

1. REQUISITION NUMBER
 MMA-PR5207-20120141

PAGE OF
 1 18

2. CONTRACT NO.
 DTMA-91-C-2012-0013

3. AWARD/
 EFFECTIVE DATE
 07/24/2012

4. ORDER NUMBER

5. SOLICITATION NUMBER
 DTMA-91-R-2012-0014

6. SOLICITATION
 ISSUE DATE
 06/26/2012

7. FOR SOLICITATION
 INFORMATION CALL:

a. NAME
 Don Coonan

b. TELEPHONE NUMBER
 202-366-1737

8. OFFER DUE DATE/LOCAL TIME
 ET

9. ISSUED BY
 CODE 00091
 U.S. DOT/ Maritime Administration
 Office of Acquisition MAR-380
 1200 NEW JERSEY AVENUE SE
 MAIL STOP W-28-201
 WASHINGTON DC 20590-0001

10. THIS ACQUISITION IS UNRESTRICTED OR SET ASIDE: % FOR:
 SMALL BUSINESS
 HUBZONE SMALL BUSINESS
 SERVICE-DISABLED VETERAN-OWNED SMALL BUSINESS
 WOMEN-OWNED SMALL BUSINESS (WOSB) ELIGIBLE UNDER THE WOMEN-OWNED SMALL BUSINESS PROGRAM
 ECONOMICALLY DISADVANTAGED WOMEN-OWNED SMALL BUSINESS (EDWOSB)
 8(A)
 NAICS: 541350
 SIZE STANDARD: \$6.50

11. DELIVERY FOR FOB DESTINATION UNLESS BLOCK IS MARKED
 SEE SCHEDULE

12. DISCOUNT TERMS

13a. THIS CONTRACT IS A RATED ORDER UNDER DPAS (15 CFR 700)

13b. RATING
 14. METHOD OF SOLICITATION
 RFQ IFB RFP

15. DELIVER TO
 CODE
 U.S. DOT / Maritime Administration
 Office of Acquisition
 MAR-380
 1200 New Jersey Ave. SE.
 Mail stop W-28-201
 Washington DC 20590

16. ADMINISTERED BY
 CODE 00091
 U.S. DOT/Maritime Administration
 Office of Acquisition
 MAR-380
 1200 New Jersey Avenue, SE
 Mail Stop W-28-201
 Washington DC 20590-0001

17a. CONTRACTOR/ OFFEROR
 CODE 177856908
 FACILITY CODE
 SJH ENGINEERING PC
 Attn: S.JAYAKUMARAN, PH.D., P.E.
 26 JEFFERSON PLZ
 PRINCETON NJ 08540-9542
 TELEPHONE NO. 732-329-0500

18a. PAYMENT WILL BE MADE BY
 CODE AMZ-160 - EMAIL
 MARAD A/P INVOICES
 MARADinvoices@faa.gov

17b. CHECK IF REMITTANCE IS DIFFERENT AND PUT SUCH ADDRESS IN OFFER

18b. SUBMIT INVOICES TO ADDRESS SHOWN IN BLOCK 18a UNLESS BLOCK BELOW IS CHECKED SEE ADDENDUM

19. ITEM NO.	20. SCHEDULE OF SUPPLIES/SERVICES	21. QUANTITY	22. UNIT	23. UNIT PRICE	24. AMOUNT
0001	Building Evaluation Report for United States Merchant Marine Academy. Technical Point of Contact (POC) at the USMMA Rick Campbell and John McCormick. Delivery: 09/30/2012 Period of Performance: 07/23/2012 to 09/30/2012 Building Evaluation Report for United States Merchant Marine Academy. See Statement of Work Continued ... (Use Reverse and/or Attach Additional Sheets as Necessary)				624,800.00

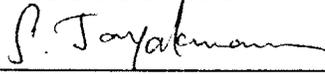
25. ACCOUNTING AND APPROPRIATION DATA
 70121750HQ.2012.10PEDOE300.0000130001.2530561006600

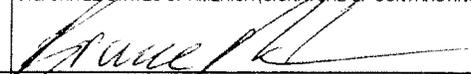
26. TOTAL AWARD AMOUNT (For Govt. Use Only)
 \$624,800.00

27a. SOLICITATION INCORPORATES BY REFERENCE FAR 52.212-1, 52.212-4, FAR 52.212-3 AND 52.212-5 ARE ATTACHED. ADDENDA ARE ARE NOT ATTACHED.
 27b. CONTRACT/PURCHASE ORDER INCORPORATES BY REFERENCE FAR 52.212-4, FAR 52.212-5 IS ATTACHED. ADDENDA ARE ARE NOT ATTACHED.

28. CONTRACTOR IS REQUIRED TO SIGN THIS DOCUMENT AND RETURN 1 COPIES TO ISSUING OFFICE. CONTRACTOR AGREES TO FURNISH AND DELIVER ALL ITEMS SET FORTH OR OTHERWISE IDENTIFIED ABOVE AND ON ANY ADDITIONAL SHEETS SUBJECT TO THE TERMS AND CONDITIONS SPECIFIED.

29. AWARD OF CONTRACT: REF. OFFER DATED YOUR OFFER ON SOLICITATION (BLOCK 5), INCLUDING ANY ADDITIONS OR CHANGES WHICH ARE SET FORTH HEREIN, IS ACCEPTED AS TO ITEMS:

30a. SIGNATURE OF OFFEROR/CONTRACTOR


31a. UNITED STATES OF AMERICA (SIGNATURE OF CONTRACTING OFFICER)


30b. NAME AND TITLE OF SIGNER (Type or print)
 S. Jayakumaran, Principal

30c. DATE SIGNED
 7/24/2012

31b. NAME OF CONTRACTING OFFICER (Type or print)
 Bruce Markman

31c. DATE SIGNED
 7/24/2012

19. ITEM NO.	20. SCHEDULE OF SUPPLIES/SERVICES	21. QUANTITY	22. UNIT	23. UNIT PRICE	24. AMOUNT
	<p>for more information.</p> <p>Obligated Amount: \$624,800.00</p> <p>The total amount of award: \$624,800.00. The obligation for this award is shown in bo 26.</p>				

32a. QUANTITY IN COLUMN 21 HAS BEEN

RECEIVED INSPECTED ACCEPTED, AND CONFORMS TO THE CONTRACT, EXCEPT AS NOTED: _____

32b. SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE	32c. DATE	32d. PRINTED NAME AND TITLE OF AUTHORIZED GOVERNMENT REPRESENTATIVE
--	-----------	---

32e. MAILING ADDRESS OF AUTHORIZED GOVERNMENT REPRESENTATIVE	32f. TELEPHONE NUMBER OF AUTHORIZED GOVERNMENT REPRESENTATIVE
	32g. E-MAIL OF AUTHORIZED GOVERNMENT REPRESENTATIVE

33. SHIP NUMBER <input type="checkbox"/> PARTIAL <input type="checkbox"/> FINAL	34. VOUCHER NUMBER	35. AMOUNT VERIFIED CORRECT FOR	36. PAYMENT <input type="checkbox"/> COMPLETE <input type="checkbox"/> PARTIAL <input type="checkbox"/> FINAL	37. CHECK NUMBER
--	--------------------	---------------------------------	--	------------------

38. S/R ACCOUNT NUMBER	39. S/R VOUCHER NUMBER	40. PAID BY
------------------------	------------------------	-------------

41a. I CERTIFY THIS ACCOUNT IS CORRECT AND PROPER FOR PAYMENT	42a. RECEIVED BY (<i>Print</i>)	
41b. SIGNATURE AND TITLE OF CERTIFYING OFFICER	41c. DATE	42b. RECEIVED AT (<i>Location</i>)
		42c. DATE REC'D (<i>YY/MM/DD</i>)
		42d. TOTAL CONTAINERS

Section C Contract Clauses..... 1

52.212-4 Contract Terms and Conditions - Commercial Items. (JUN 2010) 1

52.212-5 Contract Terms and Conditions Required to Implement Statutes or Executive Orders - Commercial Items. (JAN 2012)..... 1

52.219-11 Special 8(a) Contract Conditions. (FEB 1990)..... 1

52.225-25 Prohibition on Contracting with Entities Engaging in Sanctioned Activities Relating to Iran--Representation and Certification. (NOV 2011)..... 1

52.227-17 Rights in Data--Special Works. (DEC 2007)..... 1

52.232-10 Payments under Fixed-Price Architect-Engineer Contracts. (APR 2010). 1

52.236-23 Responsibility of the Architect-Engineer Contractor. (APR 1984) 1

52.236-24 Work Oversight in Architect-Engineer Contracts. (APR 1984) 1

52.236-25 Requirements for Registration of Designers. (JUN 2003)..... 1

Section D Any Contract Documents, Exhibits or Attachments..... 8

STATEMENT OF WORK..... 9

Section C - Contract Clauses

52.212-4 Contract Terms and Conditions - Commercial Items. (JUN 2010)

52.219-11 Special 8(a) Contract Conditions. (FEB 1990)

52.225-25 Prohibition on Contracting with Entities Engaging in Sanctioned Activities Relating to Iran--Representation and Certification. (NOV 2011)

52.227-17 Rights in Data--Special Works. (DEC 2007)

52.232-10 Payments under Fixed-Price Architect-Engineer Contracts. (APR 2010)

52.236-23 Responsibility of the Architect-Engineer Contractor. (APR 1984)

52.236-24 Work Oversight in Architect-Engineer Contracts. (APR 1984)

52.236-25 Requirements for Registration of Designers. (JUN 2003)

52.212-5 Contract Terms and Conditions Required to Implement Statutes or Executive Orders - Commercial Items. (JAN 2012)

(a) The Contractor shall comply with the following Federal Acquisition Regulation (FAR) clauses, which are incorporated in this contract by reference, to implement provisions of law or Executive orders applicable to acquisitions of commercial items:

- (1) 52.222-50, Combating Trafficking in Persons (FEB 2009) (22 U.S.C.

7104(g)).

Alternate I (Aug 2007) of 52.222-50 (22 U.S.C. 7104(g)).

(2) 52.233-3, Protest After Award (AUG 1996) (31 U.S.C. 3553).

(3) 52.233-4, Applicable Law for Breach of Contract Claim (OCT 2004) (Pub. L. 108-77, 108-78).

(b) The Contractor shall comply with the FAR clauses in this paragraph (b) that the Contracting Officer has indicated as being incorporated in this contract by reference to implement provisions of law or Executive orders applicable to acquisitions of commercial items: Contracting Officer check as appropriate.

(1) 52.203-6, Restrictions on Subcontractor Sales to the Government (SEP 2006), with Alternate I (OCT 1995) (41 U.S.C. 253g and 10 U.S.C. 2402).

(2) 52.203-13, Contractor Code of Business Ethics and Conduct (APR 2010)(Pub. L. 110-252, Title VI, Chapter 1 (41 U.S.C. 251 note)).

(3) 52.203-15, Whistleblower Protections under the American Recovery and Reinvestment Act of 2009 (JUN 2010) (Section 1553 of Pub. L. 111-5). (Applies to contracts funded by the American Recovery and Reinvestment Act of 2009.)

(4) 52.204-10, Reporting Executive Compensation and First-Tier Subcontract Awards (JUL 2010) (Pub. L. 109-282)(31 U.S.C. 6101 note).

(5) 52.204-11, American Recovery and Reinvestment Act--Reporting Requirements (JUL 2010) (Pub. L. 111-5).

(6) 52.209-6, Protecting the Government's Interest When Subcontracting with Contractors Debarred, Suspended, or Proposed for Debarment (DEC 2010) (31 U.S.C. 6101 note).

(7) 52.209-9, Updates of Publicly Available Information Regarding Responsibility Matters (JAN 2012) (41 U.S.C. 2313).

(8) 52.209-10, Prohibition on Contracting with Inverted Domestic Corporations (section 740 of Division C of Public Law 111-117, section 743 of Division D of Public Law 111-8, and section 745 of Division D of Public Law 110-161)

(9) 52.219-3, Notice of HUBZone Set-Aside or Sole-Source Award (NOV 2011) (15 U.S.C. 657a).

(10) 52.219-4, Notice of Price Evaluation Preference for HUBZone Small Business Concerns (JAN 2011) (if the offeror elects to waive the preference, it

shall so indicate in its offer) (15 U.S.C. 657a).

(11) (Reserved)

(12)(i) 52.219-6, Notice of Total Small Business Set-Aside (NOV 2011) (15 U.S.C. 644).

(ii) Alternate I (NOV 2011).

(iii) Alternate II (NOV 2011).

(13)(i) 52.219-7, Notice of Partial Small Business Set-Aside (JUN 2003) (15 U.S.C. 644).

(ii) Alternate I (OCT 1995) of 52.219-7.

(iii) Alternate II (MAR 2004) of 52.219-7.

(14) 52.219-8, Utilization of Small Business Concerns (JAN 2011) (15 U.S.C. 637 (d)(2) and (3)).

(15)(i) 52.219-9, Small Business Subcontracting Plan (JAN 2011) (15 U.S.C. 637(d)(4)).

(ii) Alternate I (OCT 2001) of 52.219-9.

(iii) Alternate II (OCT 2001) of 52.219-9.

(iv) Alternate III (JUL 2010) of 52.219-9.

(16) 52.219-13, Notice of Set-Aside of Orders (NOV 2011) (15 U.S.C. 644(r)).

(17) 52.219-14, Limitations on Subcontracting (NOV 2011) (15 U.S.C. 637(a)(14)).

(18) 52.219-16, Liquidated Damages--Subcontracting Plan (JAN 1999) (15 U.S.C. 637(d)(4)(F)(i)).

(19)(i) 52.219-23, Notice of Price Evaluation Adjustment for Small Disadvantaged Business Concerns (OCT 2008) (10 U.S.C. 2323)(if the offeror elects to waive the adjustment, it shall so indicate in its offer.)

(ii) Alternate I (JUN 2003) of 52.219-23.

(20) 52.219-25, Small Disadvantaged Business Participation Program--Disadvantaged Status and Reporting (DEC 2010) (Pub. L. 103-355, section 7102,

and 10 U.S.C. 2323).

[](21) 52.219-26, Small Disadvantaged Business Participation Program-- Incentive Subcontracting (OCT 2000) (Pub. L. 103-355, section 7102, and 10 U.S.C. 2323).

[](22) 52.219-27, Notice of Service-Disabled Veteran-Owned Small Business Set-Aside (NOV 2011) (15 U.S.C. 657f).

[](23) 52.219-28, Post Award Small Business Program Representation (APR 2009) (15 U.S.C. 632(a)(2)).

[](24) 52.219-29, Notice of Set-Aside for Economically Disadvantaged Women-Owned Small Business Concerns (NOV 2011).

[](25) 52.219-30, Notice of Set-Aside for Women-Owned Small Business Concerns Eligible Under the Women-Owned Small Business Program (NOV 2011).

[X](26) 52.222-3, Convict Labor (JUN 2003) (E.O. 11755).

[X](27) 52.222-19, Child Labor--Cooperation with Authorities and Remedies (JUL 2010) (E.O. 13126).

[X](28) 52.222-21, Prohibition of Segregated Facilities (FEB 1999).

[X](29) 52.222-26, Equal Opportunity (MAR 2007) (E.O. 11246).

[](30) 52.222-35, Equal Opportunity for Veterans (SEP 2010) (38 U.S.C. 4212).

[X](31) 52.222-36, Affirmative Action for Workers with Disabilities (OCT 2010) (29 U.S.C. 793).

[](32) 52.222-37, Employment Reports on Veterans (SEP 2010) (38 U.S.C. 4212).

[](33) 52.222-40, Notification of Employee Rights Under the National Labor Relations Act (DEC 2010) (E.O. 13496).

[X](34) 52.222-54, Employment Eligibility Verification (JAN 2009). (Executive Order 12989). (Not applicable to the acquisition of commercially available off-the-shelf items or certain other types of commercial items as prescribed in 22.1803.)

[](35)(i) 52.223-9, Estimate of Percentage of Recovered Material Content for EPA-Designated Items (MAY 2008) (42 U.S.C. 6962(c)(3)(A)(ii)). (Not

applicable to the acquisition of commercially available off-the-shelf items.)

(ii) Alternate I (MAY 2008) of 52.223-9 (42 U.S.C. 6962(i)(2)(C)). (Not applicable to the acquisition of commercially available off-the-shelf items.)

(36) 52.223-15, Energy Efficiency in Energy-Consuming Products (DEC 2007) (42 U.S.C. 8259b).

(37)(i) 52.223-16, IEEE 1680 Standard for the Environmental Assessment of Personal Computer Products (DEC 2007) (E.O. 13423).

(ii) Alternate I (DEC 2007) of 52.223-16.

(38) 52.223-18, Encouraging Contractor Policies to Ban Text Messaging While Driving (AUG 2011). (E.O. 13513).

(39) 52.225-1, Buy American Act - Supplies (FEB 2009) (41 U.S.C. 10a-10d).

(40)(i) 52.225-3, Buy American Act--Free Trade Agreements--Israeli Trade Act (JUN 2009) (41 U.S.C. 10a-10d, 19 U.S.C. 3301 note, 19 U.S.C. 2112 note, 19 U.S.C. 3805 note, Pub. L. 108-77, 108-78, 108-286, 108-302, 109-53, 109-169, 109-283, and 110-138).

(ii) Alternate I (JAN 2004) of 52.225-3.

(iii) Alternate II (JAN 2004) of 52.225-3.

(41) 52.225-5, Trade Agreements (NOV 2011) (19 U.S.C. 2501, et seq., 19 U.S.C. 3301 note).

(42) 52.225-13, Restrictions on Certain Foreign Purchases (JUN 2008) (E.O.'s, proclamations, and statutes administered by the Office of Foreign Assets Control of the Department of the Treasury).

(43) 52.226-4, Notice of Disaster or Emergency Area Set-Aside (NOV 2007) (42 U.S.C. 5150).

(44) 52.226-5, Restrictions on Subcontracting Outside Disaster or Emergency Area (NOV 2007) (42 U.S.C. 5150).

(45) 52.232-29, Terms for Financing of Purchases of Commercial Items (FEB 2002) (41 U.S.C. 255(f), 10 U.S.C. 2307(f)).

(46) 52.232-30, Installment Payments for Commercial Items (OCT 1995) (41 U.S.C. 255(f), 10 U.S.C. 2307(f)).

(47) 52.232-33, Payment by Electronic Funds Transfer - Central Contractor Registration (OCT 2003) (31 U.S.C. 3332).

(48) 52.232-34, Payment by Electronic Funds Transfer - Other than Central Contractor Registration (MAY 1999) (31 U.S.C. 3332).

(49) 52.232-36, Payment by Third Party (FEB 2010) (31 U.S.C. 3332).

(50) 52.239-1, Privacy or Security Safeguards (AUG 1996) (5 U.S.C. 552a).

(51)(i) 52.247-64, Preference for Privately Owned U.S.-Flag Commercial Vessels (FEB 2006) (46 U.S.C. Appx 1241(b) and 10 U.S.C. 2631).

(ii) Alternate I (APR 2003) of 52.247-64.

(c) The Contractor shall comply with the FAR clauses in this paragraph (c), applicable to commercial services, that the Contracting Officer has indicated as being incorporated in this contract by reference to implement provisions of law or Executive orders applicable to acquisitions of commercial items: (Contracting Officer check as appropriate.)

(1) 52.222-41, Service Contract Act of 1965 (NOV 2007) (41 U.S.C. 351, et seq.). WD 05-2373 (Rev.-12) or later.

(2) 52.222-42, Statement of Equivalent Rates for Federal Hires (MAY 1989) (29 U.S.C. 206 and 41 U.S.C. 351, et seq.).

(3) 52.222-43, Fair Labor Standards Act and Service Contract Act--Price Adjustment (Multiple Year and Option Contracts) (SEP 2009) (29 U.S.C. 206 and 41 U.S.C. 351, et seq.).

(4) 52.222-44, Fair Labor Standards Act and Service Contract Act--Price Adjustment (SEP 2009) (29 U.S.C. 206 and 41 U.S.C. 351, et seq.).

(5) 52.222-51, Exemption from Application of the Service Contract Act to Contracts for Maintenance, Calibration, or Repair of Certain Equipment--Requirements (NOV 2007) (41 U.S.C. 351, et seq.).

(6) 52.222-53, Exemption from Application of the Service Contract Act to Contracts for Certain Services--Requirements (FEB 2009) (41 U.S.C. 351, et seq.).

(7) 52.226-6, Promoting Excess Food Donation to Nonprofit Organizations. (MAR 2009) (Pub. L. 110-247).

(8) 52.237-11, Accepting and Dispensing of \$1 Coin (SEP 2008) (31 U.S.C.

5112(p)(1)).

(d) *Comptroller General Examination of Record.* The Contractor shall comply with the provisions of this paragraph (d) if this contract was awarded using other than sealed bid, is in excess of the simplified acquisition threshold, and does not contain the clause at 52.215-2, Audit and Records - Negotiation.

(1) The Comptroller General of the United States, or an authorized representative of the Comptroller General, shall have access to and right to examine any of the Contractor's directly pertinent records involving transactions related to this contract.

(2) The Contractor shall make available at its offices at all reasonable times the records, materials, and other evidence for examination, audit, or reproduction, until 3 years after final payment under this contract or for any shorter period specified in FAR Subpart 4.7, Contractor Records Retention, of the other clauses of this contract. If this contract is completely or partially terminated, the records relating to the work terminated shall be made available for 3 years after any resulting final termination settlement. Records relating to appeals under the disputes clause or to litigation or the settlement of claims arising under or relating to this contract shall be made available until such appeals, litigation, or claims are finally resolved.

(3) As used in this clause, records include books, documents, accounting procedures and practices, and other data, regardless of type and regardless of form. This does not require the Contractor to create or maintain any record that the Contractor does not maintain in the ordinary course of business or pursuant to a provision of law.

(e)(1) Notwithstanding the requirements of the clauses in paragraphs (a), (b), (c), and (d) of this clause, the Contractor is not required to flow down any FAR clause, other than those in this paragraph (e)(1) in a subcontract for commercial items. Unless otherwise indicated below, the extent of the flow down shall be as required by the clause--

(i) 52.203-13, Contractor Code of Business Ethics and Conduct (APR 2010) (Pub. L. 110-252, Title VI, Chapter 1 (41 U.S.C. 251 note)).

(ii) 52.219-8, Utilization of Small Business Concerns (DEC 2010) (15 U.S.C. 637(d)(2) and (3)), in all subcontracts that offer further subcontracting opportunities. If the subcontract (except subcontracts to small business concerns) exceeds \$650,000 (\$1.5 million for construction of any public facility), the subcontractor must include 52.219-8 in lower tier subcontracts that offer subcontracting opportunities.

(iii) (Reserved)

- (iv) 52.222-26, Equal Opportunity (MAR 2007) (E.O. 11246).
- (v) 52.222-35, Equal Opportunity for Veterans (SEP 2010) (38 U.S.C. 4212).
- (vi) 52.222-36, Affirmative Action for Workers with Disabilities (OCT 2010) (29 U.S.C. 793).
- (vii) 52.222-40, Notification of Employee Rights Under the National Labor Relations Act (DEC 2010) (E.O. 13496). Flow down required in accordance with paragraph (f) of FAR clause 52.222-40.
- (viii) 52.222-41, Service Contract Act of 1965 (NOV 2007) (41 U.S.C. 351, et seq.).
- (ix) 52.222-50, Combating Trafficking in Persons (FEB 2009) (22 U.S.C. 7104(g)).
- Alternate I (AUG 2007) of 52.222-50 (22 U.S.C. 7104(g)).
- (x) 52.222-51, Exemption from Application of the Service Contract Act to Contracts for Maintenance, Calibration, or Repair of Certain Equipment--Requirements (NOV 2007) (41 U.S.C. 351, et seq.).
- (xi) 52.222-53, Exemption from Application of the Service Contract Act to Contracts for Certain Services-Requirements (FEB 2009)(41 U.S.C. 351, et seq.).
- (xii) 52.222-54, Employment Eligibility Verification (JAN 2009).
- (xiii) 52.226-6, Promoting Excess Food Donation to Nonprofit Organizations. (MAR 2009) (Pub. L. 110-247). Flow down required in accordance with paragraph (e) of FAR clause 52.226-6.
- (xiv) 52.247-64, Preference for Privately Owned U.S.-Flag Commercial Vessels (FEB 2006) (46 U.S.C. Appx 1241(b) and 10 U.S.C. 2631). Flow down required in accordance with paragraph (d) of FAR clause 52.247-64.

(2) While not required, the contractor may include in its subcontracts for commercial items a minimal number of additional clauses necessary to satisfy its contractual obligations.

(End of clause)

Section D - Any Contract Documents, Exhibits or Attachments

STATEMENT OF WORK

Title: BUILDING EVALUATION REPORT (BER)

Location: United States Merchant Marine Academy, (USMMA)

OBJECTIVE:

To provide a complete and thorough inspection of multiple and specifically identified buildings that make up the USMMA Campus (exterior and interior), grounds abutting the building, components, and existing building operational support systems for this facility. This is in order to record the results in a web-based Building Evaluation Reporting application software, including identifying deficiencies and providing proposed remedies along with associated methods of implementation and cost estimates of the work.

The BER will be used in support of Repair and Alteration (R&A), Major Renovations and New Construction projects required to ensure the short-term [through 5 years) operational continuity of the buildings. Also, to plan for long-term (6 through 20 years), major capital reinvestment in the buildings for long-term utilization.

The Building Evaluation Report (BER) will be complete with building code analysis, cost estimates, schematic plans, key plans and photographs that will enable the Government to plan and budget work required to maintain the satisfactory operation and appearance of the building.

The Requirement Template that is included shall be utilized, or similar document containing all the elements in the template.

SPECIAL CONSIDERATIONS:

Coordination: All survey, investigative and inspection work on site must be coordinated and scheduled through:

Rick Campbell or John McCormick.

Procedures described herein are for the accomplishment of an Assessment Team, and preparation of the BER in accordance with all supplemental policy documents referenced in this work order. In conducting the necessary research and analysis of the Campus required for this BER, the Assessment Team shall be required to identify, collect and analyze data from the U.S. Department of Transportation (DOT), U.S. Maritime Administration (MARAD) and from direct observations of the building complex relating to the building and local conditions in order to provide a comprehensive list of deficiencies including building code violations with all information as shown on the template. The contractor will be provided with previous report(s) for purposes of their report.

The Maritime Administration has no preference in regards to software. The vendor will propose software that achieves the following:

The Assessment Team shall enter all data using a professional software platform utilizing proper

Capital Planning, Asset Management and Facility Assessment tools and techniques. This software and its data shall be fully accessible to MARAD with all software rights and privileges. DOT/MARAD will need full functionality and unfettered access to the software. The server will be provided and administered by the MARAD IT department. The software shall be compliant with Federal Government IT regulations. Previous specifications for a particular software program should not be interpreted as a preference over any other software program. It is MARAD's goal to receive recommendations as to the best practices the facility software industry.

Assessment Team: The vendor shall provide an Assessment Team of experienced NYS licensed professional engineers and registered architects of the required disciplines (as listed in Attachment, Synopsis). Each team member other than the Fire Protection Engineer (FPE) shall have a minimum of 15 years of experience in the building industry, with a college degree in engineering, architecture or related field. The team also shall have a minimum of five years of experience in providing property condition assessments.

The licensed FPE in NYS shall possess at least a B.S. in Fire Protection Engineering or mechanical engineering with at least five consecutive years of experience in fire protection engineering work within the past 10 years. Proposed personnel should demonstrate that they have acted in charge of fire protection engineering designs involving all aspects of fire protection. This includes design of wet, dry, pre-action, and deluge sprinkler systems. It also includes design of hard-wired and multiplex/addressable fire alarm systems and wet and dry chemical extinguishing systems. Personnel must also demonstrate that they have performed hydraulic calculations on at least 20 buildings with automatic sprinkler systems, and have performed hydraulic calculations which determine the size and selection of automatic fire pumps. Personnel must demonstrate at least 3 years of experience testing and troubleshooting for those systems listed above. Resumes should also demonstrate thorough working knowledge and formal training in fire protection codes and standards, especially the latest edition of NFPA 101, Life Safety Code and the New York State Building Code. All fire protection engineering work will be reviewed and approved by a Registered Fire Protection Professional Engineer who works for the contractor.

The Assessment Team may include members with less than five years assessment experience provided they are led by another team member in the same discipline with the necessary minimum five years of experience. At least one member of the Assessment Team shall have Certification in the software recommended by the vendor if available. If certification is not available the vendor will provide an individual with advanced competence in the software and training. The vendor will provide training to MARAD staff in the recommended software or arrange for training by the software developer or the developer's recommend training provider. Also, one member of the team shall be LEED AP certified and fully competent in Federal Energy Management Plan (FEMP) Policies and technologies. In all cases of divergence between FEMP and LEED standards or policy, FEMP shall always take precedence.

All personnel and their qualifications must be submitted to the DOT COR for approval. The qualifications should include at least 3 professional references for similar projects and facilities. The COR has final approval of personnel prior to them working in performing surveys. Requests

for substitution of personnel must be made a minimum of two weeks prior to the site visit. However, substitute personnel are expected to have like experience, education and knowledge to the person who was originally proposed. Substitute personnel are required to meet the same standards as those originally proposed.

Consideration must be given to the latest version of the following documents:

- Referenced Executive Order or Public Law (P.L.)
- PBS-PI00, Facility Standards for the Public Buildings Service
- Americans with Disabilities and Architectural Barriers Act Accessibility Guidelines
- Energy Policy Act 2005 (EPACT 2005) (P.L. 109-58)
- Executive Order (E.O.) 13423 Strengthening Federal Environmental, Energy, and

Transportation Management

Energy Independence and Security Act of 2007(EISA) (EISA P.L.110-140)

Any proposed equipment whether a new replacement or upgrade will meet Energy Star, EPEAT, or equivalent energy-saving standard. If a choice is available the most energy-efficient is preferred.

Executive Order 13514

Executive Order (E.O.) 13514; *Federal Leadership in Environmental, Energy, and Economic Performance*; was signed on October 5, 2009. It expanded upon the energy reduction and environmental performance requirements of E.O. 13423.

Executive Order 13221

Executive Order (E.O.) 13221, *Energy Efficient Standby Power Devices*, calls for Federal agencies to purchase products that use minimal standby power when possible. It was signed on August 2, 2001.

Presidential Memorandum -- Implementation of Energy Savings Projects and Performance-Based Contracting for energy savings December 02, 2011

<u>42 U.S.C. § 6834 (a)(3)(A)(i)(I)</u>
<i>EPAct 2005 § 109</i>
<u>42 U.S.C. § 6834 (a)(3)(A)(iii)</u>
<i>EISA 2007 § 523</i>
<u>42 U.S.C. § 6834 (a)(3)(A)(iii)(II)</u>
<i>EPAct 2005 § 109</i>
<u>42 U.S.C. § 6834a(3)(D)(i)(I)</u>
<i>EISA 2007 § 433</i>

E.O. 13514 § 2(g)(i)

42 U.S.C. § 6834 (a)(3)(D)(i)(III)

E.O. 13514 § 2(g)(ii)

<u>42 U.S.C. § 17094</u>

<i>EISA 2007 § 438</i>
<i>42 USC § 6834(a)(3)(D)(i)</i>
<i>EISA 2007 § 438</i>
<i>42 USC § 8254(a)(1)</i>
<i>EISA 2007 § 441</i>

In consultation with MARAD, vendor must comply with Section 106 of the National Historic Preservation Act of 1966 (NHPA) and its implementing regulations, 36 CFR Part 800. The Secretary of the Interior Standards for Rehabilitating Historic Buildings. Energy Conservation Refit Study, Historic Structure Report, Historic Building Preservation Plan (HBPP) and HAZMAT Reports, if applicable.

Toxic Substance Control Act (TSCA P.L. 15 U.S.C. §2601 et seq. 1976), Occupational Safety Health Administration (OSHA P.L. 91-596, December 29, 1970 with amendments through January 1, 2004), OSHA 1910.1001, 29 CFR (Code of Regulations) 1926.1101

International Building Code maintained by the International Code Council (ICC) (Except for Chapter 10-use NFPA 101 for egress requirements)

International Mechanical Code

International Plumbing Code

National Fire Protection Association (NFPA), Sprinklers (NFPA 13), Standpipe and Hose Systems (NFPA 14), Fire Alarm and Signaling (NFPA 72), Life Safety Code (NFPA 101) including Egress Requirements, and Emergency and Standby power Systems (NFPA 110).

Other National Fire Protection Association (NFPA) and other codes as referenced by the International Building Code.

New York State Building Codes

New York State Energy Code

New York State Department of Environmental Protection

Ownership: All BER materials developed as a result of this effort shall be the property of the Government.

DOT Responsibilities: The DOT COR (or equivalent) shall make him/her available to meet with and provide building access to the respective building(s) on designated dates. DOT will be responsible to notify the various identified Agency points of contact of the scheduled inspection dates. If there are any unforeseen circumstances that make it necessary to change the inspection date, the contractor shall notify Rick Campbell and the Agency points of contact.

The USMMA DPW Director Rick Campbell shall provide (if available) the appropriate buildings information to include building drawings, maintenance records, project records, air quality/temperature issues, mold reports, PCB/asbestos or other hazardous material issues, previously identified project lists, identified ADA issues, preventative maintenance records, capacity/functionality issues with major building systems (HVAC, electrical etc.), utility bills and energy conservation issues (windows, insulation, building enclosures etc.)

The vendor shall perform all services described herein in accordance with the Objectives and Special Considerations set out above.

PRE-INSPECTION MEETING:

A pre-inspection meeting shall be held including the Assessment Team, the facility manager, any mechanical and electrical maintenance contractors, and appropriate DOT personnel. The following listed items shall be discussed. If the deficiencies described below, are present during the site visit they shall be included in the BER:

Review of the Work Item Inventory and Work under Construction reports provided by the Government.

Review of the facility manager's list of proposed work items.

Review of any known agency plans or projects.

INSPECTIONS:

Physical inspection of interior and exterior of each building: Following the pre-inspection meeting, inspections shall be made by the Assessment Team to include, but not be limited to, an evaluation of the following:

- Life and fire safety systems
- Handicapped accessibility facilities and requirements
- Evidence of structural failures
- Integrity of exterior walls, doors and windows
- Roofing and waterproofing systems
- Evidence of leakage, mold from any source
- Interior finishes, including cyclical painting
- Ceiling systems
- Elevators
- Water Front Structure including sea wall, piers, etc.
- Campus central utility services including electrical, water and sewer
- Fire Protection Services
- Plumbing systems including but not exclusively domestic and potable water piping, plumbing fixtures, rain leaders, drain, waste and vent piping
- HVAC systems
- Electrical systems
- Information Technology System
- Energy Power System
- Building Energy Management System
- All permanently installed furniture, fixtures and equipment.
- Special use areas such as, but not limited to, blind stands, snack bars, laboratories, computer facilities, and the like
- Food services facilities functional and physical conditions, but not food service equipment
- Hazardous conditions, including materials encountered suspected of containing mold, asbestos, and or lead, which must be abated in order to perform work recommended in this report, including a survey of the building's to identify all asbestos containing materials present, including any and all required recommendations toward compliance with current regulations
- Abutting grounds, approaches, parking areas and other site features.

Images: The Assessment Team shall provide color digital images of the property, including the illustration of requirement defects when appropriate, (see Section 5 - Images)

Existing Construction Documents: The Assessment Team shall review all available construction drawings and specifications. Also, any pertinent reports prepared for the property.

Vendors are advised that while some information contained in drawings, plans and other building documents may be accurate. These documents are known to contain inaccuracies, errors and are incomplete. Many of the buildings on the USMMA campus are nearly a century old and were built as private homes. Hence, there is not the level of documentation that would accompany a modern college campus. Vendors are advised that no plans should be substituted for physical inspection of the building. The Maritime Administration cannot be responsible for the accuracy of the plans and other building documents. They are provided as a potential guide; however, any conclusions policies or procedures based solely on the documents provided will not be acceptable. Verification of these documents or plans must be undertaken before they are utilized in the development of the Building Evaluation Report.

When errors, inaccuracies or any other type of misrepresentation are found in the plans they are to be documented in a database of the vendor's recommendation and concurrence of the Maritime Administration. Such inaccuracies will be printed out and attached to the building plans or other documents. The vendor shall make copies of all documents provided and make every effort to preserve the originals.

Building and Campus Evaluation:

The Assessment Team shall review all compiled information from the Physical Inspection and construction drawings and specifications. The Assessment Team will perform building system calculations for capacity based on current code requirements and modern day capacity requirements. The Assessment Team will include the following for each building:

-Building name, construction type, gross square footage and square footage, occupancy, year built, year of last major renovation. The evaluation will also include each building system age, expected remaining life, current system capacity and required upgrade capacity.

The Assessment Team will include the following for each campus site utility:

-Utility service type, capacity, year of last upgrade, connected load, future connected load based on individual building evaluations and single line campus schematic indicating service current size and capacity and future required size and capacity upgrade requirement. Determine if current utility service has the ability to permit future grid tied co-generation or alternative energy system, on campus. If not, what steps are necessary to establish capacity for potential grid tied alternative energy source.

POST-INSPECTION MEETING:

Attend post-inspection meeting between the Assessment Team, the building or facility manager, and a designated representative of the Contracting Officer's Technical Representative (COTR). This meeting shall be conducted following the walkthrough inspections, and document review.

REPORT OUTLINE:

Evaluate buildings in the sequence below and prepare a "Building Evaluation Report", based on the physical inspections of each building, relevant and validated data from plans, drawings or other documents. The Report shall consist of requirements/deficiencies, found in each building's structure, operating efficiency, appearance, all systems and all spaces occupied or non-occupied.

The Period of Performance (POP) shall be 60 Days:

1. Land Hall
2. Crowninshield Boat House
3. Sewer Plant
4. Delano Hall
5. Fulton / Gibbs Hall
6. Memorial Chapel
7. Cleveland Hall
8. Rogers Hall
9. Barstow House

Barstow House contains maritime artifacts and functions as a Museum. In order to comply with federal curatorial standards the Museum will be required to meet indoor environmental thresholds. The standards must be taken into consideration when evaluating the museum.

Currently, the National Park Service provides curatorial standards. These standards should be used as a guide. Building specific requirements will be provided at a future date; however, these are not expected to vary significantly from the Park Service specifications.

<http://www.nps.gov/history/museum/publications/MHI/CHAPTER4.pdf>

10. Bowditch Hall
11. Samuels Hall
12. Melville Hall
13. Fitch Building
14. Wiley Hall
15. Furuseth Hall
16. O'Hara Hall
17. Bland Library

In order to comply with federal curatorial standards the library will be required to meet indoor environmental thresholds. These standards must be taken into consideration when evaluating the library. Currently, the National Park Service provides curatorial standards. These standards should be used as a guide. Building specific requirements will be provided at a future date; however, these are not expected to vary significantly from the Park Service specifications.

<http://www.nps.gov/history/museum/publications/MHI/CHAPTER4.pdf>

18. Patten Hall
19. Tomb Field House
20. Roosevelt Field House
21. Jones Hall
22. Barry Hall
23. Murphy Hall
24. Palmer Hall
25. Prosser Boat House
26. Yocum Waterfront Center
27. Paint Locker
28. Pool Showers Men
29. Pool Showers Women
30. Public Works Bldg. A

- 31. Public Works Bldg. B
- 32. Vickery Gate House
- 33. Quarters A
- 34. Quarters B
- 35. Quarters C
- 36. Quarters D
- 37. Quarters E
- 38. Quarters F
- 39. Quarters G
- 40. Quarters J
- 41. Quarters K
- 42. Quarters L
- 43. Quarters M
- 44. Quarters N
- 45. Quarters P
- 46. Mallory Pier
- 47. Crowninshield Pier
- 48. Facility Sea Wall

The work shall be classified in five Priorities as follows,

Priority 1. Currently Critical, or Immediate Concerns Action as soon as possible.

Priority 2. Potentially Critical or Short Term Concerns, (within 1 - 2 years)

Priority 3. Not yet Critical or Long Term Concerns (within 3-5 years)

Priority 4. Items that will probably be Critical, or Long Term Concerns (within 6 - 10 years)

Priority 5. Items that do not comply with Codes and Regulations. This is for Grand-Fathered existing conditions. No immediate actions are required, although the items will need to be addressed if renovation or repair work is performed on the building.

The report shall contain the following.

General

Title Sheet

Contents

Certification, Project Manager

Acknowledgements.

1. Executive Summary: Briefly highlight the salient features of the property and the findings of the Assessment Team.

2. The Property:

General Background

Construction Descriptions. These to be entered using Uniformat II classification.

3. Requirements: These are proposed work items, or deficiencies in the buildings documented in the Building Evaluation Report that are recommended to be remedied. They shall be described completely in the BER as to the nature and extent of work and shall be accompanied by a cost estimate and justification for each recommendation. This shall include the exact location of each deficiency by building, floor and room number or other means for proper identification purposes. The Requirement Description and the Action Description shall use the

template provided, or pending approval of the project manager a reasonable facsimile thereof. All questions must be answered. Cost estimates shall be provided that will be based on the appropriate RS Means cost data. The proposed software program shall have the ability to utilize RS Means cost data. At the end of the Estimate, there is an adjustment factor to be used. This is based on the following multipliers as appropriate.

Design and Management Fees 1.15 or, +15.0%

Work in Occupied Space 1.20 or, +20.0%

Work in Security Areas 1.07 or, + 7.0%

After hours 1.10 or, +10.0%

4. Requirement Analyses: Comprehensive List of all requirements listed by systems.

Requirement Summary Reports by:

System

Category

Priority.

Followed by cross-tab charts for,

System/Priority

System/Category

Priority/Category.

5. Images:

KEY PLANS, Site Plan, Building Schematics showing, circulation, including fire egress, stairs, elevators, rest rooms and utility rooms.

GENERAL VIEWS. The building's exteriors on all sides and any special architectural features. Any special interior spaces such as but not limited to auditoria or courtrooms.

REQUIREMENTS. Titles to these should have the same title as the requirement including the Uniformat II reference number. The photographs shall have arrows to point out deficiencies where appropriate.

SUBMISSIONS:

General: The Project Manager shall review and spell-check all submissions prior to sending to DOT COR.

Preliminary:

Property Description:

Shall be e-mailed to the DOT COR within the first week of completing the physical Survey of the buildings. These shall all be returned by DOT stamped APPROVED or with any comments to be addressed and/or incorporated.

Requirements:

Eight work days after the survey, entering of the requirements into the chosen software will need to commence. DOT will perform spot checks. The quality of data entry will always be the responsibility of the vendor, any errors the spot checks turn-up will be corrected within 48 hours. The absence of comment, instruction or other communication by MARAD about any data entry does not express nor implies approval.

Final:

Shall be submitted based on the schedule below.

Using the provided templates, submit five copies of the complete report in a white letter size presentation "3" ring binder. Cover Sheet with DOT logo, title of report, Facility name, address, and photo, date of report, A&E Firm name, A&E address, and A&E phone number. A compact disk (CD) of the complete BER shall be inserted in a transparent sleeve mounted on the inside of the back cover.

Submit final copy for review	44 days after award
Review comments to contractor	52 days after award
Contractor submits final document	60 days after award

REQUIREMENTS
USE OF TEMPLATE

XOOOO NOUN - VERB *The letter followed by the 4 digits are the Unifomat II Level 4 reference numbers. The noun is the building element in question. The verb is the action, what is being done.*

REQUIREMENT DESCRIPTION

CONDITION/PROBLEM. *What is wrong? Mechanical and electrical equipment should list the manufacturer, the model, size and capacity and include other specifications if available.*

LOCATION/EXTENT. *Where, and the scope or extent (quantity) of the requirement.*

CAUSE. *One of the following or a combination. Then expand as appropriate.*

Defective design

Defective product

Defective installation

Deterioration due to age

Deterioration due to weathering Deterioration due to frost

Deterioration due to water

Deterioration due to mold

Deterioration due to neglect

Code Violation or Obsolescence

TIMING.

AGE: *If unknown, state unknown and make an assumption.*

EUL: *From BOMA*

RUL: *Normally this will be the age minus the EUL. This may be adjusted up or down based quality and maintenance, if it is adjusted, explain why.*

These are to be incorporated in a simple statement. See examples

CODE/REGULATION: *There may not be a pertinent code. If so state not applicable. If compliance is required quote the applicable code and the relevant clause numbers. Do NOT include the code text*

BER-3-USE OF TEMPLATE

Page 1 of

ACTION DESCRIPTION

REMEDY. *Simple statement is a study needed?*

IMPLEMENTATION. *Don't forget associated building operations such as debris handling, shoring, temporary fencing and building equipment. Are there items in historic structures that have to be labeled and stored?*

COORDINATION. *Will swing space be needed? Is night work required? List here all cross references. Should a study be required it should be entered under 1 for example I) 010 FLOOR STRUCTURE - STUDY*

(Consultant) was commissioned by DOT to provide a Building Evaluation Report (BER) for the USMMA. The property was inspected starting *(date)* through *(date)*. It is based on the on-site findings and investigations by specialized facilities assessment professionals. The objective is to provide an analysis for strategic planning, and for future funding requirements.

CURRENT CONDITIONS ANALYSES

Include the existing facility requirements, deferred maintenance, deferred renewal, near-term anticipated renewal, recommended discretionary improvements, and code non-compliance issues. Condition findings at the USMMA are,

Current Replacement Value (CRV) \$xxxxxxx.

Current Requirements Action (CRA)

(Priorities 2 through 4) \$xxxxxx.

Facility Condition Index

FCI (1 -4) O.xxxx

Current Requirements Action (CRA)

(Priorities 2 through 3) \$xxxxxx.

Facility Condition Index

FCI (1-3) O.xxxx

This indicates that the condition of the plant is X times the optimal level of 0.05. The Facility is in ("*Good*" "*Fair*" "*Poor*") condition.

Prime systems accounting for the largest requirements are, XXXXX. XX%, XXXXX. XX% and XXXXX. XX% (*Parrot's law 20/80*).

Categories accounting for the largest requirements are, XXXXX, xx%, is attributable to XXXXX, and XXXX, xx%, to XXXXXX.

ANTICIPATED CAPITAL RENEWAL ANALYSES

Projections of ongoing degradation of the facilities' components and costs associated with the renewal or replacement of these components as they reach the end of their expected useful lives. The estimated capital renewal requirements is \$xxxxx a year without inflation, (\$XXXXXXXJ a year with 2.5% inflation). Note, these values represent current dollar values averaged over a 10 year period. The profile of annual spending associated is non-linear and "spiky" as indicated in the Facility Renewal Forecast. Based on systems reaching the end of their expected useful lives,

capital expenditures remain flat until XXX, where the first peak occurs. In XXXX, XXXX, similar peaks occur. ?

don.coonan

**Revised Date period 2 contract and clau
07/24/12 04:42 PM**

