



# YORK®

## Enhancement Services

### Chiller Refrigerant Analysis



***What you can't see can hurt your chiller.***

Your chiller's refrigerant can tell you a lot about the condition of your chiller. Expert laboratory analysis of your refrigerant can identify the presence of rust, sludge, and harmful acids in your chiller system. Not only can these contaminants reduce operating efficiency, they can cause unnecessary parts wear and costly catastrophic chiller failure.

#### ***Reduce downtime, increase efficiency***

Rust, sludge, and acids are the downfall of system efficiency. Rust build-up on the heat exchanger tubes decreases efficient heat transfer, causing the compressor to work harder and waste energy. Rust particles falling to the bottom of the evaporator shell mix with the oil, causing improper lubrication, premature parts wear, and clogged valves and orifices. Hydrofluoric and hydrochloric acids, formed by the combination of moisture and refrigerant, are highly corrosive.

The presence of these contaminants in your system's refrigerant can be "visualized" by chemical analysis. Once detected, their causes can be easily remedied before they cause major system problems or failure.

#### ***Analysis custom tailored to your chiller***

When used as part of a regular maintenance program, refrigerant analysis forms an essential part of maintaining efficiency and preventing downtime. By comparing the results of the analysis against the chiller's historical operating date, York® chiller system experts can reliably diagnose the condition of your chiller and make recommendations accordingly. Analysis can also often pinpoint the causes of contamination so that repairs can be made quickly and cost-effectively. It will also indicate whether tear-down and visual inspection is warranted.

And, of course, acceptable analysis results can provide you with peace of mind.

#### ***Rely on York expertise***

Experienced York service technicians will extract the refrigerant sample according to the chiller manufacturer's sampling directions, ensuring that the sample is representative and not contaminated by outside influences. An incorrectly taken sample can result in costly and unnecessary preventive maintenance. After thoroughly analyzing the sample, York will provide you with a comprehensive report, including any recommendations for keeping your chiller at peak operating efficiency.