

JUSTIFICATION FOR SOLE SOURCE or BRAND NAME SPECIFIED  
(Simplified Acquisitions <\$150K)

The service or material listed on N0016115RCZ0852 is sole source and competition is precluded for reasons indicated below. There are no substitutes available for this material or service.

**Restricted to the following source**

Manufacturer: University of Maryland Baltimore County (UMBC)

Manufacturer POC & phone #: Stanley Jackson, 410-455-1336

Mfr. Address: 1000 Hilltop Circle, Baltimore, MD 21250

Dealer / Rep / Recommended source:

Dealer / Rep / Recommended source address / phone #:

  X   Description of the item or service required, the estimated cost, and required delivery date.

United States Naval Academy (USNA), Office of Research and Scholarship requires University of Maryland, Baltimore County (Dr. Zhiyuan Chen) support to begin developing and testing algorithms for single node version of Rya, a RDF triple store, as part of USNA's (Prof. Crainiceanu's research project "Efficient Query Algorithms and Database Scalability." The services will include algorithms design and prototyping, together with software development, performance testing and performance comparison with other approaches. Period of performance is 01 July 2015 through 31 December 2015 [REDACTED]

  X   Specific characteristics of the material or service that limit the availability to a sole source / brand name (unique features, function of the item, etc.). Describe in detail why only this suggested source / brand name can furnish the requirements to the exclusion of other sources / brands.

Dr. Chen is a recognized expert in the area of database research that is necessary for the continued development of research project "Efficient Query Algorithms and Database Scalability." He has intimate knowledge of the scientific and system requirements of the research program, and is uniquely suited to assist the USNA researchers in advancing Rya analysis and prediction.

Dr. Chen has made several significant contributions to this research effort in the area of developing algorithms, semantic base search and efficient query processing and query optimization and is intimately familiar with the USNA analysis requirements; therefore, Dr. Chen's ongoing support for this project is vital to its success.

CHECK & FILL IN ALL APPLICABLE BLANKS BELOW

       The requested material or service represents the minimum requirements of the government.

