



Improvements To Carlyle D/E Compressors

Special points of interest:

- **Expanded** unloading limits for low temp R-22 systems.
- **Standardized** cylinder head sensor for 06E compressors.

Carlyle Compressor Division would like to announce two improvements to our 06D/E family of reciprocating compressors. The first improvement, expanding the unloading limits for low temperature R-22 systems, will allow our compressors to be more flexible while the second will help both the customer and our factory by standardizing on one cylinder head temperature sensor for all applications.

After several years of customer input and laboratory testing, Carlyle feels comfortable allowing the use of capacity control in low temperature R-22 applications. To insure the use of unloaders will not affect the reliability of our 06D/E compressors, certain guidelines must be followed.

Currently, Carlyle uses two different cylinder head temperature sensors for our 06E compressors, one for 06ER/EM and the other for 06EA compressors. The setting for the 06ER/EM sensor is 325° F while the 06EA sensor is set to trip at 295° F. After completing several tests to insure no nuisance trips will occur, we have decided to standardize on the 06EA cylinder temperature

- 1 The use of unloaders is limited to one bank on either the 4 or 6 cylinder 06D/E compressors.
- 2 The saturated suction temperature must not be allowed to drop below -25° F.
- 3 Unloading is only allowed with systems that are charged with mineral oil or Alkyl-Benzene oil. It is NOT allowed with POE oils.
- 4 It is recommended the compressor be operated loaded for 60 seconds every 2 hours to prevent oil from collecting in the compressor or other portions of the system.

sensor. As of the middle of August, all Carlyle 06E compressors will be manufactured with the 295° F sensor (Carlyle part number HN68GA295). In 06ER low temperature applications with R-22, system design must ensure that desuperheating is utilized to maintain the discharge temperature below 250° F, the limit noted in our OEM Bulletin #135.