

**DEPARTMENTAL INPUT**

**CONTRACT/PROJECT MEASURE ANALYSIS AND RECOMMENDATION**

Rev 1

X New contract  OTR  CO  SS  BW  Emergency  Previous Contract/Project No.EPPRFQ-00148

Requisition/Project No: RTQ-90683  TERM OF CONTRACT: 3 years

Requisition/Project Title: Vessel Simulation Services

Description: Performance of multiple vessel simulation studies at PortMiami by a pool of contractors.

User Department(s): Seaport (PortMiami)

Issuing Department: Procurement  Contact Person: Sophia Cunningham  Phone: 305-375-2179

Estimated Cost: $500,000.00  Funding Source: Proprietary Funds  REVENUE GENERATING: N/A

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**ANALYSIS**

**Trade/Commodity/Service Opportunities**

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<thead>
<tr>
<th>Commodity/Service No: 91842, 91838, 91846, 95935, 90642, 03547</th>
<th>SIC:</th>
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**Contract/Project History of Previous Purchases For Previous Three (3) Years**

Check Here ___ if this is a New Contract/Purchase with no Previous History

**EXISTING**  2ND YEAR  3RD YEAR

Contractor: American Maritime Officers Safety and Education Plan dba STAR Center

Small Business Enterprise: Yes

Contract Value: $50,000

Comments: Similar services were previously obtained under full an open competition in 2015. The duration of the contract was 6 months (January 2015 – June 2015)

Continued on another page(s): Yes  No

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**RECOMMENDATIONS**

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<tr>
<th>SBE</th>
<th>Set-Aside</th>
<th>Sub-Contractor Goal</th>
<th>Bid Preference</th>
<th>Selection Factor</th>
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Basis of Recommendation:

Signed: Sophia Cunningham  Date to SBD: 08-15-2017

Date Returned to PM: ________________
SECTION 2 – SPECIAL TERMS AND CONDITIONS

2.1 PURPOSE

The purpose of this Request to Qualify (RTQ) is to establish a Pool of pre-qualified firms with applicable expertise to conduct vessel simulation studies for PortMiami. Entry into the pre-qualification Pool is not a contract between the County and any member of the Pool, but rather is an acknowledgement that the pool member satisfies the pre-qualification criteria set forth below for membership in the Pool. Pre-qualified firms will be invited to participate in future spot market competitions. The Pool shall remain open for the term of the RTQ, enabling additional firms to qualify at any time after the initial RTQ opening date.

2.2 TERM

The Pool will begin on the first calendar day of the month succeeding approval by the Board of County Commissioners, or designee, unless otherwise stipulated in the Notice of Award Letter which is distributed by the County's Internal Services Department, Procurement Management Services Division, and contingent upon the completion and submittal of all required RFQ documents. The Pool shall expire on the last day of the last month of the thirty-sixth (36) month period.

2.3 PRE-QUALIFICATION REQUIREMENTS

Pre-qualified Contractors will be invited to participate on non-recurring projects on an as-needed basis. Contractors shall submit all of the qualifying documents with their solicitation submittal form to be considered for pre-qualification. However, the County may, at its sole discretion and in its best interests, allow Contractors to supplement submitted documents in order to satisfy the pre-qualification criteria. It shall be the sole prerogative of the County to determine the number of Pre-qualified Contractors who will be included under the pre-qualification pool. During the term of the RTQ, the County reserves the right to add and/or delete pre-qualified Contractors.

Pre-qualification requirements are listed below and must be submitted with the solicitation submittal form:

1. Three (3) references for which the Contractor’s firm has completed vessel simulation services as outlined in this solicitation in the last five (5) years. Contact persons must have personal knowledge of the referenced project/contract.
2. Provide verifiable proof (copies of analyses, reports, studies, etc.) for (2) vessel simulation projects for any port which the Contractor has ongoing or has completed within the last five (5) years.

2.4 SPOT MARKET PROPOSALS

Future spot market competition(s) may be conducted by the County through the following processes:

a. Work Order Proposal Requests (WOPR): a quality or quality and price evaluation with award based on rankings/points.
b. Request for Quotations (RFQ): award based on the highest revenue offered.
In addition to the methods stated above, the County reserves the right to conduct future competitions using whichever process it determines to be in its best interest. The procurement process to be followed will be defined in the spot market documents at the time of competition.

2.5 PROOF OF COMPLIANCE TO THIS SOLICITATION’S REQUIREMENTS

Bidders are required to submit with their solicitation submittal form, all the specified information, documents and attachments as proof of compliance to the solicitation’s requirements. The County may allow Contractors to complete, or supplement, their proof of compliance to the solicitation’s requirements, but failure to provide proof of compliance to this solicitation’s requirement, as requested by the County, may result in being declared incomplete and not evaluated until such time as all documentation is received by the County.

2.6 VERIFICATION OF INFORMATION

The County may verify the information submitted by the Contractor and may obtain and evaluate additional information, as it deems necessary to ascertain the Contractor’s ability to perform under this solicitation. The County shall be sole judge of a Contractor’s ability to perform and its decision shall be final.

2.7 INDEMNIFICATION AND INSURANCE
SECTION 3 – TECHNICAL SPECIFICATIONS

3.1 BACKGROUND

PortMiami, formally the Dante B. Fascell Port of Miami, is one of the largest and busiest cargo and passenger ports in the world. To retain its competitive rank as a world-class port, PortMiami is embarking on the development and implementation of various projects outlined in the 2035 Master Plan. The projects are aimed at increasing both cargo and passenger throughput by adding services, enhancing efficiency, upgrading infrastructure and increasing berthing capacity. As part of the expansion program, PortMiami completed the deep dredge project which increased the channel to 50-52’, and the widening of the South Ship Channel from 500’ to 600’. Projects currently in progress include modification and/or expansion of terminal facilities, and the construction of new cruise terminals and berths. As such, PortMiami requires qualified firms to conduct multiple vessel simulation studies to identify best practices for safe and economic maritime operations at its facilities.

3.2 INTRODUCTION

Pre-qualified Contractors will be invited to participate in projects on an as-needed basis. The purpose of the vessel simulation services is to identify best practices for safe and economic maritime operations at PortMiami’s facilities. The use of geographic and hydrodynamic models will assist in examining new port designs, pier or channel modifications, and the suitability of design for a particular vessel or vessel types that use, or may use PortMiami’s facilities.

3.3 SCOPE OF SERVICES

The County seeks to create a Pool of firms with proven expertise in performing vessel simulation services for ports. The Contractor providing these simulations must be capable of utilizing computer generated geographic databases for target objects and hydrodynamic ship models in real time modeling, training and research. The Contractor is required to be equipped with high-fidelity graphics, capable of depicting precise and accurate ship hydrodynamic behavior. The vessel simulations must have the ability to compute wave and swell forces accurately. Accurate wave force computation is critical for the modeling of dynamic positioning, along with wind and current forces.

The Contractor providing the simulation services should have accurate current effects modeled using underwater profile and empirical coefficients for each force components. Empirical coefficients should be model test derived. The Contractor must also have the capacity for specially programmed two or three dimensional current models.

Vessel simulations must model bottom effect forces using empirical coefficients as a fraction of the depth/draft ratio multiplied by deep water value. Type of bottom should be adjusted and be able to model anchor and chain forces, mooring and fender forces, pushing/towing effects and ship collisions. The Contractor is required to have a vessel profile library which includes cruise ships, ro/ro vessels, bulk carriers, ferries, tankers, container ships, fuel carriers, tug boats, naval vessels and research vessels. The Contractor is also required to be able to model new vessels not in their profile library.

PortMiami will provide the Contractor with any necessary files to conduct the simulation services. These files include but are not limited to the existing CADD files, data on waterside facilities, current bathymetric survey, etc. Simulations will be conducted by the Contractor and the Biscayne Bay Pilots, in the presence of PortMiami.
staff and Captains from the cruise lines. As PortMiami is a restricted area, all sensitive information will be reviewed and approved by the Port Security and Law Enforcement teams prior to release.

At the conclusion of the research, simulation and computation tasks, the Contractor must be able to issue a written transiting and berthing analysis report that details the results of the study, discusses the results and implications, and offer solutions or suggestions for any problems encountered.