CORRIGENDUM-II

Subject: Reference e-Tender Notice – NITJ/PUR/CCTV/04/2022 for the Purchase of CCTV Camera along with Accessories for Various Locations of the Institute

In reference to tender on subject cited above and queries of various firms, the revised specifications and terms & conditions are as under:-

SR. No.	DESCRIPTION	QTY.
1	2MP PTZ CAMERA 25X	4
2	ANPR CAMERA	1
3	VERIFOCAL BULLET CAMERA	106
4	8 CH NVR Compatible to ANPR	1
5	64 CH 8 SATA NVR	2
6	8 TB HARD DISK	17
7	8 PORT POE GIGA SWITCH	30
8	24 PORT NETWORK SWITCH	1
9	12 CORE OPTICAL FIBER CABLE (MTR)	2500
10	6 CORE OPTICAL FIBER CABLE (MTR)	4000
11	CAT 6 CABLE ROLL	42
12	MEDIA CONVERTER	32
13	SFP MODULE	32
14	RJ 45 CONNECTOR BOX	5
15	OFC PATCH CORD	125
16	24 PORT PATCH PANEL	1
17	24 PORT LIU	1
18	6 PORT LIU	30
19	POLE	65
20	PVC CONDUICT PIPE (MTR)	6000
21	FLEXIBLE CONDUIT PIPE (BUNDLE)	5
22	12U LOADED RACK	1
23	6U OUTDOOR LOADED RACK	30
24	3 CORE POWER CABLE 1.5 sqmm (MTR)	5500
25	50" LED TV Commercial	1
26	CAMERA MOUNTING	107
27	3 KVA ONLINE UPS	1
28	Workstation	1
29	INSTALLATION / COMMISSIONING / SPLICING / TESTING	1
30	VIDEO MANAGEMENT SOFTWARE	1

❖ **The quantity of cables, pipes, connectors etc. may vary at the time of Installation.**

BULLET VARIFOCAL CAMERA		
SR. No.	OPERATIONAL	SPECIFICATION
1	Video Standard	NTSC / PAL
2	Scanning System	Progressive
3	Image Sensor	1 / 3" 4 Megapixel progressive CMOS
4	Number Of Pixels(H × V)	2688 x 1520
5	Minimum Illumination	0.005 Lux/F1.5(color,30 IRE), 0 Lux with IR ON
6	S/N Ratio	More than 55 Db
7	Electronic Shutter Speed	1 / 3~1 / 100000s
8	IR Distance	Up to 60m (197 ft), depending on scene reflectance
9	IR Light Control	Manual / Auto, Schedule
10	Day/Night	Auto(ICR) / Color / B&W
11	Backlight Compensation	BLC / HLC / WDR
12	Wide Dynamic Range	120 dB
13	White Balance	Auto/Natural/StreetLamp/Outdoor/Manual/ Customized Region
14	Privacy Masking	Off / On (4 Zones, Rectangle)
15	Motion Detection	Off / On (4 Zones, Rectangle)
16	Region Of Interest	Off / On (4 Zones)
17	Lens	2.7 mm~13.5 mm, Motorized, F1.5
18	Angle Of View	H: 104°~27°, V: 55°~15° or Higher
19	Alarm Input / Output	1 In; 1 Out
	VIDEO	
1	Compression	H.265 / H.264 / Smart Codec / MJPEG (Sub Stream)
2	Resolution	4M (2688 x 1520); 3M (2304 x 1296);1080p (1920 x 1080); 1.3M (1280 x 960);720p (1280 x 720); D1 (704 x 576/704 x 480);VGA (640 x 480); CIF (352 x 288/352 x 240)
3	Frame Rate	Main Stream: 2688 x 1520 / 2304 x 1296 / 1920 x 1080 / 1280 x 960 / 1280 x 720@ (1 ~ 15 fps) Or Higher Sub Stream: 704 x 576 / 640 x 480 / 352 x 288@ (1 ~ 25 fps); 704 x 480 / 640 x 480 / 352 x 240@ (1 ~ 30 fps) Third Stream: 1280 x 720 / 704 x 576 / 640 x 480@ (1 ~ 25 fps); 1280 x 720 / 704 x 480 / 640 x 480@ (1 ~30 fps)
4	Bit Rate Control	CBR / VBR
5	Bit Rate	H264-3KBPS-8192KBPS H265-3KBPS-8192 KBPS
	AUDIO	
1	Interface	1 In; 1 Out
	NETWORK	
1	Ethernet	RJ-45(10/100 BASE-T)
2	Supported Web Browsers	Internet Explorer (11.0+) And Extra
3	Supported OS	Windows®10, 32-bit/64-bit Or Higher

4	Protocols*	HTTP; HTTPs; TCP; ARP; RTSP; RTP; RTCP; UDP; SMTP; DHCP; DNS; PPPoE; IPv4/v6; QoS; UPnP; NTP; Bonjour; IEEE 802.1x; Multicast; ICMP; IGMP
5	Compatibility	ONVIF Profile S / G / Q / T
6	Maximum Users Access	20 users
7	Security	User account and password protection HTTPS, IP Filter
1	Event	No SD card, SD card error, Capacity warning, Network disconnection, IP conflict, Illegal access
2	Micro SD	Supports max. 128 GB Micro SD card or Higher
	ELECTRICAL	
1	Power Supply	DC12V PoE (802.3 af)(Class 0)
2	Power Consumption	<15W
	ENVIRONMENTAL	
1	Relative Humidity	Less than 95%, non-condensing
2	Ingress Protection	IP67
3	Vandal Resistance	IK10

PTZ CAMERA

SR.NO.	CAMERA	SPECIFICATION
1	IMAGE SENSOR	1/2.8" CMOS
2	OPTICAL ZOOM	25x
3	DIGITAL ZOOM	16x
4	NUMBER OF PIXELS (H × V)	1920 × 1080 (1080p)
5	WDR	120 dB
6	S/N RATIO	> 55 dB (AGC off)
7	MINIMUM ILLUMINATION	0.005 lux (color)/0 lux (B/W) @ F1.6 (with IR LEDs on)
8	FOCAL LENGTH	4.8 mm – 120 mm or better
9	FOCUS MODE	Manual/Auto
10	IR DISTANCE	Up to 328 ft. (100 m), depending on scene reflectance
11	WHITE BALANCE	Auto/Indoor/Outdoor/ATW/Manual
12	EXPOSURE MODE	Iris Priority/Shutter Priority/Gain Priority/Manual
13	ELECTRONIC SHUTTER	1/1 to 1/30,000 sec
14	BACKLIGHT COMPENSATION	BLC/HLC/WDR (120 dB)
15	DEFOG	On/Off
16	DAY/NIGHT	Auto (ICR)/Color/BW

OPERATION

SR.NO.	CAMERA	SPECIFICATION
1	PAN TRAVEL	360° endless
2	TILT TRAVEL	−15° to 90°, auto flip 180°
3	MANUAL PAN SPEED	Up to 200°/s
4	MANUAL TILT SPEED	Up to 120°/s
5	PRESETS	300
6	PRESET SPEED	Pan: Up to 240°/s; Tilt: Up to 200°/s or better
7	TOURS	8
8	MOTION DETECTION	On/Off
9	IMAGE ROTATION	Flip
10	AUDIO IN/OUT	1 / 1
11	ALARM INPUT/OUTPUT	2 / 1
12	EVENT	Motion Detect; Audio Detect; SD card capacity warning
13	EVENT NOTIFICATION	Record (SD card and FTP), Relay output, Email, Preset, Tour, Pattern, Snapshot

ELECTRICAL

SR.NO.	CAMERA	SPECIFICATION
1	POWER SOURCE	12 VDC ± 25%, 3APoE+ (802.3at) class + 24VAC
2	POWER CONSUMPTION	23 W;30 W max (IR LEDs on) or better

MECHANICAL

SR.NO.	CAMERA	SPECIFICATION
1	DIMENSIONS	Ø160.0 mm × 295.0 mm Ø6.3" × 11.6"

2	CONNECTORS	Power input: Bare wire with connectors Network: RJ45 connector Alarm I/O: Twisted wire (2 in/1 out) Audio I/O: Twisted wire (1 in/1 out)

ENVIRONMENTAL

1	OPERATING TEMPERATURE	–40°C to 70°C (–40°F to 158°F)
2	RELATIVE HUMIDITY	Less than 90%, non-condensing
3	WATERPROOF STANDARD	IP66 or better

IP SPECIFICATIONS

1	VIDEO COMPRESSION	H.265 / H.264 / MJPEG or better
2	VIDEO STREAMING	Primary Stream: 1080p/720p @ 60/50 fps 2nd Stream: D1/CIF @ 30/25 fps 3rd Stream: 720p/D1/CIF @ 30/25 fps or better
3	VIDEO RESOLUTION	1080p (1920×1080p) / 720p (1280×720) / D1 (704×576/704×480) / CIF (352×288/352×240)
4	AUDIO COMPRESSION	G.711a/G.711Mu/AAC/G.726
5	INTERFACE	RJ-45, 10/100 Mbps Ethernet
6	SUPPORTED PROTOCOLS	IPv4/v6, TCP/IP, UDP, RTP, RTSP, HTTP, HTTPS, SSL, FTP, SMTP, DHCP, PPPoE, UPnP, SNMP, Bonjour, DDNS, IEEE 802.1x, QoS, NTP, IP Filter, ONVIF

ANPR CAMERA

Accuracy (Under recommended installation and lighting conditions)	Capture rate > 98% accuracy > 98% Mistaken capture rate < 2%
No License Plate Detection	Supported
Motorcycle LPR	Supported
Vehicle Type (Optional feature)	Car/Van/Bus/Truck/Others
Vehicle Color	Red, yellow (including orange), green, blue, purple, brown, white, grey (including silver), black
Vehicle Manufacturer (Optional feature)	65 manufacturers: HYUNDAI, TOYOTA, KIA, HONDA, VOLKSWAGEN, BENZ, NISSAN, FORD, ISUZU, BMW, CHEVROLET, MITSUBISHI, RENAULT, OPEL, SUZUKI, SKODA, DAEWOO, AUDI, MAZDA, HINO, PEUGEOT, SSANG YONG, CITROEN, FIAT, SCANIA, MAN, VOLVO, LEXUS, SEAT, LAND ROVER, DAIHATSU, UD TRUCKS,
Capture Speed Range	5 to 100 km/h or better

Image	
Max. Resolution	1920 × 1080 or better
Main Stream	50 Hz: 50 fps (1920 × 1080) or better 60 Hz: 60 fps (1920 × 1080) or better
Sub-Stream	50 Hz: 50 fps (1280 × 720, 704 × 576, 352 × 288) 60 Hz: 60 fps (1280 × 720, 704 × 480, 640 × 480)
Image Enhancement	BLC, HLC, 3D DNR
Image Settings	Rotation mode, saturation, brightness, contrast, sharpness, AGC, and white balance are adjustable via client software or web browser.
Video Compression	H.264 and H.265 encoding
Day/Night Switch	Auto/Scheduled/Triggered by alarm in

Network	
Network Storage	Micro SD/TF Card (128 GB), local storage and CVR, NVR or better
Alarm Trigger	HDD Error, network disconnected, IP address conflicted, License plate block list
Protocols	TCP/IP, HTTP, HTTPS, FTP, DNS, RTSP, NTP, IPv6, UDP, On VIF
Security Measures	Password protection, HTTPS encryption, digest authentication for HTTP/HTTPS, digest authentication for ONVIF (Version 2.1)
Web Browser	IE11+, Google Chrome, Firefox, Safari

Interface	
Audio	Supported
Communication Interface	1 RJ45 10M/100M/1000M Ethernet interface 2 RS-485 interfaces 1 RS-232 port
Alarm	2 input interfaces, 2 output interfaces or better
Video Output	Network

On-Board Storage	Built-in micro SD/TF card, up to 128 GB
Reset Button	Supported
General	
Certifications	CE, FCC, RoHS
Operating Conditions	Temperature: -30 °C to +70 °C (-22 °F to +158 °F), Humidity: 95% or less (non-condensing)
Power Supply	12 VDC to 24 VDC ± 20%, POE
Protection Level	IP67
Power Consumption	Max. 35 W

NVR

MAIN PROCESSOR	Quad-core embedded processor, Industrial Grade
OPERATING SYSTEM	Embedded LINUX
INPUTS	32 Channels IP
AUDIO INPUT/OUTPUT	1 Channel Input/1 Channel Outputs, RCA
TWO-WAY COMMUNICATION	Supported
INTERFACE	2 HDMI (1 HDMI up to 3840 × 2160); 1 VGA
RESOLUTION	3840 × 2160; 1920 × 1080; 1280 × 1024; 1280 × 720; 1024 × 768
DISPLAY SPLIT	1/4/8/9/16/25/36
OSD	Camera title; Time; Video loss; Camera lock; Motion detection; Recording
PROGRAMMABLE VIDEO OUTPUT	2nd HDMI output
FISHEYE VIDEO DE-WARPING	Supported in local and web user interface
COMPRESSION	H.265/H.264/MJPEG/MPEG4
RESOLUTION	**12 MP** (4000 × 3000); **8 MP** (3840 × 2160); **6 MP** (3072 × 2048); **5 MP** (2560 × 1920); **4 MP** (2560 × 1440); **3 MP** (2048 × 1520); **1080p** (1920 × 1080); **720p** (1280 × 720); **D1** (704 × 576 / 704 × 480); **CIF** (352 × 288 / 352 × 240)
RECORD BIT RATE	312 Mbps or better
BIT RATE[1]	16 kbps ~ 20 Mbps, per channel
RECORDING MODE	Schedule (Regular/Continuous, Motion Detection, Alarm); Manual; Stop
RECORDING INTERVAL	1 to 120 minutes (default 60 min)
PRE-EVENT RECORDING INTERVAL	1 to 30 seconds
POST-EVENT RECORDING INTERVAL	10 to 300 seconds
TRIGGER EVENTS	Recording; PTZ; Tour; Video Push; Email; FTP; Snapshot; Buzzer
VIDEO DETECTION	Motion Detection—MD Zones: 396 (22 × 18); Video Loss; Camera Blank
ALARM INPUT	16 Channels
RELAY OUTPUT	6 Channels or better
SYNC PLAYBACK	1/4/8/16 (maximum 4-ch @ 8MP, 8-ch @ 4MP, or 16-ch @ 1080p simulateous playback)
SEARCH MODE	Time/Date; Alarm; Motion Detection (MD); Exact Search (accurate to a second); Smart Search

PLAYBACK FUNCTION	Play; Pause; Stop; Rewind; Fast play; Slow play; Next File; Previous File; Next Camera; Previous Camera; Full Screen; Repeat; Shuffle; Backup selection; Digital Zoom
ETHERNET	1 RJ-45 port (10/100/1000 Mbps) or better
POE	16 ports (IEEE802.3af/at) **(External or Inbuilt)**
SUPPORTED PROTOCOLS[2]	HTTP, TCP/IP, IPv4/IPv6, UPnP, RTSP, UDP, SMTP, NTP, DHCP, DNS, IP Filter, PPPoE, DDNS, FTP, Alarm Server, IP Search, P2P
MAXIMUM NUMBER OF USERS	128 users
NETWORK THROUGHPUT	Input 312 Mbps; Output 312 Mbps or better
SMART PHONE COMPATIBILITY	iPhone; iPad; Android
INTERNAL HDD	8 SATA ports
EXTERNAL HDD	1 eSATA port
RAID	RAID** 1, 5, 10
USB PORTS	4 (2 rear USB3.0; 2 front USB2.0)
RS232	1 port (for PC communications and keyboard)
POWER SUPPLY	Single, 100~240 VAC, 50/60 Hz
POWER CONSUMPTION	**NVRs**: 25 W max (without HDD)
OPERATING TEMPERATURE	14°F to 131°F (−10°C to 55°C)
RELATIVE HUMIDITY	10% to 90%, non-condensing
CERTIFICATES	ROHs, FCC, UL, BIS

LED
Technical Specifications

Specification	Specification name	Bid Requirement (Allowed Values)
Specification	Type	4K Ultra HD
	Screen size (inches)	50"
	Resolution (Pixels)	(3840x2160) UHD Or higher
	Category	Smart or higher
	Typical Brightness	200-299, 300-399, 400-500 or higher
	If Yes, Wattage of Speakers	20W x 2
Certification	Energy star Rating in line with the Government of India Notification number S O 1896(E)	4, 5 or higher
Operating software	Operating software	Tizen
warranty	Warranty (Years)	3

UPS 3 KVA
Technical Specification

Feature / Model	3 Kva Online UPS System
Topology	Double Conversion-Online- Single Phase Input/Output, True online UPS, With Full Digital Signal Processing using DSP Technologies, Software Compatible Double Conversion with LCD Panel & Data Logging of 65 Events Pure Sine wave O/P with high frequency switching. IGBT Inverter & IGBT Rectifier.
Output	
Power Factor	0.8
Output Power Capacity	2400 Watts
Output Voltage	230 V (configurable for 220,230,240 output voltage)
Output Voltage Distortion	Less than 3%
Output Frequency	50-60Hz +/- 3Hz
Efficiency @ Full Load	not less than 92%
Output Connections	1 Hard wire 3 wire (HN+G)
Input	
Nominal Input Voltage	230 V
Input Voltagte window	156-280 VAC, Single phase
Input Voltage Adjustable Range	100-280V
Input Frequency window	40-70 Hz (autosensing)
Bypass	Should be with Automatic Inbuilt Bypass
Battery Bank	
DC Voltage Bus	72 VDC
Battery Backup	Minimum VAH = 3024
Battery Type	Sealed Maintenace Free- Lead Acid Battery with suspended Electrolyte (Leak Proof)
Battery Rack & Links	Suitable
Charging Current	Charging Current should not be less than8 Amps
Input Power Factor	>0.99
Surge Protection & Filtering	
Surge Energy Rating	420 Joules
Filtering	Full-time multi pole noice filtering:0.3%IEEE Surge Let through : Zero Clamping response time: Meets UL 1449.
Communications & Management	
Interface ports	DB-9 RS-232 Smart Slot
Control Panel	LCD display with load & Battery Bar Graph & OnLine : Onbattery : Replace Battery
Management Software	UPS Should be with Automatic shut down software.
SNMP Card	UPS Should be with Pre-installed SNMP Card.
Physical	UPS Can be mounted in Server Rack as well as Tower type.
Rack Height	2U
Audible Alarms	Alarm when on Battery, Low Battery, Overload Continous alarm.
Regulatory Approvals	OEM Reach, BIS, ROHS, ISO 9001,ISO14001, ISO50001 must be enclosed in technical Bid.
Environmental Conditions	
Operating Temperature	0-40C
Operating Relative Humidity	0-95%
Warranty	2 Years Onsite Comprehensive On UPS & Batteries Both.

WorkStation
Technical Specification

Specification	Specification Name	BID Requirement
	Processor Make	Intel
	Processor Generation	10.0 or Higher
	Number of Cores Per Processor	8 Cores
Processor	Processor Description	Intel Core i7
	Processor Number	Intel Core i7-11700
	Out of Band Management	NA
	Cache (MB)	16.0
Mother Board	Chipset Series	Intel Q Series
	Chipset Number	Intel Q570 Or higher
Graphics	Graphics Type	Integrated
	Size of Memory in Case of Dedicated Graphic Card (GB)	0
Operating System	Operating System (Factory Pre-Loaded)	Windows 10 Professional
Memory	RAM Size (GB)	16
	RAM Expandability up to(using spare DIMM Slots in GB)	128
	Type of Drives used to populate the Internal Bays	HDD, SSD
	Total HDD Capacity (GB)	2000
Storage	Total SSD Capacity (GB)	512
	Total SSHD Capacity in addition to 8 GB Flash (GB)	0
	Optane Memory (GB)	0
Cabinet	Cabinet Form Factor	Tower (13.1 to 26 Ltr)
	Optical Drive	NA
Input Devices	Mouse Connectivity	Wired
	Keyboard Connectivity	Wired
Warranty	On Site OEM Warranty (Year)	3

UTP CAT 6 Specification

	Description	
Conductor	23 AWG soild bare copper (4 Pair)	
Pairs	2 Insulated conductors twisted togeter	
Insulation	High Density Polyethylene	
Sheath	FR-PVC Insulation thickness 0.2mm nominal and should be CM rated PVC	
Resistance Unbalance	5%	
Capacitance Unbalance	330pf100m	
Delay Skew	< 45nS	
Cable Diameter	6.1 mm nominal	
Printing	Each meter printed with sequentail length Counter	
NVP (%)	69%	
Temperature Range	-20° to +70°C	
Approvals	UL Listed and ETL Verified	
Commercial standards	ANSI/TIA-568.2-D,ISO/IEC 11801,IEC-60332-1	

Optical Fibre Armoured Specification (6/12 Core)

	Description	
Features and Benefits	Cable containing upto 6/12 optical fibres in water blocked loose tube, taped, corrugated steel tape armoured (STA) polyethylene (HDPE) outer sheathed embedded with two steel wires on the periphery. The cables are with UV Stabilized PE Jacket and protected from Rodent attacks.	
Tube	Polybutylene Terephthalate(PBT)	
Armouring	Corrugated Steel Tape Armour (ECCS Tape) Thickness > 0.125mm	
Peripheral Strength Member	Two Steel wires (0.9 mm dia)	
Outer Sheath	UV Stabilised Polyethylene (HDPE	
Sheath thickness	2.0 mm nominal	
Commercial Standards	ISO.IEC 11801 - 2nd Edition, type OS1/OS2; AS/ACIF S008; AS/NZS 3080 ;ITU-T REC G 652D spec for Low Water Peak fibre; supports 10G+ data applications IEC 60793/60794-1-2 Telcordia(BELLCORE) GR 20 STDS,TIA/EIA 568-C.3, EIA 455	
Max. Tensile Strength	Short Term: 1500N	
Max. Crush Resistance	Short Term: 2000N/10 cm	
Operating Temperature range	: -40°C ±70°C	

NETWORK RACK

SPECIFICATION

1	RACK STANDARD	Conforms to DIN 41494 or equivalent standard
2	CONSTRUCTION	Welded
3	FRONT DOOR	Lockable Toughened Glass Door
4	BASIC FRAME	CRCA (MS SHEET) 0.6mm thick.
5	EQUIPMENT MOUNTING	DIN Standard Slots
6	MOUNTING ANGLE	1.6mm Vertical Mounting Rail with clear 'U' Marking.
7	STANDARD FINISH	Powder coated
8	TOP AND BOTTOM	cable entry cut-outs
9	STANDARD COLOR	Grey or Black
10	STATIC LOAD	25 kgs.

RACK 6U

	TECHNICAL SPECIFICATION 6U OUTDOOR RACK	
1	Rack Standard	Conforms to DIN 41494 or equivalent standard
2	Construction	Welded
3	Front Door	Lockable Toughened Glass Door
4	Basic Frame	Steel
5	Equipment Mounting	DIN Standard Slots
6	Mounting Angle	19" Mounting angles made of formed steel
7	Standard Finish	Powder Coated
8	Top and Bottom Cover	Welded to Frame, Vented and Field Cable entry exit cut outs
9	Standard Color	Grey
10	Static Load	60 kgs.

RACK 12U

	TECHNICAL SPECIFICATION 12U OUTDOOR RACK	
1	RACK STANDARD	Wall Mount Rack 12U
2	CONSTRUCTION	Powder coated Color- RAL- 7035
3	FRONT DOOR	Front with Toughened Glass Door with Lock & Key
4	BASIC FRAME	Basic Frame CRCA MS Sheet
5	EQUIPMENT MOUNTING	Other Additional Accessories Optional
6	MOUNTING ANGLE	19" Vertical Mounting Rail with clear 'U' Marking
7	STANDARD FINISH	Powder coated Color- RAL- 7035
8	TOP AND BOTTOM	Cable entry/exit provision at top and bottom with rubber at edges
9	STANDARD COLOR	Grey
10	STATIC LOAD	Load Bearing Capacity 40Kg

PoE Network Switch

	TECHNICAL SPECIFICATION 8 Port Network Switch	
1	Network Port	PoE (1~8) :10/100/1000Mbps PoE ports (RJ45) LAN (1~2):10/100/1000Mbps uplink port (RJ45) SFP (1~2):10/100/1000Mbp uplink ports (SFP)
2	Network Standard	IEEE 802.3i 10BASE-T IEEE 802.3u 100BASE-TX/ IEEE 802.3ab 1000BASE-T IEEE 802.3x Flow Control IEEE 802.3af/at/bt Power over Ethernet
3	Transmission Rate	180Mbps Full Duplex; 10 or 100 or 1000Mbps Half Duplex
4	MAC Address Table	8K
5	Bandwidth	20.0 Gbps or better
6	Power Budget	120W
7	Power Input	AC 180~240V, Total ≤120W
8	Lightning Protection	5KV
9	Operating Temperature	-30°C ~55°C
10	Working Humidity	10%~90% (Non-condensing)

TECHNICAL SPECIFICATION 24 Port Network Switch		
1	Network Port	24 PORT :10/100/1000Mbps RJ45 4SFP 10/100/1000Mbp uplink ports SFP
2	Network Standard	IEEE 802.3(10BASE-T), IEEE 802.3u (100BASE- TX) IEEE 802.3ab (1000BASE-Tx) IEEE 802.3x Flow Control IEEE 802.1D(STP), IEEE802.1w(RSTP), IEEE802.1s(MSTP)
3	Transmission Rate	10BASE-T OR 100BASE-TX, 1000BASE-TX, 1000BASE- SE-x
4	Forwarding Rate	Gigabit wire-speed forwarding
5	Bandwidth	50+ Gbps
6	Port Management	Enables / Disables the port, Speed, duplex, MTU settigns, Flow-Control, Port Information view
7	Power Source	12V/2.1A
8	Lightning Protection	All ports support up to 4Kv lightning protection function
9	Operating Temperature	0°C~55°C
10	Working Humidity	10%~90% non-condensing

Note:

- ❖ Warranty period of all those equipments/items for which the same is not mentioned should be minimum 2 years.
- ❖ Payment clause (Terms & Conditions for the supply of Goods, Equipment/Item of the tender documents at Sr. No. 6) may be read as under:-
  70% against physical delivery and submission of PBG @3% and rest 30% after successful installation, commissioning, training and satisfactory working of the devices.
- ❖ Completion of work : The clause (Terms & Conditions for the supply of Goods, Equipment/Item of the tender documents at Sr. No. 10) may be read as under:-
  Supplier has to complete the installation and other related work for successful working of the equipment within two months from the date of delivery of the equipment.
- ❖ Regarding installation, it is mentioned that the laying of OFC Cable with HDE pipe should be done by HDD machine. The charges of installation may be quoted accordingly.

The bidders are requested to quote accordingly.

Other terms & conditions of the Tender Documents shall remain same.

2/6/23

Assistant Registrar (Purchase)