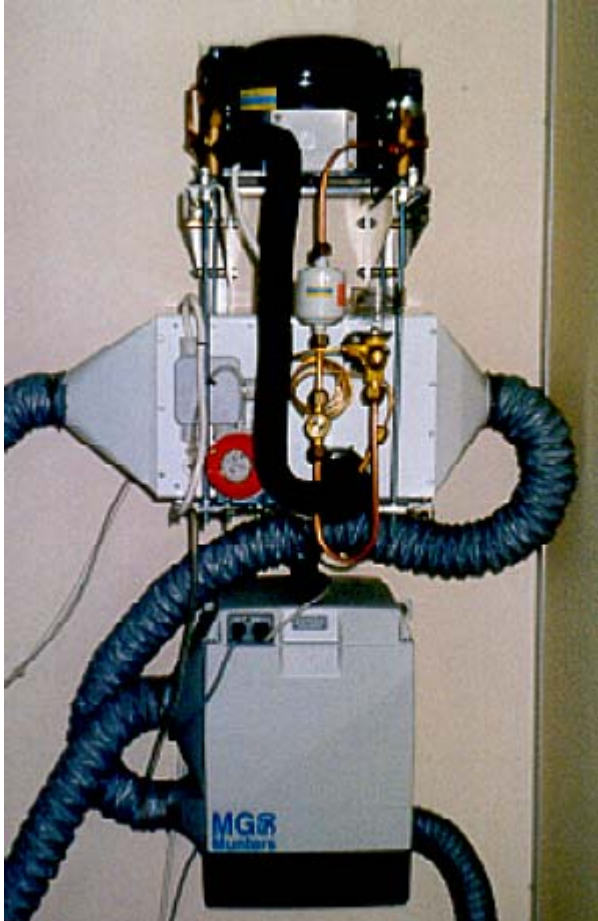


HiTech

A HiTECH SOLUTION FOR HYPOGUARD



SCOTTISH
SOCIETY
for
CONTAMINATION
CONTROL



When Hypoguard Ltd required a low humidity environment to store membrane for their series of blood testers they asked HiTech Controlled Environments Ltd to provide the solution. The requirement was to maintain a constant room condition of 27°C at 17%Rh in a room 2m x 2m x 2.2m and to achieve a close control in such a small space can be very difficult indeed; especially since the heating and cooling duties involved are so small. The HiTech solution was to design and build an air conditioning system unique to this project.

The room was constructed using standard 80mm polyurethane laminated panels and includes an insulated floor to provide an all round vapour seal on the door. The primary component of the air conditioning system is the dehumidifier, which in this case is a Munters' MG50; this also had the biggest thermal influence on the room since fabric heat gains are minimal and any product load is almost insignificant in this instance. When the dehumidifier is operating the supply air temperature increased to as high as 44°C and this must be cooled if the room temperature is to be maintained during the dehumidification process. Conversely, when the dehumidifier

was not operating, the desiccant wheel had a cooling effect once it settled at ambient temperature, which is usually below the required room temperature. To overcome these temperature fluctuations, HiTech's considerable expertise was employed in the design and manufacture, at their Suffolk premises, of a purpose built air conditioning system.

HiTech Controlled Environments Ltd, a Bury St Edmunds based company, prides itself that its strength lies in its ability to custom design a close controlled environment to meet any specification; this includes all the ancillary systems associated with the rooms such as lighting, compressed air, de-ionised water and waste disposal.

