Hermetically Sealing Assemblies

The EMS provider Heicks recommends the use of the parylene process where reliable protection is needed for high-quality electronic assemblies, such as BGAs or QFPs, intended for use in industrial electronics systems, the automotive industry, aerospace applications and medical technology.

This vacuum coating procedure (CVD process) has high electrical strength and effectively insulates components and assemblies against moisture, corrosion, aggressive media and liquid hydrocarbons (petrol, diesel and glycol). In addition, it functions as a diffusion barrier to gases. Parylene-coated assemblies also meet the high standards required by salt spray tests.

As this sealing method can be used for coating deep, narrow cavities and component edges (no shrink-

age), it fulfils the requirements of military specification MIL I46058C. It is also worth noting that parylene coatings have the same thickness on vertical surfaces as on horizontal surfaces and are totally safe in physiological and toxicological terms (FDA approval). They contain no solvents or plasticisers and meet increasingly stringent environmental requirements (REACH, RoHS). Parylene is generally applied in thicknesses of between 1µm and 50 µm. Depending on the type of parylene used (N, C, D or F), the coatings can withstand temperatures of between -190 °C and +300 °C.

For further information, please contact: Heicks Parylene Coating GmbH, Geseke, Germany.

Weitere Infos: Heicks Parylene Coating GmbH, Geseke, www.heicks.de



Parylene-coated 3D MID demonstration car made of sodium silicate.

