



Air Cooled and Remote Condensing unit Coil Cleaning

Refrigeration vendor Scope of Work

Overview

This scope of work (SOW) has been developed to aid the refrigeration contractor field technicians in ensuring a complete and thorough cleaning of all refrigeration related condenser coils.

Primary duty is to assist coil cleaning contractor with unit operations and complete inspections of condenser and condensing units. It will be the technician's responsibility to direct and validate the refrigeration condenser coils have been cleaned using industry standard (clean from the top down when applicable) methods, and the coil is free of all dirt and debris.

Target Expectation

Target Refrigeration Operations Technical Lead Team expects technicians to follow these basic guidelines:

- WO #2 to be scheduled at vendors discretion within the LOS time period after TL proposal approval
- Upon TL proposal approval, WO #2 shall be dispatched as first call of the day utilizing a single high-level technician (if two techs are required for safety reasons, provide detailed notes in WO Long Description)
- Complete WO #2 in as few of trips as possible
- It will be the technician's responsibility to become familiar with all written SOW's related to the CCC program

Scope

2023 Coil Cleaning Schedule

Refrigeration Preventative Maintenance			
Cycle	LOS Start	LOS Finish	WO LOS
January	Monday, January, 30 th 2023	Wednesday, February 22nd, 2023	21
February	Monday, February 27, 2023	Wednesday, March 22nd, 2023	21
March	Monday, April 3, 2023	Wednesday, April 26th, 2023	21
April	Monday, May 1st, 2023	Wednesday, May 24th, 2023	21
May	Monday, May 29th, 2023	Wednesday, June 21st, 2023	21
September	Monday, October 2nd, 2023	Wednesday, October 25th, 2023	21
October	Monday, October 30th, 2023	Wednesday, November 22nd, 2023	21
November	Monday, November 27th, 2023	Wednesday, December 20th, 2023	21

Pework and Planning:

- Vendor will receive store list and corresponding schedule dates (Cycles) for all stores at the beginning of the fiscal year. Store schedule is subject to change and will be communicated to individual vendors on an as needed basis.
- Vendor will receive refrigeration coordination PM work orders from Target at least 2 weeks before LOS start date.
- Refrigeration coordination work orders coincide with a separate work order to Fleetwash to perform the actual cleaning of refrigeration equipment.
- Refrigeration vendor is responsible to:
- **Contact coil cleaning vendor, Fleetwash, upon receipt of coordination work order to determine a date/time to complete cleaning at each store for which a work order was received by the refrigeration vendor.** Alternatively, at least two weeks' notice must be provided to Fleetwash in order to coordinate schedule date(s).
 - Coordinate exact day and time required for refrigeration vendor and Fleetwash to be on site.
Primary Fleetwash Contact – Sharon Snell : sharons@fleetwash.com ;phone – 800-847-3735
Secondary Fleetwash Contact-Jerry DiGiovanni : JerryD@fleetwash.com ;phone – 973-417-5071
 - Contact Property Management Lead using the following email address convention:
TXXXX.PML@target.com (where XXXX is the four-digit location number) with the date & time of the scheduled service with a request that the PML respond to acknowledge receipt.
 - **Additionally, contact any other parties impacted by the program due to uniqueness of sites (malls, downtown areas/high-rises etc.)**
 - **Scheduled services shall be performed Monday through Friday starting during normal business hours.**
 - Overtime is not allowed for this program.
 - Should a schedule conflict/emergency arise, it is the responsibility of the conflicted vendor to contact the opposite vendor to inform them in the change of schedule as soon as the conflict arises.
 - Coordinate in order to determine a new schedule as soon as possible.
 - **Target is not responsible for any cost incurred due to schedule conflicts.**

Technical Execution:

- Technician is to inspect condenser prior to cleaning for deterioration and corrosion to ensure coil can be cleaned.
- Turn unit Off/On as needed to allow for cleaning by coil cleaning vendor.
 - Any equipment that is going to be fully shutdown requires a phone call to FMOC to put specific equipment in the system in test mode prior to shut down. Calling FMOC to place specific equipment in test mode will prevent any work orders being created due to alarms.
 - Once service is complete on the specified equipment that has been shut down for service, call FMOC to take specific equipment out of test mode.
 - FMOC phone number: 1 888 888 0304
 - a. Refrigeration technician should direct Fleetwash as to which fans have been shut down for cleaning
 - b. Technician is responsible to open all access panels for coil cleaning vendor. See below for examples
 - c. Fleetwash is to clean section of coil with fans shut down as per the process/procedure listed in Fleetwash's training slides
 - d. **Refrigeration vendor will then restart fans on cleaned section and shut down fans on the next section; process will be completed on the air-cooled condenser until the unit has been thoroughly cleaned.**
- Ensure all fans and split condenser valves are operational by verifying the sequence of operation and programming. Set according to Target ROG.
- Ensure all fan cages are attached and secured.
- Inspect the following components and evaluate for replacement or repair. The items listed below should be proposed on WO2:
 - a. Fan contactors
 - b. Terminal blocks-inspect for proper torque and corrosion

- c. Fan blades
 - d. Fan motors
 - e. Back up Fan cycling controls and pressure hoses (Most of our condensers no longer have back up fan cycling controls. If found, propose on WO2 to remove pressure controls and pressure hoses, seal pressure tap, and rewire fans for Einstein control only) Please note does not include single remote condensing units.
 - f. Coil for refrigerant leaks
 - g. Fan brackets for potential failures (cracks or deteriorating mounting hardware)
 - h. Fan motor mounts for potential failures (cracks or deteriorating mounting hardware)
 - i. Unistrut clamps for cracks, deteriorating or missing hardware
- **Inspection should be performed in conjunction with work order 1 and the replacement or repair of any items should be included on work order 2 (WO 2)**

Materials:

Acceptable items on work order 1:

- No materials specified

Acceptable items on work order 2 include Air cooled condensers and condensing units ONLY:

- Contactors
- Fan blades
- Fan motors
- Fan brackets
- Fan motor mounts
- Unistrut hardware
- Fuses
- REMS equipment associated with air cooled condenser/condensing unit operation only
- Condenser controller panel disconnects

Any additional items will be addressed in subsequent Refrigeration PM

Not In Scope

- Any assets not specifically written into this SOW are out of scope
- Out of scope repair/replace items can be directed to PML who can create a corrective maintenance work order

Roles and Responsibilities

Vendor

Completely responsible for scheduling (see prework and planning) and execution of program SOW within LOS dates provided on work order.

Target Refrigeration Team

- Supply work orders to vendors at least two weeks prior to LOS start date
- Support vendor and store team's technical inquires to program
- Monitor and process work order proposals
- Track all call backs to site for work previously completed under PM SOW
- Monitor program cost and completion of all work orders

Store team

- Support check in/check out of vendors
- Assist vendor in locating appropriate parking area for service vehicle
- Assist vendor in locating roof hatch and water outlet (if necessary/available) (PML or LOD)

Work order Definitions

Two separate work orders are issued to the service vendor in order to support this program.

Work order 1 (WO 1)

- LOS for work order 1 is 21 days
- Work order 1 is issued to service vendor to complete the actions directed at the vendor as outlined in the scope section of this SOW
- Not to Exceed (NTE) is the contracted dollar amount
- There will be **NO** NTE adjustments made on WO 1. **Any additional cost incurred due to delays by either party needs to be billed on WO2 and noted time and trips must be detailed in the Long Description.**
- Utilize catalog labor hours when invoicing WO 1

Work order 2 (WO 2)

- LOS for work order 2 is 45 days
- Proposal on pull through work order (WO 2) can include only parts listed in materials section above
- Any other observations for repair should be shared with the PML. Vendor should work with the PML to create a corrective maintenance work order
- Stores that do not require work to be performed on WO #2 should be completed at \$0 based on the following:
 - If no work was needed complete the following steps:
 - Update to \$0
 - Add a note in the long description: "PML validate at \$0 per HQs request – No work needed"
 - Update to VCOMP status
 - **DO NOT UNDER ANY CIRCUMSTANCE CANCEL A WORK ORDER** (unless directed by Target HQ)
 - In the event an error occurs with a work order and cannot be rectified by vendor, a replacement work order can be requested by contacting
HVACREF.Vendors@target.com

Invoicing

- Work orders are to be invoiced within 7 days of work order completion date.
- It is critical to the success and future of this program that the set LOS deadlines are met. Target has provided each vendor with their specific site list as well as scheduled cycle dates prior to the program roll-out.
 - Failure to: Meet the LOS deadlines for WO completion, Pull-through proposal submittal or PT WO completion may result in cancellation of incomplete work orders and/or loss of sites for future cycles
 - All work orders not in VCOMP or COMP statuses in Maximo 30 days after the LOS deadline will be subject to closure

Validation

- Verify all condensing units are cleaned and operational prior to air cooled condenser cleaning
- It will be the technician's responsibility to direct and validate the refrigeration condenser coils have been cleaned using industry standard (clean from the top down when applicable) methods, and the coil is free of all dirt and debris

Additional Resources

Access panel-Remove bolts to access panel to allow coil cleaning vendor to access coils



When removing bolts to panels-Use hand tool. Do not use an impact wrench or other motor operated tools.



Refrigeration vendor is to remove all bolts and lift panel to allow access for condenser cleaning.



Revisions

Version 1- 8/2/2016: Document creation date

Version 2-9/6/2016: Updated technical execution: added number 3 for access panel. Added pictures to additional resources

Version 2.1 5/2017: New verbiage to have systems put in test mode, #3 for Execution updated.

Version 2.2 1/2018: Updated for 2018 execution

Version 2.3 05/2023: Updated for 2023 execution