

# COMMISSION AGENDA

Item No: 4F

Meeting: 12/21/17

**DATE:** December 13, 2017

**TO:** Port Commission

**FROM:** John Wolfe, Chief Executive Officer  
Sponsor: Ricardo Charlton, Director, Maintenance  
Project Manager: Stanley Ryter, Engineering Project Manager II

**SUBJECT:** Project Authorization for work associated with the Maintenance Mezzanine and Shed Heating project

## **A. ACTION REQUESTED**

Request project authorization in the amount \$340,000 for a total authorized amount of \$490,000, for work associated with the Maintenance Mezzanine and Shed Heating project, Master Identification No. 101140.01.

## **B. SYNOPSIS**

Currently the Port of Tacoma maintains two primary storage areas for storeroom inventory items. Both areas were identified for necessary improvements during the 2017 budget. These improvements will increase the effectiveness of the space and reduce safety concerns associated with the current areas. An existing parts mezzanine in the maintenance building will be expanded to accommodate parts for new models of straddle carriers, container cranes and spreaders. An existing shed will be retrofitted to provide heat and to accommodate the additional crane motors, straddle carrier motors and spreader motors needed to have on hand.

## **C. BACKGROUND**

The first four (4) new cranes for Terminals 3 and 4 are anticipated to arrive in late January 2018. This delivery also includes six (6) new spreaders. The second set of four (4) cranes will arrive in mid-2019, for a total of eight (8) new cranes and thirteen (13) new spreaders. Two different types of spreaders, one type for the Terminal 3 and 4 crane, and another type for the East Sitcum Terminal cranes are necessary. Four (4) next generation straddle (strad) carriers are scheduled to arrive in December 2017. The parts mezzanine in the maintenance building will be expanded to accommodate the additional spare parts. Existing Shed 15 will be retrofitted to provide heat. Heating the shed is necessary to keep larger engine parts above minimum temperatures. Maintenance currently stores engines in two (2) heated containers which is inefficient and creates a safety hazard moving heavy engines to gain access to engines stored in the back of the container. The containers are at maximum capacity. Eliminating the containers will also increase needed yard space.

The parts mezzanine is a free-standing steel structure approximately 12 feet above the floor and is made of steel columns and a grated deck capable of carrying 250 pounds per square foot. The new parts mezzanine will connect to two existing mezzanines creating a more efficient space. Shed 15 is an existing 100 foot x 40 foot prefabricated metal building used for parts storage.

**D. PROJECT DETAILS**

***Scope of Project:***

- Preliminary engineering, alternatives analysis and engineering
- Construction of a parts mezzanine in the maintenance building
- Retrofit Shed 15 to accommodate heat

***Scope of Work for This Request:***

- Construct a prefabricated metal mezzanine
- Construct associated fire protection and electrical upgrades
- Construct electric heaters, insulation and two roll up doors for Shed 15

***Schedule***

Design Completion	December 15, 2017
Construction Bid Opening	January 30, 2018
Construction Completion	July 15, 2018

**E. FINANCIAL SUMMARY**

**Estimated Cost of Project**

The total project cost including all stages is estimated at \$490,000.

**Estimated Cost for This Request**

The total estimated cost of construction for this project is \$340,000. If the cost of this estimate is anticipated to exceed the authorized amount, additional Commission authorization will be requested.

**Estimated Sales Tax**

The total estimated sales tax to be paid to local and state governments for this project is \$24,000.

**Cost Details**

Item	This Request	Total Previous Requests	Total Request	Total Project Cost	Cost to Date	Remaining Cost
<b>TOTAL</b>	<b>\$340,000</b>	<b>\$150,000</b>	<b>\$490,000</b>	<b>\$490,000</b>	<b>\$56,750</b>	<b>\$433,250</b>

**Source of Funds**

The 2017-2022 Capital Investment Plan (CIP) allocates \$501,000 for this project. Costs directly associated with maintenance of equipment are included in the maintenance charge out rates for services performed for the Northwest Seaport Alliance.

**Financial Impact**

Project costs will be capitalized and depreciated over a 10-year period, resulting in annual depreciation expense of \$50,000. There will be no depreciation for 2017 based on the anticipated project completion date of July 2018.

**F. ECONOMIC INVESTMENT/JOB CREATION**

The investment allows the Port of Tacoma to provide best in class service to the tenants of the general central peninsula. The project allows Port Maintenance the ability to better store parts, track inventory, and quickly locate parts to keep the straddle carrier and crane fleet operating. No additional jobs would be created.

**G. ALTERNATIVES CONSIDERED AND THEIR IMPLICATIONS**

Alternative 1) Do Nothing. Additional parts for the crane are stacked in boxes in storage and inaccessible when needed. The new engines are stored either inside the maintenance building, which would require more high turn inventory parts to be stored in outbuildings which is inefficient, or in unheated outbuildings, causing the lubricants to solidify and break down making them unusable on short notice. We do not have enough shelf and floor space to accommodate the new additional spare parts.

Alternative 2) Add 1,250 square feet of parts mezzanine connecting two existing parts mezzanines. Build new 100 foot x 40 foot pre-engineered building to store engine parts. This alternative would result in a loss of functionality below the parts mezzanine. The building would require shallow foundations in an area that may have contaminants below grade. The adjacent asphalt would have to be regraded and additional stormwater catch basins would be necessary. The likely permitting and cleanup required would be cost prohibitive. The project costs without cleanup were estimated to be more than \$1.25M.

Alternative 3) Add 975 square feet of parts mezzanine connecting two parts mezzanines for a combined total of 3275 square feet. Take existing 100 foot x 40 foot building and retrofit to provide heat. This requires upgrading insulation and two new roll up doors that shut properly. Fixing the roll up doors enables the building to be reorganized and additional shelving added. Engage in cleanup effort to surplus or dispose of spare parts for equipment that is no longer owned or obsolete.

Alternative 3 is the recommended course.

**H. ENVIRONMENTAL IMPACTS/REVIEW**

Permitting: Two commercial alteration building permits are being procured from the City of Tacoma.

Remediation: Not applicable

Water Quality: Not applicable

Air Quality: Not applicable

**I. PREVIOUS ACTIONS OR BRIEFINGS**

<u>Date</u>	<u>Action</u>	<u>Amount</u>
February 10, 2017	Executive Authorization	\$70,000
September 8, 2017	Executive Authorization	\$80,000
<b>TOTAL</b>		<b>\$150,000</b>

**J. ATTACHMENTS TO THIS REQUEST**

None.

**K. NEXT STEPS**

Complete design, obtain permit, and bid construction contract.