

2021-2022 MHLS Construction Grant Narratives

Project Title: Delivery Operations Area Renovation

Project Abstract:

Renovation of the delivery operations area to improve working conditions for staff, address staff efficiencies, and improve energy efficiency.

Project Description:

The MHLS Delivery Operations Area Renovation Project will improve space in our existing office facility resulting in improved working conditions for staff, optimize staff efficiencies and improve energy efficiency.

This area of our facility is used to process the delivery of library materials among our sixty-six member libraries. Items requested by patrons through our online catalog from one of the seventy (70) public library locations in our region as well as to six correctional facilities which are delivered by courier five days a week. Items that are not able to be forward-sorted on a route for same-day delivery are brought back to the headquarters of the Mid-Hudson Hudson Library System (MHLS), and sorted by a team of seven staff into bins for the courier service drivers to take the next day out to delivery locations. The team sorts, on average, 5,000 items a day, five days a week.

This space is primarily devoted to the daily activities necessary to sort and route items to their next location. It is currently designed with moveable carts of two varieties: sorting carts where staff sort the items in the bins delivered by the courier service by route and carts that house the bins that go to libraries on a specific route. The staff work in close quarters, either assigned to the sorting cart where they stand and sort or to move sorted items onto the route carts to ensure items are delivered to the patrons at their chosen location the next delivery day.

This space also includes a garage bay door that opens directly into the workspace, serving as a loading dock as the courier service drivers arrive back with their deliveries for the day, as well as an area devoted to processing packages coming in and going out via the U.S. Postal Service, UPS and FedEx.

This renovation project has several elements to improve working conditions for staff, decided upon after a focus group with the staff that work in this area daily.

- The project aims to increase staff comfort and safety by renovating the flooring system. Currently the staff stand and walk on a poured concrete floor which is hard on their back and joints. This project would install a new rubber flooring system that complies with all current applicable codes including the Occupational Safety and Health Administration (OSHA) and the NYS Department of Labor.

- The project will address both energy conservation and thermal comfort issues for workers through the installation of new heating, ventilation, and air conditioning (HVAC) equipment; re-zoning of the area to its own zone to increase control of temperature in this space given the unique challenge of outside air being introduced routinely to the workspace by the garage door being opened and closed; and installing a upgraded garage door with an increased R-value – a higher value insulating material - to more quickly retain the indoor air conditioned by the HVAC system and maintain a stable temperature for the working environment.
- The project will optimize staff efficiencies for the mailing area where packages are processed both for pick-up by workers from the US Postal Service, UPS, and FedEx and the receipt of packages delivered to streamline the work flow and minimize the footprint of these efforts given how tight the space is to begin with. To achieve this, new sorting, packaging, and process equipment will be purchased to reconfigure this space. This will be the third and final component of the renovation project to be completed once the renovation of the flooring and HVAC systems are completed.

Impact of Project:

This project addresses three of the criteria outlined in Commissioner’s Regulations 90.12 (8 CRR-NY 90.12):

- **Increased effectiveness of library system service due to improved building space and capacity**
- **More efficient utilization of the building due to increased energy conservation**
- **More efficient utilization of the building due to staff efficiencies**

A focus group held with staff who work in this area resulted in feedback regarding joint and back pain due to standing on the concrete flooring for their entire shift. Unlike other staff in this facility, they are not working at a computer station all day. They are standing at a sorting cart or physically transporting items from sorting carts to delivery bins on the route carts. Only during break times do they get to sit down. A new flooring system which is cushioned, while still allowing for the carts to be rolled through the space, should alleviate this pressure on their joints and spines, as well as reduce noise in the area as the softer flooring material will absorb more noise.

Staff also reported that thermal comfort issues, both in the summer and winter, can make for a very uncomfortable workspace, particularly on days with extreme heat. As drivers from the courier service come back with the bins from member libraries and delivery service people stop by with mail and packages for the organization the garage bay door is opened, allowing conditioned air to escape from the workspace. Once closed, the current configuration of the HVAC system does not quickly respond to bring the area back to the desired temperature, often because the readings for the system are in the front half of the floor, our business office, which is closed off from the delivery area. By rezoning the HVAC system to have a more responsive control system over the delivery area, having a garage door that has a higher R-

value, and installing a new condenser unit we will have more direct control over the thermal comfort area both in terms of the set point temperature and humidity. The installation of a new, more insulated garage door was a recommendation from the May 2018 energy audit we had conducted by L&S Energy Services. The current wood door has an R-value of 1. The proposed door for this project has an R-value of 18.3.

Staff efficiencies will be achieved through the redesign of the mailing area. Currently this space uses “inherited” furniture, carts, and storage solutions that do not flow well together and force workarounds for the staff to process packages in a very tight space. By streamlining this space with even counters, adequate storage for bins and storage for packaging materials that keeps the counters more open for packaging and processing the staff will gain both “elbow room” to work and more storage for the tools of their trade. This renovation will also reduce the current visual clutter that is forced by the current set up, providing for a more aesthetically pleasing work environment that should make the space feel bigger and brighter for those whose primary workspace is in this area of the building.

Budget Narrative:

Total Project Cost: \$29,170.82

Element A: United Air Conditioning, Refrigeration, Plumbing and Heating Inc.: \$9,783

HVAC vendor will provide and install new equipment according to manufactures recommendations and comply with all current applicable codes including OSHA and DOL compliance as follows:

CONSTRUCTION WASTE MANAGEMENT AND DISPOSAL

- A. Salvage items for reuse if possible and store items in a secure area until installation.
- B. Sort construction and demolition waste for recycling by owner as described below:
 1. Steel: Stack in a location designated by owner.
 1. Copper: Stack in a location designated by owner.
 2. Cardboard and Boxes: Break down packaging into flat sheets, bundle and store in a dry location.

INSTALLATION AND TESTING

- A. New condenser unit (1) to be installed on pads or blocks and set level
- B. New fan coil unit (1) to be installed.
- C. Water condensate drain complete with piping, accessories, and support.
- D. Replace refrigerant line set with new as well as PVC line on exterior of building to conceal and protect line set.
- E. Temperature control wiring complete to serve A/C equipment.

- F. Power circuits to new mechanical equipment per NYS and City of Poughkeepsie electrical code requirements.
- G. Start up and testing of new equipment.

Element B: Thor Performance Products, Inc.: \$14,351.47

Flooring vendor will conduct site preparation by conditioning and scarifying the flooring surface, and provide and install a new rubber flooring system according to manufactures recommendations and comply with all current applicable codes including OSHA and DOL compliance as follows:

FLOOR CONDITIONING AND PREPATION

- A. Floor will be conditioned by scarifying process to prepare the site for renovation. All old finishes such as sealers, paints, and epoxies will be removed.
- B. Floor will be prepared to accept new flooring system by patching any cracks and voids.

CONSTRUCTION WASTE MANAGEMENT AND DISPOSAL

- A. Sort construction and demolition waste for recycling by owner as described below:
 - 1. Cardboard and Boxes: Break down packaging into flat sheets, bundle and store in a dry location.

INSTALLATION

- A. Adhesive will be applied to floor.
- B. New rubber flooring system will be installed. 4mm 48" x 25/50' rolls
- C. New rubber cove base 4" high will be installed
- D. New transitions strips at all entries will be installed.

Element C: Dutchess Overhead Doors: \$2,809

Garage door vendor will remove old door and hardware and provide and install a new garage door system according to manufactures recommendations and comply with all current applicable codes including OSHA and DOL compliance as follows:

SELECTIVE DEMOLITION AND REMOVALS

- A. Remove existing equipment
 - 1. Outdoor remote opener.

2. Garage door, track, springs, and sensors.
3. Garage door opener and hangers.

CONSTRUCTION WASTE MANAGEMENT AND DISPOSAL

- A. Sort construction and demolition waste for recycling by owner as described below:
 1. Cardboard and Boxes: Break down packaging into flat sheets, bundle and store in a dry location.
 2. Steel: Stack in a location designated by owner.

INSTALLATION

- A. Install new equipment
 1. New tracking and torsion springs with necessary hangers.
 2. New insulated garage door
 3. New belt drive opener, trolley, and necessary hangers.
 4. New wired wall stations, exterior keypad, and safety photo eyes.

Element D: Uline: \$2,227.35

New Delivery Operations mail sorting packaging and process equipment will be purchased as follows:

EQUIPMENT

- A. L-Shaped Industrial Packing Table
- B. Packing station starter table
- C. Packing station box shelf with dividers
- D. Deluxe workstation shelf
- E. Deluxe workstation bin rail
- F. Plastic stackable bins
- G. Packing station tape gun holder

Timeline:

Delivery Operations Area Renovations

DATE	ACTION
May 1 st , 2021	Proposals requested for Delivery Operations Renovation
August 2 nd , 2021	Proposals due and reviewed
September 14 th , 2021	MHLS Board approval of project funding
September 20 th , 2021	Vendors awarded contracts
October 11 th , 2021	Vendors to begin work
December 31 st , 2021	Vendors to complete work