

## AMENDMENT OF SOLICITATION/MODIFICATION OF CONTRACT

BPA NO.

1. CONTRACT ID CODE

PAGE

1

OF

10

2. AMENDMENT/MODIFICATION NO.  
M0223. EFFECTIVE DATE  
See block 16C4. REQUISITION/PURCHASE REQ. NO.  
OIS 12-121  
1/13/2012

5. PROJECT NO. (If applicable)

6. ISSUED BY  
U.S. Nuclear Regulatory Commission  
Div. of Contracts, IMT  
Attn: Vanessa Lamb, 301-492-3622  
Mail Stop TWB-01-B10M  
Washington, DC 20555

CODE

3100

7. ADMINISTERED BY (If other than Item 6)  
U.S. Nuclear Regulatory Commission  
Div. of Contracts  
Mail Stop TWB-01-B10M  
Washington, DC 20555

CODE 3100

8. NAME AND ADDRESS OF CONTRACTOR (No., street, county, State and ZIP Code)

QAO CORPORATION  
Attn: Jeffery Funk  
5290 Shawnee Road  
Alexandria VA 22312

(X) 9A. AMENDMENT OF SOLICITATION NO.

9B. DATED (SEE ITEM 11)

10A. MODIFICATION OF CONTRACT/ORDER NO  
GS35F4524G NRC-DR3307358T011  
M02210B. DATED (SEE ITEM 13)  
09-26-2007

CODE 074830209

FACILITY CODE

X

## 11. THIS ITEM ONLY APPLIES TO AMENDMENTS OF SOLICITATIONS

☐ The above numbered solicitation is amended as set forth in Item 14. The hour and date specified for receipt of Offers ☐ is extended, ☐ is not extended. Offers must acknowledge receipt of this amendment prior to the hour and date specified in the solicitation or as amended, by one of the following methods:

(a) By completing Items 8 and 15, and returning \_\_\_\_\_ copies of the amendment; (b) By acknowledging receipt of this amendment on each copy of the offer submitted; or (c) By separate letter or telegram which includes a reference to the solicitation and amendment numbers. FAILURE OF YOUR ACKNOWLEDGMENT TO BE RECEIVED AT THE PLACE DESIGNATED FOR THE RECEIPT OF OFFERS PRIOR TO THE HOUR AND DATE SPECIFIED MAY RESULT IN REJECTION OF YOUR OFFER. If by virtue of this amendment you desire to change an offer already submitted, such change may be made by telegram or letter, provided each telegram or letter makes reference to the solicitation and this amendment, and is received prior to the opening hour and date specified.

12. ACCOUNTING AND APPROPRIATION DATA (If required) N/A

13. THIS ITEM APPLIES ONLY TO MODIFICATIONS OF CONTRACTS/ORDERS,  
IT MODIFIES THE CONTRACT/ORDER NO. AS DESCRIBED IN ITEM 14.

(X) A. THIS CHANGE ORDER IS ISSUED PURSUANT TO: (Specify authority) THE CHANGES SET FORTH IN ITEM 14 ARE MADE IN THE CONTRACT ORDER NO. IN ITEM 10A.

B. THE ABOVE NUMBERED CONTRACT/ORDER IS MODIFIED TO REFLECT THE ADMINISTRATIVE CHANGES (such as changes in paying office, appropriation date, etc.) SET FORTH IN ITEM 14, PURSUANT TO THE AUTHORITY OF FAR 43.103(b).

C. THIS SUPPLEMENTAL AGREEMENT IS ENTERED INTO PURSUANT TO AUTHORITY OF:

D. OTHER (Specify type of modification and authority) FAR Clause Option to Extend Services 52.217-8

X

E. IMPORTANT: Contractor ☐ is not, ☒ is required to sign this document and return 1 copies to the issuing office.

14. DESCRIPTION OF AMENDMENT/MODIFICATION (Organized by UCF section headings, including solicitation/contract subject matter where feasible.)

Task Order 11, Database Administration

The purpose of this modification is to exercise FAR Clause 52.217-8  
Details of this modification are on page 2.

Project Officer: Tu Tran

Total order ceiling: \$6,400,431.22 (changed)

Total obligated amount: \$5,026,512.57 (unchanged)

Period of Performance: September 26, 2007 - March 25, 2012 (changed)

Except as provided herein, all terms and conditions of the document referenced in Item 9A or 10A, as heretofore changed, remains unchanged and in full force and effect.

15A. NAME AND TITLE OF SIGNER (Type or print)

Jeffery W. Funk, Contracts Mgr.

15B. CONTRACTOR OFFICER

(Signature of person authorized to sign)

15C. DATE SIGNED

1/20/2012

16A. NAME AND TITLE OF CONTRACTING OFFICER (Type or print)

Dominique C. Malone  
Contracting Officer

Warrant 172

16B. UNITED STATES OF AMERICA

BY Dominique C. Malone  
(Signature of Contracting Officer)

16C. DATE SIGNED

1/24/2012

NSN 7540-01-152-8070  
PREVIOUS EDITION NOT USABLESTANDARD FORM 30 (REV 10-83)  
Prescribed by GSA - FAR (48 CFR) 53.243

SUNSI REVIEW COMPLETE

TEMPLATE - ADM001

JAN 24 2012

ADM002

The purposes of this modification are the following:

A. To exercise FAR Clause 52.217-8; as a result the contract is revised to reflect the following:

1) - Period of Performance

(a) The period of performance is extended by 2 months to March 25, 2012. Therefore, the period of performance is changed to read September 26, 2007 to March 25, 2012.

2) Ceiling Increase

B. To increase the estimated ceiling from \$6,276,320.23 by \$124,110.99 to \$6,400,431.22

(a) This option is being exercised at the labor rates and the ceiling amount in the attached pricing schedule.

C. To incorporate an updated statement of work for task order 11. Please see pages 4 – 10 for the updated statement of work.

Database Administration	Option 2 Rate	FY2012 (1/26/12-3/25/12)	
		Hours	Amount
<b>Direct Labor Categories</b>			
010 Program Manager	\$ [REDACTED]	-	\$ -
020 Project Manager	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
030 Quality Assurance Manager	\$ [REDACTED]	-	\$ -
050 Principal BPR Specialist	\$ [REDACTED]	-	\$ -
060 Senior BPR Specialist	\$ [REDACTED]	-	\$ -
070 Principal Systems Analyst	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
080 Senior Systems Analyst	\$ [REDACTED]	-	\$ -
090 Principal Information Engineer	\$ [REDACTED]	-	\$ -
100 Senior Information Engineer	\$ [REDACTED]	-	\$ -
105 Senior Information Engineer Onsite	\$ [REDACTED]	-	\$ -
110 Senior Functional Analyst	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
130 Systems Analyst 5	\$ [REDACTED]	-	\$ -
140 Systems Analyst 4	\$ [REDACTED]	-	\$ -
150 Systems Analyst 3	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
160 Systems Analyst 2	\$ [REDACTED]	-	\$ -
170 Systems Analyst 1	\$ [REDACTED]	-	\$ -
220 Computer Programmer 6	\$ [REDACTED]	-	\$ -
230 Computer Programmer 5	\$ [REDACTED]	-	\$ -
260 Support Specialist 6	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
265 Support Specialist 6 Onsite	\$ [REDACTED]	-	\$ -
270 Support Specialist 5	\$ [REDACTED]	-	\$ -
275 Support Specialist 5 Onsite	\$ [REDACTED]	-	\$ -
280 Support Specialist 4	\$ [REDACTED]	-	\$ -
310 Engineer 5	\$ [REDACTED]	-	\$ -
350 Senior Security Specialist	\$ [REDACTED]	-	\$ -
360 Computer Security Specialist	\$ [REDACTED]	-	\$ -
520 Apps Systems Analysis and Program Manager	\$ [REDACTED]	-	\$ -
525 Apps Systems Analysis and Program Manager Onsite	\$ [REDACTED]	-	\$ -
530 Apps Systems Analysis and Program Sup	\$ [REDACTED]	-	\$ -
535 Apps Systems Analysis and Program Sup Onsite	\$ [REDACTED]	-	\$ -
540 Apps Systems Analyst/Programmer - St Spec	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
545 Apps Systems Analyst/Programmer - St Spec Onsite	\$ [REDACTED]	-	\$ -
550 Apps Systems Analyst/Programmer - Lead	\$ [REDACTED]	-	\$ -
555 Apps Systems Analyst/Programmer - Lead Onsite	\$ [REDACTED]	-	\$ -
580 Network Ops Specialist	\$ [REDACTED]	[REDACTED]	\$ [REDACTED]
630 Tele Comm Eng/Analyst	\$ [REDACTED]	-	\$ -
700 Documentation Specialist	\$ [REDACTED]	-	\$ -
710 Documentation Coordinator	\$ [REDACTED]	-	\$ -
715 Documentation Coordinator Onsite	\$ [REDACTED]	-	\$ -
720 Technical Expert - Level 4	\$ [REDACTED]	-	\$ -
730 Technical Expert - Level 3	\$ [REDACTED]	-	\$ -
740 Technical Expert - Level 2	\$ [REDACTED]	-	\$ -
745 Technical Expert - Level 2 Onsite	\$ [REDACTED]	-	\$ -
750 Technical Expert - Level 1	\$ [REDACTED]	-	\$ -
760 Information Services Consultant	\$ [REDACTED]	-	\$ -
<b>TOTAL LABOR</b>		[REDACTED]	\$ 124,110.99

**A. Background**

The NRC has taken the direction of reengineering mainframe computer-based systems using client server and 3Tier Web technologies. To date, the following systems are in production—RPS and its subsystems, PMNS, AMS, HFIS, OIMIS, EATS, PASS/PAM, OLTS, TRIM, RITS, GLTS, HRMS, and NRCCC. Additional systems are being developed by NRC Contractors under separate task orders (one for each application). This SOW identifies requirements for the database administration support of the Sybase Adaptive Server Enterprise (ASE), the Microsoft SQL Server, and the databases installed at the NRC headquarters and regional sites. It also includes web application environment support including but not limited to ColdFusion applications, and support for the NRC's information technology (IT) portfolio management system.

**B. Scope**

This SOW defines a baseline level of effort for database administration, web application support and management activities associated with supporting Sybase RDBMS, Microsoft SQL Server and Cold Fusion. The Contractor shall provide the necessary onsite resources to provide comprehensive database administration services to OIS/BPIAD to perform routine and specific services upon request to the production, test and acceptance, and the development database environments. The scope of this task is to utilize the COTS software in conjunction with AIX, SUN Solaris, Windows, Sybase, and MS SQL Server software to design, develop, implement, maintain, and support the NRC-distributed database environment using SYBASE ASE, SYBASE Replication Server, and MS SQL Server. The Contractor shall also provide off site resource to support web based applications. Although the primary support will deal with ColdFusion application, the contractor shall support other web related development languages. The contractor shall provide an additional off site resource to support administration of the NRC's Primavrea Prosight portfolio management system.

Typical routine activities will be done during normal work hours (i.e., during the hours of 7 AM to 7 PM). Maintenance and enhancement activities will be done outside of prime use hours (i.e., hours before 7 AM or after 7 PM). Task to be performed outside of prime use hours shall need approval from Task Order Manager for overtime or compensation time.

**C. Statement of Work**

The work shall include, but is not limited to, the following tasks:

- (1) The Contractor shall perform distributed database administration activities to ensure optimum database performance by monitoring and fine tuning of the Sybase and Microsoft SQL Server environments.
- (2) The Contractor shall perform routine maintenance of the client server database environment to ensure the system is up and running, accessible to users on a 12 h/d basis. If the system fails, downtime is to be kept to a minimum.

- (3) The Contractor shall perform database consistency check and database backup and review the execution log to determine whether the backup database is sufficient to ensure a proper database recovery.
- (4) The Contractor shall perform database administration activities to create databases, tables, indexes, and stored procedures. In addition, the Contractor will add ASE log-in IDs, database groups, database users, and grant group and users permissions.
- (5) The Contractor shall apply EBF and/or updated software release (SWR) to the Sybase and Microsoft SQL Server environments.
- (6) The Contractor shall install and/or upgrade Sybase ASE releases to the Sybase environment and Microsoft SQL Server releases to the MS SQL Server environment.
- (7) The Contractor shall install and/or upgrade Sybase Replication Server to the Sybase Replication Server environment.
- (8) The Contractor shall integrate Docs Open databases and/or software into the Sybase ASE with instructions from the application development contractor.
- (9) The Contractor shall work with the application development staff to perform database and software migration from the development to the test and acceptance to the production environment for enhancements to existing applications and for deployment of new applications.
- (10) The Contractor shall support databases in the production environment for client server applications.
- (11) The Contractor shall support databases in the development, as well as in the test & acceptance, environment, including databases which are developed in-house or off-the-shelf purchased computer databases.
- (12) The Contractor shall test and verify the connectivity between the new releases of Sybase Open Client, the MS SQL DB-Lib, and ODBC to the Sybase ASE and the Microsoft SQL Server from the client workstation applications to determine the software upgrade validity.
- (13) The Contractor shall perform emergency problem source identification and resolution.
- (14) The Contractor shall perform hardware capacity planning and upgrade based on additional system requirements.
- (15) The Contractor shall perform specific services upon request which are to be determined at times of impact.

**Task Order 11      Database Administration**

- (16) The Contractor shall maintain and keep the information up-to-date for all server binders which contain information related to each RS/6000 computer, SUN computer, Sybase ASE, Microsoft SQL Server, and databases residing in the Sybase ASE and Microsoft SQL Server.
- (17) The Contractor shall review current database support documentation and shall document the database administration functions which are not yet documented in a format that other database administrators will be able to follow and perform the task.
- (18) The Contractor shall work with OIS/ICOD staff and its contractor to ensure that the RS/6000 AIX Operating System, the SUN OS, and the Windows OS standards set by OIS/ICOD are followed, the interrelationship between AIX, SUN OS, Windows OS, Sybase and Microsoft SQL Server database administration support is coherent, and the standards set by the OIS Client Server and 3Tier Committees will be followed.
- (19) The Contractor shall complete emergency work within 2 hours of notification, unless a longer time is approved by the NRC TOM. Non-emergency work shall be completed within 3 days of notification, unless a longer time is approved by the NRC TOM.
- (20) The Contractor shall participate in the task of upgrading the workstation Open/Client software from version 12.0 to version 15.x.
- (21) The Contractor shall assist application developers with table design and writing efficient stored procedures. The Contractor shall perform SQL queries performance tuning for users and application developers with the approval from the NRC TOM.
- (22) The Contractor shall upgrade the Sybase ASE from release 12 to release 12.5, and the Sybase Replication Server from release 12 to release 12.5. The Contractor shall develop an Upgrade Action Plan and modify server document binders to reflect the server's new configuration.
- (23) The Contractor shall document and support the HRMS/RPS/RITS interface 3 program.
- (24) The Contractor shall assist in determining the best tools to use in supporting the ASE and Microsoft SQL Server environment based on the available software in the NRC toolkit.
- (25) The Contractor shall assist with performing testing of new database software and tools that may be recommended for inclusion in the NRC Toolkit. The test finding shall be documented in the format required for submission to the NRC toolkit for approval.
- (26) The Contractor shall write the installation/administration/operations documentation for the ASE and MS SQL Server. The Contractor shall develop a

## **Task Order 11      Database Administration**

template to be used for the database administration support document. All documents shall be prepared using the current agency's word processing software, which at the time this task order was written is MS Word 2003.

- (27) Upon request, the Contractor shall prepare and present oral briefings on the progress of work, unique or interesting technical findings, results of research, and presentation of draft conclusions or reports.
- (28) The Contractor shall work with OIS/BPIAD staff to maintain web based applications including but not limited to ColdFusion applications. The Contractor shall provide ColdFusion server administration, apply patches when required and monitor server to ensure optimal service level.
- (29) The Contractor shall administer the IT portfolio management system in Prosigt. The Contractor shall install and test software updates; configure the system; monitor system performance; perform standard application maintenance activities; execute basic application integration tasks; troubleshoot and analyze emergent performance problems; manage user access accounts; configure user data, and form security settings; create user training and reference materials; and provide help desk support and hands-on assistance for users.
- (30) The Contractor shall deploy enhancements and/or fixes to EDATS test platform and perform the testing. Once accepted, will deploy the enhancement and/or fixes to EDATS production platform.
- (31) The Contractor shall perform EDATS administrative tasks. These tasks include managing user accounts and groups, developing training materials, conducting training sessions, assisting users, updating POA\$M, modifying Officer views, documenting Flows, working with EDATS project team and users to resolve processes before passing off the issues to the developer contractors, developing reports, and other ad-hoc tasks.
- (32) The contractor shall perform troubleshooting to the EDATS by working with other divisions or other contractors for solving OS or network related issues, working with the software vendor to resolve software issues, and fixing tickets that may be stuck in the workflow; this may require troubleshooting with the development contractor.
- (33) The contractor shall perform Rational Servers and Client/Server software administration functions such as software upgrade, testing, and support to the developers at the contractor facility.
- (34) Centralized environment/Environment Administration support. See Attachment A.

On the newly developed 3Tier platform, tasks to be performed under this SOW shall be on the development platform only, unless it is directed by the NRC TOM.

### **D. Client Server Hardware/Software Platform**

**Task Order 11****Database Administration**

- (1) Hardware: IBM RS/6000, models H70, H80, P660, 595, 591, 590, 580, 570, 390, 370, and 360. All servers are running AIX 5.x.
- (2) Hardware: Sun models 5500, 3500, 450, and E220R. The Sun OS is Solaris 2.8.
- (3) Hardware: Dell 26 or Del 28 series. The Windows OS is W2K or Windows 2003.
- (4) Software: Microsoft SQL Enterprise Manager, release 8.0
- (5) Software: Sybase ASE, release 12.5, 15.x
- (6) Software: Sybase Replication Server, release 12.5, 15.x
- (7) Software: SQR Enterprise for IBM AIX
- (8) Software: PeopleSoft bundle software for Sun OS
- (9) Software: ColdFusion MX
- (10) Development software: PowerBuilder, ColdFusion bundle, Visual Basic, Delphi, Docs Open, MS Access, SQR Enterprise
- (11) CASE software: ERwin.
- (12) Client workstation: 486/33 MHZ or better workstation with a minimum of 128 MB of RAM and 20 GB hard disk
- (13) Client O/S software: Windows XP.
- (14) Client application software: PowerBuilder, Visual Basic, Delphi, Docs Open, MS Access, Peoplesoft
- (15) LAN: Novell Netware 6.x supporting multiple concurrent protocols, including TCP/IP and IPX/SPX
- (16) Software: Primavera Prosight; MS Project Server
- (17) Software: HandySoft BizFlow

**E. Training**

The Contractor shall provide NRC Database Administrator training during implementation of revisions, as well as follow-on Database Administrator training as necessary (in conjunction with system software upgrades, hardware changes) to ensure the ability of NRC database administrators to administer the revised systems. The Contractor shall provide any training necessary for major revisions to web based applications associated with major revisions in the application.

**F. Expertise/Skills**

The Contractor shall provide two people on site to support the NRC's database administration functions. The normal working hours for this delivery order are from 7 AM to 7 PM. When required and needed, database administration functions will be performed outside the normal 7 AM to 7 PM workdays and/or on the weekends. The Contractor shall provide 1 person off site to support web application maintenance, and 1 person off site to support the portfolio management system.

The Contractor shall provide personnel with the following skills/experiences:

- (1) Demonstrated ability to perform problem source identification and resolution
- (2) Excellent communications and interpersonal skills
- (3) Competency in writing user and technical documentation, as demonstrated through prior assignments, using the supported software of choice for the documentation, WordPerfect 10
- (4) Demonstrated ability to revise/enhance client server solutions, including hardware, software, and communications
- (5) Demonstrated ability to maintain an enterprise client server and n-tier database environment
- (6) Knowledge of Unix, RS/6000 AIX, Sun Solaris, Windows XP, Windows 2000 and 2003, and TCP/IP
- (7) Knowledge of CASE technology (ERwin)
- (8) Knowledge of Structured Query Language (SQL), DML/DDDL, and Transact-SQL
- (9) Knowledge of C, Unix scripts, SQR Enterprise, PowerBuilder, Visual Basic, Delphi, MS Access, Open Client, and ODBC software
- (10) Knowledge of Sybase ASE, Sybase Replication Server, and MS SQL Server, including, preferably, a Sybase Certified Professional on ASE 12.x and MS SQL Server Certified Professional on 8.x
- (11) Knowledge of client server connectivity through LAN, TCP/IP, Open Client, and ODBC.
- (12) Knowledge of ColdFusion, FLEX, FuseBox, Java, HTML, DHTML, XML, and Dreamweaver.
- (13) Knowledge of Primavera Prosight.

**Task Order 11      Database Administration**

(14) Knowledge of HandySoft BizFlow

**G. Reporting Requirements**

It is anticipated that the NRC will conduct one meeting every 2 weeks with the Contractor personnel. The meetings will be conducted at the NRC's Rockville, Maryland, offices. No other unique reporting is required which exceeds that which would be presented in the Bi-weekly Status Report.

For a specific assignment with start and end dates, the Contractor shall submit a detailed Project Management Plan. The plan will show tasking, milestones, staff assigned, and the projected number of hours estimated to complete each task.

**H. Place of Performance**

The Contractor shall primarily perform work on site at NRC Headquarters for database administration support, while the web-based application and portfolio management support shall be off site.

**I. Task Order Manager**

The manager for this task order is Tu T. Tran, (301) 415-7119.

**J. Travel**

As part of Section E, entitled Training, one contractor shall travel to Region 4 to provide a one-day training course to the regional employees. The travel shall take place November 17 to November 19, 2009.