices Language(s) English, Spanish, Batteries Required, Colour Multi Item Weight: 1.26 Kg, Product Dimensions: 31.8 x 38.9 x 14 cm, Compatible with other 3D Application	1
17	Motion Detection & Capturing Sensor Devices	Motion Detection & Capturing Sensor Devices- Camera: Resolution 640×480 @30 fps 24-bit, Resolution 1280×960 @15 fps, Working range: 1.2 and 3.5 meters, Microphone: Four channels processes sound at in 16-bit audio at a rate of 16KHz	1
18	Play station	Play station Console CPU: 32/64-bit RISC (33.9MHz), 500 GB HDD, RAM: 4 GB, 2GB Video RAM, CPU - 2.13 GHz, Graphics: 3D Geometry Engine, with 2D rotation, scaling, transparency and fading and 3D texture mapping and shading, Colours: 16.7 million, Sprites: 4,000, Polygons: 360,000 per second, Resolution: 640x480, Sound: 16-bit 24	1



	T .		1
19	AR/MR Spectacles	AR/MR Spectacles OMAP 4430 System on a chip, Processor: dual- core, RAM: 2 GB, Storage: 16 GB flash memory total (12 GB of usable memory), Display Prism projector, 640×360 pixels (equivalent of a 25 in/64 cm screen from 8 ft/2.4 m away), Sound Bone conduction transducer Input Voice command through microphone, accelerometer, gyroscope, magnetometer, ambient light sensor, proximity sensor Controller input Touchpad, MyGlass phone mobile app, Camera 5 Megapixel photos; 720p video, Connectivity: Wi-Fi 802.11b/g, Bluetooth, micro-USB, Power: 570mAh Internal lithium-ion battery	1
20	AR Smart Glasses	AR Smart Glasses - Optics and Electronics CPU: Quad Core ARM, camera: 8-Megapixel; supports 720p@30fps or 1080p@24fps, Android OS, Micro-USB, Ear-phone jack, Full BT functionality, Noise cancelling microphone, Touch pad with gesture, Head motion trackers, Haptic vibration alert	1
21	Adobe Creative Cloud (1 Year Subscription)	2D Images Editing & Manipulation Tool for Designing	5 Licenses
22	Autodesk Maya 2018	3D Software - Should be capable to develop the High-end 3D Graphics for VR/AR Applications	5
23	Computer System	Processer: i7, Hard disk: 1TB, RAM: 8 GB, Graphic Card: 8 GB (RTX2080), AMP: 8 GB;DDR6, SSD: 250 GB, OS-Windows 10.	15
24	Mac Computers	Processer: i7, Hard disk: 1TB, RAM: 16 GB, SSD: 250 GB.	5
25	MAC Pro	Processor: 2.6GHz; 6-core Intel Core i7; Turbo Boost up to 4.3GHz; with 9MB shared L3 cache, Configurable to 2.9GHz; 6-core Intel Core i9; Turbo Boost up to 4.8GHz; with 12MB shared L3 cache Storage: 256GB SSD; Configurable to 512GB, 1TB, 2TB, or 4TB 512GB SSD; Configurable to 1TB, 2TB, or 4TB SSD Memory: 16GB of 2400MHz DDR4 onboard memory Configurable to 32GB of memory, Graphics: 2.2GHz Radeon Pro 555X with 4GB of GDDR5 memory and automatic graphics switching.	1



26	іМас	Display: Retina; 5K display; 27-inch (diagonal); Processor: 3.8GHz; quad-core; Intel Core i5 (Turbo Boost up to 4.2GHz) Configurable to 4.2GHz quad-core Intel Core i7 (Turbo Boost up to 4.5GHz); Storage: 2TB Fusion Drive, Graphics: Radeon Pro 580 with 8GB of VRAM Configurable to 3TB Fusion Drive or 512GB, 1TB, or 2TB SSD, Resolution: 5120x2880 with support for one billion colors; 500 nits brightness; Wide color (P3) Memory: 8GB (two 4GB) of 2400MHz DDR4; four SO-DIMM slots, user accessible Configurable to 16GB, 32GB, or 64GB	1
27	Experience ZONE for AR, VR & MR	Setup of experience room(500 SFT) for the training of 20 Trainees.	1
28	Content Development Lab (Smart Board, Projector)	Smart Board (5 feet X 7 feet), Digital Projector(HD, 1920X1080 resolution)	1

Note:

- (i) All accessories and consumables which shall be required to run the machines / equipment smoothly have to be supplied along with the Devices/ equipment.
- (ii)All equipment shall be delivered with information book- let containing detailed specifications.
- (iii) All Devices should match the international standards of the OEMs such as Microsoft/Apple/Samsung/HTC VIVE/Oculus etc.,



ANNEXURE -B

(Undertaking from Bidder on their official stationery)

To,The Centre-Head, NSIC-Technical Services Centre,

Okhla Industrial Estate, Phase-III, New Delhi-110020.

Sir,

Subject: Undertaking for the participation in the tender No. NTSC/COMPTRG/AR-VR/2018/44 due for opening of technical bid 06.09.2019.

Dear Sir,

HAVING EXAMINED AND PERUSED THE FOLLOWING DOCUMENTS

- 1. Notice Inviting Tender
- 2. Instructions to The Bidders
- 3. Technical Specifications of Devices (Annexure-A)
- 4. Annexure C (Technical Bid)
- 5. Annexure D (Commercial Bid)

I/Wedo hereby submit the above Bid in prescribed formats duly completed in all respects in accordance with the conditions applicable. If this tender is accepted, I/We undertake to abide by and fulfil all the terms and conditions in the tender documents

I/We hereby distinctly and expressly declare and acknowledge and undertake that before the submission of this Bid, I/We have carefully read and followed the instructions and I/We have understood the existing system of supply at the address(es) of purchaser including the scope and nature of duties expected from the Bidder.

I/We distinctly undertake that I/We would hereafter make no claim or demand upon the purchaser based upon or arising out of any alleged misunderstanding or misconceptions or mistake on my/our part of the said stipulations, restrictions and conditions.

I/ We undertake & declare that our unit has never made any default in supplying the Devices/ equipment to Government / Semi Government/ Central or State Public sector enterprise(s) for any reasons in the last five years.

Any notice required to be served on me/us shall be sufficiently served on me/us through email or post (registered or ordinary) or courier or left at my/our address furnished herein.
I/We fully understand the terms and conditions in the tender documents. I/We understood that the purchaser is not bound to accept any proposal that it may receive without assigning any reason.

Dated this......day of......2019

Authorized Signatory

Seal:



ANNEXURE-C

FORMAT & REQUIREMENTS FOR SUBMITTING TECHNICAL BID

Ι.	Tender Ret. No:
2.	Name of Bidder:
3.	Complete office address/contact numbers/Email ID/Mobile Number of Bidder:
4.	Tender fee payment details (if tender document downloaded from website) Details of DD/ RTGS/ NEFT by which tender fee paid

5. Confirmation of acceptance of Technical Specifications for the supply of machine:

#	Devices Name	Technical Specifications	Acceptance to the specification as placed at Annexure-A and agreed to supply with required Quantity (write YES/NO only)	If marked "NO" in the column before, specify the deviation in specificatio n of the Devices offered for the supply.
1	VR Optical Glasses	VR Optical Glasses - with integrated touch pad, Field of view-101°, USB Type-C, Micro USB port module for VR, Micro-USB, Sensors- Gyro sensor/ Proximity sensor, Compatibility, 5/6" Mobile: Note9*, S9, S9+, Note8, S8, S8+, S7, S7 edge, Note5, S6 edge+, S6, S6 edge, A8 Star, A8, A8+		
2	VR Headset PC Version	VR Headset PC Version with precision Eye Tracking, Multiplayer Support & Pro Machines Hi-Res Audio Certification, Powerful Digital Amplifier, Dual Microphones - Active Noise Cancellation, Ambient Mode and Conversation Mode, 2880 x 1600 615 PPI, 37%-PPI Increase 78%-Pixel Increase, 7M x 7M room scale for multiple users, Sub-Millimetre Precise Tracking Large-Scale Tracked Area Ideal for Multi-user VR		
3	VR System	VR Headset PC Version with Controllers & Base Station (Single Player) Headset Specs Page 22 of 33		



4	Tripod Stand	Screen: Dual AMOLED 3.6" diagonal, Resolution: 1080 x 1200 pixels per eye (2160 x 1200 pixels combined), Refresh rate: 90 Hz, Field of view: 110 degrees, Safety features: Chaperone play area boundaries and front-facing camera, Sensors: SteamVR Tracking, G-sensor, gyroscope, proximity Connections: HDMI, USB 2.0, stereo 3.5 mm headphone jack, Power, Bluetooth, Input: Integrated microphone Eye Relief: Interpupillary distance and lens distance adjustment, Controller specs Sensors: SteamVR Tracking Input: Multifunction trackpad, Grip buttons, dual-stage trigger, System button, Menu button Use per charge: Approx. 6 hours Connections: Micro-USB, charging port UP TO 3.5M X 3.5M ROOM-SCALE STAGE Tripod Stand For VR Headset Folded height: 3.18 feet, Maximum height: 8.53 feet, Net weight per light stand: 1,4 Kg(3 Lbs), Max. load	
		capacity: 6.8Kg (15 lbs), Spigot: 1/4 (with adapter to convert to 3/8), Min. Tube Diam: 25.7mm, Max. Tube Diam: 31.5mm	
5	Speakers (4.1 with Bluetooth)	Digital Dolby Sound	
6	Standalone VR Head Set	Standalone VR Headset with Controller - Standalone VR (Android/ IOS Apps Support), 32GB HDD, Product Dimensions: 21.1 x 21.1 x 12.2 cm Weight-354 g	
7	VR Headset with Controller & Sensor	VR Headset With Controller & Sensor Type Virtual reality headset Display: PenTile[2] OLED 2160x1200 (1080x1200 per eye) @90 Hz, Sound: Integrated 3D audio headphones (user removable/exchangeable), Input 6DOF (3-axis rotational tracking + 3-axis positional tracking), through USB-connected IR LED sensor, which tracks via the "constellation" method, Controller input: Xbox One game controller, Oculus Touch	



	Τ		T	
		motion tracked controllers,		
		Connectivity HDMI 1.3, USB 3.0, USB		
		2.0		
		Mass 470 g (1.04 lb)		
8	AR Optical	AR Optical Headset Mobile Based		
	Headset	Ultra-Wide -90° Field of View.		
		Time-warped 6DoF, 2560x1440		
		pixels (1280x1440 each eye) Android		
		& IOS Mobile Support		
		Bluetooth Controller		
9	MR Head Set	MR Headset		
	The fiedd Sec	Optics – See-through lenses		
		(waveguides), Resolution: 2k 3:2		
		light engines, Holographic Density:		
		>2.5k radiant (light points per		
		radian), Eye-based Rendering;		
		Display optimization for 3D eye		
		1		
		position, Sensors & Audio: Depth –		
		Azarlarameter, Cyroscopa		
		Accelerometer, Gyroscope,		
		Magnetometer		
		Camera: 8MP stills, 1080p @30fps		
		video, Microphone Array - 5		
		channels, Speakers: Built-in, Spatial		
		Audio, Human Understanding: Hand		
		Tracking – Two-handed fully		
		articulated model, direct		
		manipulation		
		Eye Tracking – Realtime tracking		
		Voice – Command and control on-		
		machines, Natural Language with		
		internet connectivity,		
		Environmental Understanding:		
		6DoF Tracking – World-scale		
		positional tracking, Spatial Mapping -		
		Realtime environment mesh		
		Mixed Reality Capture – Mixed		
		hologram and physical environment		
		photos and videos		
		Compute & Connectivity: SoC:		
		Qualcomm Snapdragon 850,		
		Compute Platform: HPU- 2nd		
		Generation Custom-built Holographic		
		Processing Unit, Wi-Fi: 802.11ac		
		2×2, Bluetooth: 5.0, USB: USB		
		Type-C, Power:		
		Battery Life – 2-3 hours of active		
		use, Charging – USB Power Delivery		
		- Fast Charging, Thermals –		
		Passively Cooled		
		1 . 455.76.7 666.64	l	



10	Magic Leap	Standalone VR/MR Devices with Controller CPU: NVIDIA® Parker SOC; 2 Denver 2.0 64-bit cores + 4 ARM Cortex A57 64-bit cores (2 A57's and 1 Denver accessible to applications) GPU: NVIDIA Pascal™, 256 CUDA cores; Graphic APIs: OpenGL 4.5, Vulkan, OpenGL ES 3.3+ RAM: 8 GB, Storage: 128 GB (actual available storage capacity 95GB) Power: Built-in rechargeable lithiumion battery Up to 3 hours continuous use. Battery life can vary based on use cases. Power level will be sustained when connected to an AC outlet. 45-watt USB-C Power Delivery (PD) charger, Connectivity: Bluetooth 4.2, WiFi 802.11ac/b/g/n, USB-C	
11	Mobile Devices	Android OS, OS Version - 8.0 or above, Internal Memory 64GB or above, RAM - 4GB or above, Octa- core Processor, Camera 8MP or above, Autofocus, Flash, Screen Size - 5"or above and shipped with Google Playstore	
12	Tablet	Android OS, OS Version - 8.0 or above, Internal Memory 32GB or above, RAM - 2GB or above, Processor - 1.8 GHz or above, Camera 8MP or above, Autofocus, Flash, Screen Size - 8"or above	
13	TV (49"LED)	LED 49" Ultra HD 4K	
14	Adjustable VR Head set	Optical VR Glasses with Headphone (For any Mobile) 42MM PMMA Lenses, FOV of 120 Degrees, Item Weight 435 g, Product Dimensions 21.5 x 19 x 11.5 cm Item model number OC04	
15	Mixed Reality Room Setup	Setup of room(500 SFT) for the training of 20 Trainees on MR.	
16	Motion Detection/ Capturing Devices	Motion Detection/ Capturing Devices Language(s) English, Spanish. Batteries Required, Color Multi Item Weight 1.26 Kg, Product Dimensions: 31.8 x 38.9 x 14 cm Compatible with other 3D Application	



17	Motion Detection & Capturing Sensor Devices	Motion Detection & Capturing Sensor Devices- Camera: Resolution 640×480 @30 fps 24-bit, Resolution 1280×960 @15 fps; Working range: 1.2 and 3.5 meters, Microphone: Four channels processes sound at in 16-bit audio at a rate of 16 KHz.	
18	Play Station	PlayStation Console CPU: 32/64-bit RISC (33.9MHz), 500 GB HDD, RAM: 4 GB, 2GB Video RAM, CPU: 2.13 GHz Graphics: 3D Geometry Engine, with 2D rotation, scaling, transparency and fading and 3D texture mapping and shading. Colors: 16.7 million, Sprites: 4,000, Polygons: 360,000 per second, Resolution: 640x480. Sound: 16-bit 24 channel PCM.	
19	AR/MR Spectacles	AR/MR Spectacles OMAP 4430 System on a chip, dual- core processor, 2 GB RAM Storage 16 GB flash memory total (12 GB of usable memory) Display Prism projector,640×360 pixels (equivalent of a 25 in/64 cm screen from 8 ft/2.4m away) Sound Bone conduction transducer, Input Voice command through microphone, accelerometer, gyroscope, magnetometer, ambient light sensor, proximity sensor Controller input Touchpad, MyGlass phone mobile app Camera 5 Megapixel photos 720p video, Connectivity Wi-Fi 802.11b/g, Bluetooth, micro USB, Power 570mAh Internal lithium-ion battery	
20	AR Smart Glasses	AR Smart Glasses Optics and Electronics - Quad Core ARM CPU, 8 Megapixel camera, supports 720p@30fps/ 1080p@24fps, Android OS, Micro USB ear-phone jack, Full BT functionality, Noise cancelling microphone, Touch pad with gesture, Head motion trackers Hectic vibration alert	
21	Adobe Creative Cloud (1 Year Subscription)	2D Images Editing & Manipulation Tool for Designing	



22	Autodesk Maya 2018	3D Software - Should be capable to develop the High-end 3D Graphics for VR/AR Applications	
23	Computer System (15 nos.)	Processer: i7, Hard disk: 1TB, RAM: 8 GB, Graphic Card: 8 GB (RTX2080), AMP: 8 GB;DDR6, SSD: 250 GB, OS-Windows 10.	
24	Mac Computers (5 nos.)	Processer: i7, Hard disk: 1TB, RAM: 16 GB, SSD: 250 GB.	
25	MAC Pro	Processor: 2.6GHz; 6-core Intel Core i7; Turbo Boost up to 4.3GHz; with 9MB shared L3 cache, Configurable to 2.9GHz; 6-core Intel Core i9; Turbo Boost up to 4.8GHz; with 12MB shared L3 cache, Storage: 256GB SSD; Configurable to 512GB, 1TB, 2TB, or 4TB / 512GB SSD; Configurable to 1TB, 2TB, or 4TB, SSD Memory: 16GB of 2400MHz DDR4 onboard memory Configurable to 32GB of memory, Graphics: 2.2GHz Radeon Pro 555X with 4GB of GDDR5 memory and automatic graphics switching.	
26	iMac	Display: Retina; 5K display; 27-inch (diagonal); Processor: 3.8GHz; quad-core; Intel Core i5 (Turbo Boost up to 4.2GHz) Configurable to 4.2GHz quad-core Intel Core i7 (Turbo Boost up to 4.5GHz); Storage: 2TB Fusion Drive, Graphics: Radeon Pro 580 with 8GB of VRAM Configurable to 3TB Fusion Drive or 512GB, 1TB, or 2TB SSD, Resolution: 5120x2880 with support for one billion colors; 500 nits brightness; Wide color (P3) Memory: 8GB (two 4GB) of 2400MHz DDR4; four SO-DIMM slots, user accessible Configurable to 16GB, 32GB, or 64GB	
27	Experience ZONE for AR, VR & MR	Setup of experience room (500 SFT) for the training of 20 Trainees	
28	Content Development Lab- (Smart Board, Projector)	Smart Board (5 feet X 7 feet), Digital Projector(HD, 1920X1080 resolution)	



The above list of standard accessories are tentative and the bidder shall have authority to supply additional accessories as they deemed fit for the successful operation of the machine/ equipment after the supply at designated site.

		tion for supply to the address:	Adduses
#	# Deta	IIS	Address
			Centre-Head, NSIC-Technical Services
			Centre, Okhla Industrial Estate, Phase-III, New Delhi-20.
			New Deitii-20.
1	Tent	ative quantity required	Ref. Annexure-A
2		ent to supply: (write YES/ NO	
	only)	
ех	cemption	n certificate <i>, as per Para 13</i> NEFT by	<pre>if the bidder is holding valid registration/ (c) of Instruction to Bidders): Details of which EMD paid</pre>
			kh Fifty thousand Only) for NSIC Ltd-NTSC A/C
8. P /	AN of bi	idder (self-attested copy to be end	closed)
9 6	STIN I	registration number of hid	der (self-attested copy to be enclosed)
J. G.			dei (sen detested copy to be enclosed)
ex fro	om the o	to complete delivery of machines date of issue of supply order. Howe	ly order from purchaser: (The purchaser is by the bidder within sixty (60) calendar days ever, the bidder has an option to submit the very should be before 90 days from the date of
is:	sue of	supply order by purchaser. De	livery to be completed <i>in</i> number of days(Calendar Days in words)
			s from where the bidder planned to offer y & after warranty Maintenance period :
#	<i>‡</i>		Address
			NSIC-Technical Services Centre, Okhla Industrial Estate, Phase-III, New Delhi-20.
		f address of bidder for rendering les Services'	
th sh <i>Th</i>	ne bidde nall be ne forma nn furnis a. b.	er supplied similar machines in operations to the satisfaction at for submission of details for at I h details of even more than three Address of Purchaser with contact Details of order for supply placed	ct details (email and phone no.): I to bidder:
	c.	Description and quantity of order	red equipment:

e. Date of completion of delivery:

d. Value of order in rupees:



(The purchaser shall have liberty to contact any or all of purchaser to assess the performance of machines supplied by bidder)

13. Documents - Details to be enclosed with the Technical bid by bidder are as under:

- a) In case the bidder is Original Equipment Manufacturer, the bidder to submit a self-declaration on their letter-head, confirming that they are regular in manufacturing & supplying the similar machines, as asked in this tender, for the last Ten (10) years.
- b) In case the bidder is Authorized Distributor of OEM / Authorized Dealer of OEM, the bidder to attach self-certified valid authorized Distributorship / Dealership license from Original Equipment Manufacturer and shall be engaged in regular manufacturing and supply of similar machines for the last ten (10) years & engaged with the present OEM for the last three years for which this tender is participating.
- c) The Original Equipment Manufacturer shall attach the self-certified copy of valid ISO Certificate for their establishment.
- d) In case the bidder is Authorized Distributor of OEM / Authorized Dealer of OEM, the bidder to attach the self-certified copy of valid ISO Certificate of their OEM.
- e) To avail benefit of Public Procurement Policy by SC/ST Micro & Small Enterprises, the requirement of documents to substantiate their claim (As per Para 5 of this tender) shall be submitted with Technical Bid.
- f) Undertaking as per annexure-B on official stationery.
- g) Duly signed all pages of "Instructions to Bidders" of the tender document as a mark of acceptance.
- h) The letters substantiating performance from at least three (03) other purchasers, to whom, the similar machines supplied by the bidder in last five (05) years, wherein, the machines shall be in operation to the satisfaction of buyer for the last three (03) years, to access performance of the machines supplied by your organization.
- i) Technical Literature of machines(s) with particular reference to the model of machines proposed to supply against this tender along with reference of website to assess the further features.
- j) Authorization letter in favour of their representative to sign the tender on behalf of bidder.
- k) Self-certified copy of valid certificate for claiming EMD exemption.
- I) Self-certified copy of valid certificate for claiming Tender Fee exemption.
- m) Self-attested copy of valid GSTIN registration.
- n) Self-attested copy of valid PAN.
- o) In case EMD paid through online banking system, the details of UTR Number and date shall be submitted.
- p) In case the tender downloaded from website, then either the Demand Draft towards tender's fees or UTR number and date for the transfer of tender fees shall be enclosed with the technical bid.
- q) The Bidders shall furnish complete Technical details of machines/ equipment/ material for the machines offered to supply through the participation of this tender (use separate sheet to elaborate the details of technical specifications such as Measuring Range/Size, Least Count/Resolution, Accuracy, Materials used, Accessories, Tools, Spares, software, etc.).
- r) To submit all supporting information with respect to the technical data, drawings or booklets of product. Any product brief, test certificates available may be enclosed.



I/We as bidder agree and certify that:

- a. The Bid submitted through this tender shall remain valid for acceptance for 90 days from the date of opening the Technical Bid of the tender.
- b. Agree to offer services for onsite comprehensive warranty on the machines(s) for two years supplied through this tender.
- c. Agree to offer services for maintenance contract for the next three (03) years for the machines(s) supplied, after the expiry of warranty period of two years, through this tender.
- d. Agree to impart onsite training to the designated personnel of purchaser for 10 working days.
- e. No price of any Machines/ Equipment/ Spares/ Accessories shall be given in Technical Bid.
- f. All above machines should be provided with safety features/ curtains/ enclosure/ stands etc. wherever applicable.
- g. The Bidder certified that all consumables, electrical and electronic parts of the product conform to national/ international standard(s).

Name & Signature of the authorized bidder with stamp

Contact details of authorized per	rson of bidder who have signed the tender.
ı	Name
1	Designation
	Phone (office)
	Phone (Mobile)
E	mail



Annexure - "D"

FORMAT FOR SUBMITTION OF COMMERCIAL BID

1. Tender Ref. No: NTSC/COMPTRG/AR-VR/2018/44.

2. Name of the Bidder:

3. The commercial offer to execute the supply as per the tender:
Offered financials for the Supply, Installation, and Commissioning at site & Training to trainers with commitment to offer on site after sales Services in the period of Warranty and maintenance contract for the machines offered to supply, as agreed in technical bid of the tender no. NTSC/COMPTRG/AR-VR/2018/44

a. Supply of Machines to NTSC-Okhla:

Sup	ipply of Machines to NTSC-Okhla:					
#	SI.n o	Details (Ref. Annexure-A for Specifications)	Unit Price of Machines before GST of single unit (In Rs.)	Quantity to be supplied (In No.)	Total Price of Machines before GST (Multiply column no 2 and 3) (In Rs.)	
а		1	2	3	4	
	1	VR Optical Glasses		4		
	2	VR Headset PC Version		2		
	3	VR System		2		
	4	Tripod Stand		4		
	5	Speakers (4.1 with Bluetoot)		5		
	6	Standalone VR Head Set		3		
	7	VR Headset with Controller &		3		
		Sensor				
	8	AR Optical Headset		3		
	9	MR Head Set		2		
	10	Magic Leap		2		
	11	Mobile Devices		3		
	12	Tablet		2		
	13	TV		2		
	14	Adjustable VR Head set		5		
	15	Mixed Reality Room Setup		1		
	16	Motion Detection/ Capturing Devices		1		
	17	Motion Detection & Capturing Sensor Devices		1		
	18	Play Station		1		
	19	AR/MR Spectacles		1		
	20	AR Smart Glasses		1		
	21	Adobe Creative Cloud		5		
		(1 Year Subscription)		Licenses		
	22	Autodesk Maya 2018		5		
				Licenses		
	23	Computer System (15 nos.)		15		
	24	Mac Computers (5 nos.)		5		
	25	MAC Pro		1		
	26	Apple 27" iMac		1		
	27	Experience ZONE for AR, VR & MR		1		
	28	Content Development Lab- (Smart Board, Projector)		1		
b.	Total	Price of Machines before GST for th	e supply of tota	I quantity		
	as det	ailed at row 'a' above to the address	at NTSC-Okhla	(In Rs.)		
c.		Price of Machines before GST for the to the address at NTSC-Okhla (Row		uantity as	detailed at row 'a'	



The following to be noted while submitting financial details for the supply of machines to the individual address:

- a. The competitiveness of bid shall be made on address of supply basis on the evaluation of "Unit Price of Machines before GST".
- b. The Purchaser shall compare the "Unit Price of Machines before GST" of all the responsive bids to determine the lowest bid for a particular address.
- c. The bidder shall note that they are not supposed to put any GST amount in the Commercial Bid. However, after the supplies, they have to issue the GST invoice indicating the Price of machines as quoted in the Commercial Offer and thereafter specify the GST as applicable at the time of delivery. The Purchaser shall pay total amount which includes the unit price of machines as well as the GST as applicable at the time of delivery.
- d. The Total Cost quoted above should be inclusive of Basic Price, Transportation, Incidental Services (including Insurance, Loading/ Unloading, Packing & Forwarding charges etc.), Installation & Commissioning, Demonstration & Training, on-site comprehensive warranty for two years and maintenance contract for three years after comprehensive warranty period.
- e. The Purchaser reserves the right to ask the evidence from bidder to counter-check that the GST as claimed by the bidder at the time of issue of invoice after the supply of machines.
- f. The bidder will not be entitled to any increase in Unit Price of the machines/ equipment before GST occurring during the period of delivery for any reason.
- g. The "Unit Price of the machines before GST" should be inclusive of all costs involved for the delivery to the destination(s) including the cost of Installation & Commissioning at destination, Training to the trainer (as detailed at Para 3(c&d) of "Scope of Supplies" of this tender), Cost of services to be provided during Comprehensive Warranty of two years. (Refer Para 3(e) of "Scope of Supplies" of this tender) and cost of services to be provided in the period of maintenance contract for three years after the expiry of comprehensive warranty period of two years (Refer Para 3 (f) of the "Scope of Supplies" of this tender.)
- h. No extra payment or revision of "Price of Machines before GST" shall be accepted on account of any discrepancy in nomenclature of items. The Bidder is advised to seek clarification, if any, desired before submitting the tender/ bid.
- i. The competing bids of "Unit Price of the machines before GST" shall be given due consideration as the Commercial Bid would be evaluated on the basis of lowest price.

I/We as bidder agree and certify that:

- i. The tender shall remain valid for acceptance for 90 days from the date of opening the Technical Bid of the tender.
- ii. Agree to offer services for onsite comprehensive warranty for two years on the machines(s)/ equipment supplied through this tender.
- iii. Agree to offer services for maintenance contract for the next three years after expiry of comprehensive warranty period of 2 years for the machines(s) supplied through this tender.
- iv. Agree to impart onsite training to the designated personnel of purchase for 10 working days
- v. Agree to three (03) sets of the Installation, Operation, Maintenance, and Training Manuals with machines.



vi. Agree that the offer price is valid for a period of 90 days from the date of opening of technical bid of this tender.

Further confirm that we agree with the terms and conditions specified in "Instructions to Bidders" and if we succeed, the execution of supplies would be made in compliance.

Name & Signature of the authorized bidder with stamp Contact details of authorized person of bidder who have signed the tender.

Name	
Designation	
Phone (office)	
Phone (Mobile)	
E mail	