



## **CASE STUDY – Beating the Cold in the Antarctic**

**BUFCA SUPPLIER:** BASF Polyurethanes U.K. Ltd

### **THE SITUATION**

On 6 December 2011, Sir Ranulph Fiennes set off from London on an expedition to travel across the Antarctic in the winter (the traverse started on March 21st 2012). It was the first time the feat had been attempted and the living and working quarters for the expedition members had to be insulated from the extreme cold Antarctic temperatures.

### **SOLUTION**

The two specially developed Cabooses were towed across the ice by tractors. With temperatures potentially reaching close to -90°C keeping the team warm was a top priority. The Cabooses were constructed from adapted steel shipping containers with corrugated walls. Walltite spray foam insulation has been used as an initial insulation layer, sprayed directly onto the steel shell where it fills the corrugations, providing a flat surface for further insulation layers and partitioning to be fixed as the interior layout is designed.

The conversion of shipping containers into living accommodation is increasingly common, and providing adequate insulation without causing condensation is always an immediate challenge. Walltite, sprayed directly onto the internal surface removes this condensation problem entirely and provides consistent and effective insulation across the area.

Walltite is a closed cell polyurethane insulation spray foam, providing a highly versatile and effective insulation system suitable for roofs, walls or floors. It is only supplied via approved contractors who have received the technical training and back-up from BASF to provide the highest standard of installation.

Photo credit: Harriet Woollorton