Bulletin APMF JUN 2010

# HHANSEN



APMF AUTO-PURGER<sup>®</sup>M for Halocarbons

INTRODUCTION

Model APMF AUTO-PURGERs are for use in halocarbon refrigeration systems. The installation and operation of these AUTO-PURGERs are similar to that of an ammonia AUTO-PURGER M, as described in Technical Bulletin APM-001. Please refer to APM-001 for further specifications and servicing instructions.

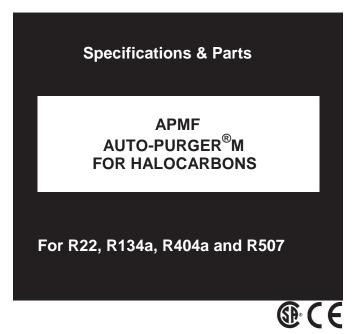
## PIPING HALOCARBON AUTO-PURGERS

The halocarbon liquid line and foul gas line piping and sizing details are the same as for an ammonia AUTO-PURGER M. However, the suction line size for halocarbon purgers should be  $\frac{3}{4}$ " (20mm) for suction temperatures down to -20°F (-29°C) to -60°F (-51°C) suction temperatures. Condenser drain lines on halocarbon evaporative condensers must be trapped and drop vertically 8' - 12' (2.5m - 3.7m), or per manufacturer recommendations. This is to prevent possible backflow of liquid into one or more condenser circuits resulting in a flooded purge point.

Purge points are at the same locations as for an ammonia purger. For evaporative condensers, the purge points are on the top of the outlet drain line. Although noncondensible gases are lighter than halocarbon gas, they still collect at, or near, the outlet.

## **OPTIONAL VALVE PACKAGE, VPMF**

The special construction for APMF AUTO-PURGERs includes a filter-dryer conditioning system for the foul gas and liquid line. Water vapor, as well as noncondensible gas, may be present at each purge point. The filter-dryers remove this moisture before it can enter the purger. Both dryers are used to protect the purger internally from freezing water, but they also supplement water removal of the primary refrigeration system liquid line dryers. Moisture indicating sight glasses located downstream of the filter-dryers indicate when the filterdryer cores are saturated with water and must be replaced. Isolation shut-off valves are included for change out of the filter-dryer cores, and access valves allow evacuation of the refrigerant from the filter-dryer shell.



### AIR INDICATING COLUMN

While the air indicating column (water bubbler flush system) is included, the water line and drain line are not required. Fill the clear tube to the marked line with a lightweight, clear refrigeration oil. Noncondensibles released from the purger bubble up through the column, indicating proper operation.

#### **PARTS LIST - APMF ELECTRICAL**

Control board	20-1836
Power board	20-1845
3 amp fuse (5mm x 20mm) Fast-Acting for Power board	20-1698
Cable, control board	20-1837
Pressure transducer	20-1857
Temperature sensor	67-0052
High side level sensor	77-0796
Drainer and low side level sensor	77-0794
Solenoid coil kit, 230V with DIN plug	70-1055
Solenoid coil kit, 115V with DIN plug	70-1054

## PARTS LIST - APMF MECHANICAL

Solenoid tube/plunger kit	70-1059
APMF bubbler	20-2282
Strainer/orifice screen assembly kit	
includes strainer/orifice screen assembly and necessary o-rings	20-2285
Removable seat/orifice kits	
For solenoid valve (C)	70-1068
For solenoid valve (A) & (B)	70-1069
80 psid check valve	20-1949
Foul gas/liquid line strainer kit includes strainer basket and o-ring	78-1010