

INVITATION FOR SEALED BID # 0044168 - THIS IS NOT AN ORDER

**VIRGINIA POLYTECHNIC INSTITUTE AND STATE UNIVERSITY
INFORMATION TECHNOLOGY ACQUISITIONS (MC 0214)
1700 PRATT DRIVE, ANDREWS INFORMATION SYSTEMS BUILDING
BLACKSBURG, VIRGINIA 24061**

DATE April 11, 2016	BID RETURN DATE AND HOUR April 25, 2016	BID OPENING DATE AND HOUR April 25, 2016 at 3:00 pm
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BIDDERS ADDRESS

ADDRESS ALL INQUIRIES AND CORRESPONDENCE TO:
Vicky Moore, CPPB
Buyer Senior, IT Acquisitions
E-MAIL ADDRESS: vmoore@vt.edu
TELEPHONE NUMBER (540) 231-7953
FAX NUMBER (540) 231-4410

COMMODITY: STORAGE SOLUTION

SPECIAL INSTRUCTIONS

- SEALED BID** responses should be returned in a sealed envelope/package.
- Faxed responses to Sealed Bids cannot be sent directly to Information Technology Acquisitions, see "Facsimile Bids" of the attached General Terms and Conditions.
- Responses must be submitted on this form and the attachment (s) provided.
- Responses should be signed below.
- Responses will be received in the Virginia Polytechnic Institute and State University, Information Technology Acquisitions office (MC 0214), Andrews Information Systems Building, 1700 Pratt Drive, Blacksburg, VA 24061 until the bid return date and hour shown above.
- Contact the buyer listed above for all requests for information.
- DELIVERY IS F.O.B. DESTINATION UNLESS OTHERWISE NOTED IN THE BODY OF THE BID.**
- Any **ADDENDUM** issued for this solicitation may be accessed at <http://www2.ita.vt.edu/purchasing/index.html>. Since a paper copy of the addendum will not be mailed to you, we encourage you to check the web site regularly.
- Bidders are reminded of the fees associated with the eVA Business-To-Government Vendor Registration requirement described herein and at <http://www.eva.virginia.gov> and submit prices accordingly.**

CERTIFICATION: IN ACCORDANCE WITH THIS INVITATION FOR BIDS & SUBJECT TO ALL TERMS & CONDITIONS CONTAINED HEREIN INCLUDING THE GENERAL TERMS AND CONDITIONS SHOWN AT http://www.procurement.vt.edu/html/docs/terms/GTC_BID_01012016.pdf

THE UNDERSIGNED OFFERS AND AGREES TO FURNISH THE GOODS OR SERVICES FOR THE PRICE(S) OFFERED.

LEGAL NAME (PRINT) (Company name as it appears with your Federal Taxpayer Number)		FEDERAL TAXPAYER NUMBER (ID#)		DELIVERY DATE	
BUSINESS NAME/DBA NAME/TA NAME (If different than the Full Legal Name)		FEDERAL TAXPAYER NUMBER (If different than ID# above)			
BILLING NAME (Company name as it appears on your invoice)		FEDERAL TAXPAYER NUMBER (If different than ID# above)			
PURCHASE ORDER ADDRESS		PAYMENT ADDRESS			
CONTACT NAME/TITLE (PRINT)		SIGNATURE (IN INK)		DATE	
E-MAIL ADDRESS		TELEPHONE NUMBER		TOLL FREE TELEPHONE NUMBER	
				FAX NUMBER	
*BUSINESS CLASSIFICATION		<input type="checkbox"/> LARGE	<input type="checkbox"/> SMALL	<input type="checkbox"/> MINORITY-OWNED	<input type="checkbox"/> WOMEN-OWNED
*Definitions available at http://www.procurement.vt.edu/Vendor/class.html . *Certification assistance available at http://www.dmbe.virginia.gov					
*Is your Classification certified by the Virginia Department of Small Business and Supplier Diversity (SBSD)? <input type="checkbox"/> Yes <input type="checkbox"/> No				If yes, provide Certification Number:	

Is any member of the firm an employee of the Commonwealth of Virginia with a personal interest in this contract pursuant to the Code of Virginia? YES _____ NO _____

Signature (in ink): _____ **Date:** _____

This is Not An Order

**VIRGINIA POLYTECHNIC INSTITUTE AND STATE UNIVERSITY
INVITATION FOR SEALED BID #0040405**

I. **PURPOSE:** The purpose of this Invitation for Sealed Bids is to purchase a commodity storage solution that provides at least 900TB of raw disk storage with a minimum (equal to or greater than 1 and less than 6) number of storage “shelves”. Each shelf will run the Microsoft Windows 2012 R2 Operating System and provide formatted storage as iSCSI LUNs via 10GB fiber SFP+ network interfaces.

II. **EVA BUSINESS-TO-GOVERNMENT ELECTRONIC PROCUREMENT SYSTEM:** The eVA electronic procurement solution streamlines and automates government purchasing activities within the Commonwealth of Virginia. Virginia Tech, and other state agencies and institutions, have been directed by the Governor to maximize the use of this system in the procurement of goods and services, therefore, requesting that your firm register with eVA. There are registration fees and transaction fees involved with the use of eVA. These fees must be considered in the provision of quotes, bids and price proposals offered to Virginia Tech. Failure to register within the eVA system may result in the quote, bid or proposal from your firm being rejected and the award made to another vendor who is registered in the eVA system.

Registration in the eVA system is accomplished on-line. Your firm must provide the necessary information. Please visit the eVA website portal at <http://www.eva.virginia.gov/pages/eva-registration-buyer-vendor.htm> and **register both with eVA and Ariba**. *This process needs to be completed before Virginia Tech can issue your firm a Purchase Order or contract.* If your firm conducts business from multiple geographic locations, please register all appropriate locations. For registration and technical assistance, reference the eVA website at: eVACustomerCare@dgs.virginia.gov, or call 866-289-7367 or 804-371-2525.

III. **SCOPE OF EQUIPMENT:**

A. General: The successful Bidder shall furnish and deliver the storage solution system described herein.

B. Specified: The specifications for specific equipment requirements are detailed in Section VII, Pricing Schedule. Virginia Tech reserves the right to purchase additional quantities at the unit price bid for up to 180 day after the bid is awarded.

IV. **AWARD:** Virginia Tech will make the award on a lump sum basis to the lowest responsive and responsible bidder. Virginia Tech also reserves the right to reject any or all bids, in whole or in part, to waive informalities and to delete items prior to making the award, whenever it is deemed in the sole opinion of Virginia Tech to be in its best interest.

V. **METHOD OF PAYMENT:** Virginia Tech will authorize payment to the contractor Net 30 days after each satisfactory delivery of goods and receipt of the contractor’s invoice.

Payment can be expedited by using the **Wells One AP Control Payment System**. Virginia Tech strongly encourages participation in this program. Additional information can be found here: <http://www.procurement.vt.edu/Vendor/WellsOne.html>.

VI. **INVOICES:** Invoices for good or services provided under any purchase order resulting from this solicitation shall be submitted to:

Virginia Polytechnic Institute and State University
Accounts Payable
North End Center, Suite 3300, Virginia Tech
300 Turner Street, NW
Blacksburg, VA 24061

VII. **PRICING SCHEDULE: (To Be Completed By Vendor)**

Qty	Description	Quantity	Unit	Total
1 System	<p>Each shelf must meet or exceed the following specifications:</p> <ul style="list-style-type: none"> • Shelf must be standard rack mountable with dimension not exceeding: <ul style="list-style-type: none"> a. LxWxH = 31.500" x 17.125" x 7.000" • Shelf must include rack sliding rails compatible with a standard Dell 42u rack • Shelf must include a one 950W 2+1 Redundant Zippy M3W-P6950L Power Supply or equivalent redundant power to spin up all installed drives from cold boot without power brownouts, hard drive failure or voltage spikes • Each shelf component (motherboard, NICs, HBA controllers, hard drives, etc.) must include certified Windows drivers compatible with Windows 2012 R2 • Shelf must have installed an Intel compatible motherboard, of at least the functionality of a SuperMicro X10DRL (DDR 4) motherboard, such as: <ul style="list-style-type: none"> a. Dual socket R3 (LGA 2011) supports Intel Xeon processor E5-2600 v3 family; QPI up to 9.6GT/s b. Intel C612 chipset 	1	System	\$ _____

	<p>c. Up to 512GB ECC DDR4 2133MHz; 8x DIMM sockets</p> <p>d. 3 PCI-E 3.0 x8, 1 PCI-E 3.0 x4 (in x8), 1 PCI-E 3.0 x16, 1 PCI-E 2.0 x4 (in x8)</p> <p>e. Intel i210 GbE LAN, 2 ports</p> <p>f. Integrated IPMI 2.0 and KVM with Dedicated LAN</p> <p>g. 4x USB 3.0 (2 rear, 2 via header) 5x USB 2.0 (2 rear, 2 via header, 1 Type A)</p> <ul style="list-style-type: none"> • Shelf must include installed dual Intel CPUs of at least the speed and capabilities of the Intel E52620 v3 processor (15M Cache, 2.00 GHz, 7.20 GT/s Intel QPI) • Shelf must include installed memory of at least 128GB ECC DDR4 2133MHz or faster and larger capacity • Shelf must include a boot drive set which consists of dual Redundant SSDs (2 SDSSDHII-120GB-G25-Sandisk Ultra II 120GB SSD-Internal-Read 550MB/2-Write 500MB) or equivalent or faster speed and storage capacity • Shelf must contain at least dual HBA controllers with at least the functionality of Highpoint Rocket 750 or LSI SAS 9201 controllers. Controller types must match hard drives installed • Shelf must include at least four 10GB fiber NIC network ports (SFP+ type) with at least the functionality of SuperMicroAOC-SGN-i2 network cards including support for PCI-SIG SR-IOV and VDMq technologies • Shelf must contain at least 45 non-customized commodity parts SAS or SATA drives with at least the functionality of a Western Digital Re 4TB drive (model WDC4000FYYZ) running at least at 7200 RPMs with 64MB cache and transfer rate of 6.0Gb/s. Drives cannot be customized or firmware imprinted to restrict usage of off-the-shelf replacements. • Shelf must include at least a 3 year warranty of parts, labor and components • Shelf must contain adequate cooling and anti-vibration technology for continuous 24x7 usage within all component specifications <p>TOTAL</p>			
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VIII. **ADDENDUM:** Any *Addendum* issued may be accessed at <http://www2.ita.vt.edu/purchasing/index.html>. Since a paper copy of the addendum will NOT be mailed to you, we encourage you to check this link regularly.

IX. **TERMS AND CONDITIONS:** This solicitation and any resulting contracts and or purchase orders shall be governed by the terms and conditions of Attachment A, herein.

X. **ATTACHMENTS:**

A. Terms & Conditions

**ATTACHMENT A
TERMS AND CONDITIONS**

General Terms and Conditions: See http://www.procurement.vt.edu/html.docs/terms/GTC_BID_01012016.pdf

Special Terms and Conditions:

1. **ORDERING OPTION:** Virginia Tech, may during the first 180 days after the bid is awarded place additional orders at the original unit price through the issuance of separate purchase orders.
2. **AVAILABILITY OF FUNDS:** It is understood and agreed between the parties herein that Virginia Tech shall be bound hereunder only to the extent of the funds available or which may hereafter become available for the purpose of this agreement
3. **CANCELLATION OF CONTRACT:** Virginia Tech reserves the right to cancel and terminate any resulting contract, in part or in whole, without penalty, upon 60 days written notice to the Contractor. In the event the initial contract period is for more than 12 months, either party, without penalty, may terminate the resulting contract after the initial 12 months of the contract period upon 60 days written notice to the other party. Any contract cancellation notice shall not relieve the Contractor of the obligation to deliver and/or perform on all outstanding orders issued prior to the effective date of cancellation.
4. **CONTRACT DOCUMENTS:** Any contract resulting from this solicitation shall consist of this IFB, including all modifications thereof, the Contractor's bid all of which shall be referred to collectively as the Contract Documents.
5. **BID PRICES:** Bid shall be in the form of a firm unit price for each item during the contract period.
6. **COMMUNICATIONS:** Communications regarding this Invitation for Bids (IFB) shall be formal from the date of issue for this IFB, until either a Contractor has been selected or the Information Technology Acquisitions Office rejects all bids. Formal communications will be directed as indicated on page one. Informal communications, including but not limited to requests for information or comments regarding this IFB to any University employee other than the buyer listed on page one of this IFB may result in the offending Bidder's bid being rejected.
7. **ADVERTISING:** In the event a contract is awarded for supplies, equipment, or services resulting from this solicitation, no indication of such sales or services to Virginia Tech will be used in product literature or advertising without the prior written consent of Virginia Tech. The Contractor shall not state in any of the advertising or product literature that the Commonwealth of Virginia or any agency or institution of the Commonwealth has purchased or uses its products or services.

ADDENDUM # 1 TO Sealed Bid # 0044168

VIRGINIA POLYTECHNIC INSTITUTE AND STATE UNIVERSITY
INFORMATION TECHNOLOGY ACQUISITIONS (0214)
1700 PRATT DRIVE
BLACKSBURG, VA 24061

DATE April 12, 2016	ORIGINAL DUE DATE AND HOUR April 25, 2016 at 3:00 pm
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ADDRESS ALL INQUIRIES AND CORRESPONDENCE TO: Vicky Moore , Senior Buyer E-MAIL ADDRESS: vmoore@vt.edu TELEPHONE NUMBER (540) 231-7953 FAX NUMBER (540) 231-4110

Storage Solution

Item 1. Questions & Answers:

Q1. What type of performance requirements are needed? How many IOPs?

A1: As high as possible with specified architecture allows

Q2. 900TB RAW capacity was mentioned, but we need to know what USABLE capacity is needed? What RAID protection will they be using?

A2: We are only looking for raw addressable commodity storage, assume no HW RAID

Q3. Are they looking for tiered storage (extreme performance (flash), performance(SAS), and capacity(NL-SAS)) or just capacity?

A3. Just capacity

Q4. What level of support? 4 hour onsite or NDB?

A4. No support besides warranty replacement which should be 8-5 NBD

Q5. Who is doing the install? Do you need install services quoted?

A5. Staff will do install. No install services should be necessary to utilize system.

Q6. Any data services needed? Optional SW?

A6. No additional services or SW should be needed to utilize the storage.

Item 2. All other terms, conditions and descriptions remain the same.

The Due Date and Hour remain the same.

FULL LEGAL NAME (PRINT) (Company name as it appears with your Federal Taxpayer Number)	FEDERAL TAXPAYER NUMBER (ID#)
BUSINESS NAME/DBA NAME/TA NAME (If different than the Full Legal Name)	FEDERAL TAXPAYER NUMBER (If different than ID# above)
BILLING NAME (Company name as it appears on your invoice)	FEDERAL TAXPAYER NUMBER (If different than ID# above)

PURCHASE ORDER ADDRESS		PAYMENT ADDRESS	
CONTACT NAME/TITLE (PRINT)		SIGNATURE (IN INK)	DATE
E-MAIL ADDRESS	TELEPHONE NUMBER	TOLL FREE TELEPHONE NUMBER	FAX NUMBER TO RECEIVE E-PROCUREMENT ORDERS

ADDENDUM # 2 TO Sealed Bid # 0044168

VIRGINIA POLYTECHNIC INSTITUTE AND STATE UNIVERSITY
 INFORMATION TECHNOLOGY ACQUISITIONS (0214)
 1700 PRATT DRIVE
 BLACKSBURG, VA 24061

DATE April 13, 2016	ORIGINAL DUE DATE AND HOUR April 25, 2016 at 3:00 pm
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ADDRESS ALL INQUIRIES AND CORRESPONDENCE TO: Vicky Moore , Senior Buyer E-MAIL ADDRESS: vmoore@vt.edu TELEPHONE NUMBER (540) 231-7953 FAX NUMBER (540) 231-4110

Storage Solution

Item 1. Questions & Answers:

Q1: - Are you looking for a server in every shelf that meet the specs? Meaning are you looking for shelves made only of servers?

A1: Each server should internalize the storage, we do not want separate compute and storage shelves

Q2: - What protocols are you looking to run on this?

A2: The base OS will be Windows 2012 R2 so whatever file protocols it provides

Q3: - Will VT be purchasing or leasing the Storage Solution?

A3: Purchasing

Item 2. All other terms, conditions and descriptions remain the same.

The Due Date and Hour remain the same.

FULL LEGAL NAME (PRINT) <small>(Company name as it appears with your Federal Taxpayer Number)</small>		FEDERAL TAXPAYER NUMBER (ID#)	
BUSINESS NAME/DBA NAME/TA NAME <small>(If different than the Full Legal Name)</small>		FEDERAL TAXPAYER NUMBER <small>(If different than ID# above)</small>	
BILLING NAME <small>(Company name as it appears on your invoice)</small>		FEDERAL TAXPAYER NUMBER <small>(If different than ID# above)</small>	
PURCHASE ORDER ADDRESS		PAYMENT ADDRESS	
CONTACT NAME/TITLE (PRINT)		SIGNATURE (IN INK)	DATE
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ADDENDUM # 3 TO Sealed Bid # 0044168

VIRGINIA POLYTECHNIC INSTITUTE AND STATE UNIVERSITY
 INFORMATION TECHNOLOGY ACQUISITIONS (0214)
 1700 PRATT DRIVE
 BLACKSBURG, VA 24061

DATE April 14, 2016	ORIGINAL DUE DATE AND HOUR April 25, 2016 at 3:00 pm
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ADDRESS ALL INQUIRIES AND CORRESPONDENCE TO: Vicky Moore , Senior Buyer E-MAIL ADDRESS: vmoore@vt.edu TELEPHONE NUMBER (540) 231-7953 FAX NUMBER (540) 231-4110

Storage Solution

Item 1. Questions & Answers:

Q1. Would you be able to provide the model number of the Dell 42u rack that the rack sliding rails needs to be compatible with?

A1. APC AR3300 (4ft deep)

Q2. Is it ok to bid the 60 drive chassis to accommodate your requirement to have a motherboard in each shelf?

A2. That sounds fine as long as it meets the rack spacing/sizing requirements.

Item 2. All other terms, conditions and descriptions remain the same.

The Due Date and Hour remain the same.

FULL LEGAL NAME (PRINT) <small>(Company name as it appears with your Federal Taxpayer Number)</small>		FEDERAL TAXPAYER NUMBER (ID#)	
BUSINESS NAME/DBA NAME/TA NAME <small>(If different than the Full Legal Name)</small>		FEDERAL TAXPAYER NUMBER <small>(If different than ID# above)</small>	
BILLING NAME <small>(Company name as it appears on your invoice)</small>		FEDERAL TAXPAYER NUMBER <small>(If different than ID# above)</small>	
PURCHASE ORDER ADDRESS		PAYMENT ADDRESS	
CONTACT NAME/TITLE (PRINT)		SIGNATURE (IN INK)	DATE
E-MAIL ADDRESS	TELEPHONE NUMBER	TOLL FREE TELEPHONE NUMBER	FAX NUMBER TO RECEIVE E-PROCUREMENT ORDERS

TABULATION REPORT

Sealed Bid Number: 0044168

Description: Commodity Storage Solution

Alliance Technology Group, LLC.....	\$76,320.00 plus shipping – Awarded 5/24/2016
Elite Systems.....	\$119,616.00
45 Drives Manufacturing Co.....	\$105,262.70
JPK Micro Supply, Inc.....	\$91,290.00
Lenovo.....	\$102,746.00
Reason.....	\$94,225.00
SHI International Corp.....	\$1,816,667.52