



# EPA Refrigerant Conservation Services Report



Customer: DuPont Experimental Station

Date: 05/23/2019

Location: E315 Powerhouse

Equipment Type:	
Industrial Process / Com. Refrigeration	
Commercial - Over 50 lbs Refrigerant	<input checked="" type="checkbox"/>
Commercial - Under 50 lbs Refrigerant	

Equipment ID: CHILLER #7 (S/N: MRP626904)

## Refrigerant Leak Verification Test - 03/19/2019

[1] Source of Leak: 1/2" Threaded Piping in Comp. Disch. Line for Transducer & Gauge

[1] Corrective Action: Removed, Installed New Piping, & Fittings w/ Appropriate Thread Sealant (05/20/2019)

[2] Source of Leak: Liquid Refrig Filter-Drier Inlet & Outlet Angle Valve Packings

[2] Corrective Action: Cleaned Stems, Tightened Packings, Leaking Stopped (03/19/2019)

[3] Source of Leak: Evaporator 6" Sight Glass Packing Gland

[3] Corrective Action: \*\* Packing has reached it's limit of compression. New Sight Glass was Ordered \*\*

Initial Leak Verification Test :  Pass  Failed

Was Leak Repaired?  Yes  No  Owner Declined Repair

Verification Test Method: Electronic Detector & Soap Bubbles (100psig Nitrogen Pressure w/R-134a Trace)

## Refrigerant Usage - 05/22/2019

Refrigerant Type: (Circle One) R-11 R-12 R-22 R-123 R-134a R-407c R-410a Other:

Refrigerant Lbs. Used: 940 lbs Factory Charge or Approximate Charge: 8,970 lbs

Refrigerant Supplied By:  Customer  JCI  Other, Explain \_\_\_\_\_

## Refrigerant Recovery 04/19/2019 (Technician Certification Cards on File at JCI Local Office)

Recovery Unit Model# YORK RTU-10 Serial # 61795205-91012424 Mfg. Date Before 11/15/93  Yes / No

Refrigerant Type: (Circle One) R-11 R-12 R-22 R-123 R-134a R-407c R-410a Other:

Refrigerant Re-Charged to Sys.?  Yes  No - 05/22/2019 Refrigerant Lbs. Recovered: 8,030 lbs

Refrigerant Not Re-Charged, Explanation: \_\_\_\_\_

## Refrigerant Leak Rate Formula for Units Greater Than 50 Lbs

( 940 lbs. Refrig. Added / 8,970 lbs. in Full Charge) x (365 / Lesser of 365 Days or # of Days Since Refrig. Added) x 100

Refrigerant Leak Rate Percent: 10.5%  Minimal refrigerant leaks were found.

Leak Rate found in excess of  15%  35% annual charge which exceeds legal EPA leak rates.

## 30-Day Refrigerant Follow-up Verification Test

Date Test Performed: 05/22/2019  Pass  Failed

Comments: Verified w/ Electronic Detector & Soap Bubbles (Chiller Pressure @ 70psig). After charge installed.

Additional Comments: The Evaporator Sight Glass was Ordered and will be replaced when DuPont deems it convenient. This will require another recovery of entire charge, nitrogen pressure test, evacuation, and re-charge.

Technician Signature: [Signature]

Customer Signature: \_\_\_\_\_