



# **The Right Gasket**

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## **The Right Gasket**

As a Compressor Re-manufacturer, ThermaCom - RCR of Reading & Nottingham, routinely require over 300 different gasket profiles for their day to day production of open and semi hermetic compressors. Attention to detail is a vital consideration when specifying the thousands of gaskets they buy each year.

A common factor prevalent upon virtually all commercial refrigeration and air-conditioning systems is the continuous requirement for absolutely leak tight systems. If the vital refrigerant fluid leaks away, the system will simply stop. Over recent years with the advent of more exotic refrigerant gas blends to replace CFC's and the like, not only will the equipment stop, but getting it to run again has become and ever more expensive task.

Thus it is imperative all system joints must stand up to the system pressure and temperature variations routinely experienced in normal service. Generally the most densely jointed area will be at the humble compressor, particularly where open drive and semi-hermetic types are used. The compressor by it's nature is subject to vibration, uneven expansion rates in addition to the cycles of hot and cold, with some regions experiencing relatively extreme temperatures and pressures.

ThermaCom - RCR have found the only way to properly combat field leakage problems has been by taking firm control of their supply line for their specific needs. About 10% of the gasket shapes needed are relatively slow moving and many gasket makers are reluctant to offer small quantities without heavy cost penalties. However, the re-manufacturer still need a quality item available, but perhaps for only 20 or so at a time for certain shapes.

To further complicate the situation, until about 1998 the gasket World was dominated by CAF (compressed asbestos fibre), which was without doubt an excellent gasket material. With the outlawing of asbestos as a production material, the past few years have seen various materials available to emulate the excellent performance of CAF.

Having spent their several years scrambling to find a competent gasket supply source, they often received little interest from apparently competent gasket suppliers in wanting to properly support their product. Typically they would receive mixed batches of materials, often of dubious quality, made worse by poor tooling quality leading to gaskets that were distinctly 'rough at the edges', and, most crucially, often very very late. Rejects were unacceptably high.

As a re-manufacturer ThermaCom- RCR are acutely aware of the sensitivity of their clients to gas leakage, particularly with the wide range of gases the typical model of compressor is expected to operate upon with minimal internal alteration. To meet this challenge they required the gasket supplier to become properly involved in their problems, i.e. consistency of manufacture,

availability, and suitability for a relatively wide range of application within a highly specialised field.

As a result they have formed a close relationship with a renowned Gasket Producer. They have also bolstered the after-sales advice they provide to educate the clients' Field Service staff to ensure gasketed joints are periodically re-tightened in service, particularly after initial commissioning.

With the partnership with their supplier now maturing ThermaCom have reduced after-sale leakage reports to virtually nil. The supplier consistently supplies one product material type, 'Klingersil', and most profiles are cut by the latest Water Jet cutting technology. This saves massive pre-tooling costs, and enables multiple nesting of various shapes, which dramatically reduces not only material wastage but also the base cost and minimum order quantity.

Klingersil is widely regarded as one of the best materials available and field experience of this material has produced excellent results. Thus ThermaCom have effectively improved the quality of the Gasket item they now buy by using the best material they believe is available for our type of machines. Shortages leading to poorly presented and relatively expensive hand tooled items have also been minimised.

If you wish to benefit from ThermaCom's streamlined gasket supply, whether for a single service valve gasket or many thousands of gaskets why not contact them.

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