

TECHNOLOGY HIGHLIGHT

Micro-Acoustics Take Center Stage

Designers and purchasers alike are applauding the progression of ever-smaller, ever-smarter acoustic interface options.

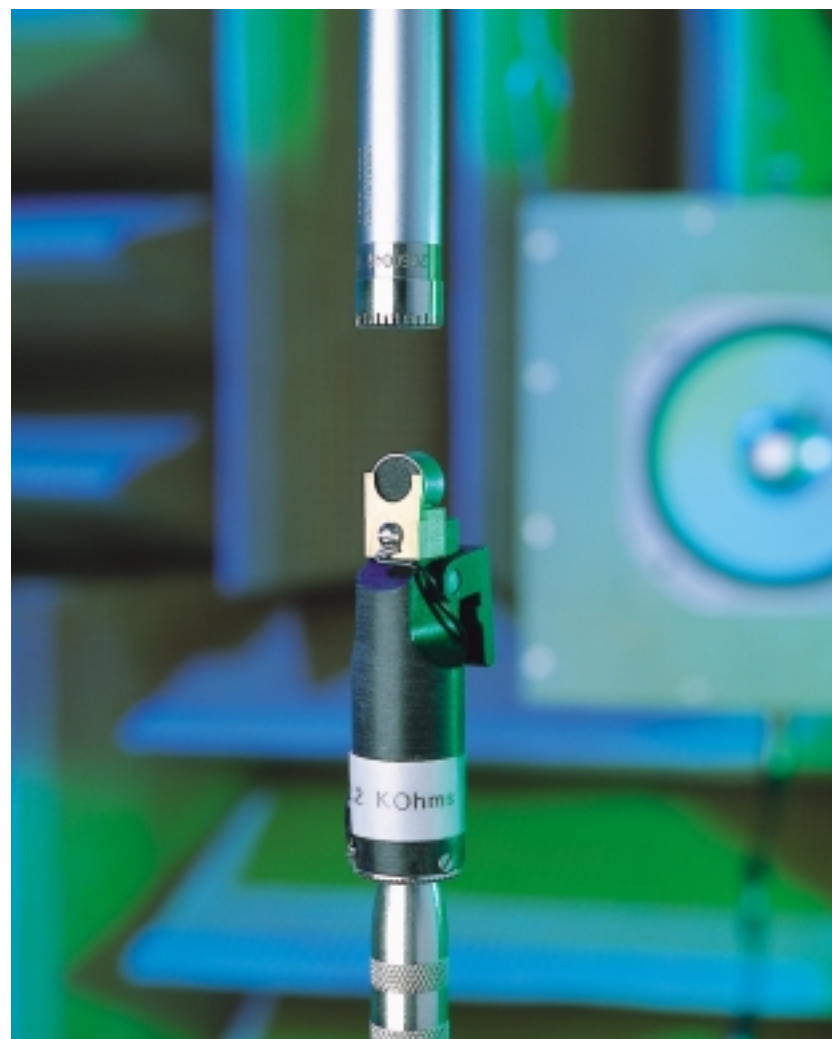
Until a few years ago, Emkay Innovative Products' greatest claim to fame was landing its microphones on the moon and Mars courtesy of their long-time customer NASA.

But today under the more familiar name of Knowles Acoustics (parent company Knowles Electronics is a leading hearing aid developer), the company is back in the spotlight as the long-time pioneer in acoustic interface development: *A year ago, the company launched the world's first MEMS surface mount microphone.* And while other micro-audio companies may still be testing in this area, Knowles Acoustics has already released its second and third generation SMD devices for "zero-height" and "pre-amplified" audio applications.

A Resounding Success for OEMs

Lower manufacturing costs. Smaller and thinner products. Higher product performance. Electronics OEMs liked what they heard last year from Knowles Acoustics. Now, global consumer electronics manufacturers are bringing the company's SiSonic™ line of silicon microphones to market inside of mobile phones, PDAs, DVCs, and the latest tsunami of audio-dependent consumer devices.

For electronics manufacturers, SiSonic surface mount microphones finally bring SMD capabilities to audio component selection. SiSonic microphones are unaffected by high surface mounting temperatures, so the product is supplied on tape-and-reel and can be run through standard automatic pick-n-place equipment, just like traditional surface mount equipment.



R&D in the spotlight: Anechoic chamber testing enables research engineers to fine-tune the acoustic performance of micro-audio components. Shown above in the center of the photo is an electret condenser microphone under test.

Changing the "Interface" of Micro-Audio

Not that the future of micro-audio belongs to SMD alone, or to any single acoustic technology. The engineering teams at Knowles Acoustics have remained unabashedly guilty regarding investigative sidesteps, whether to Mars or to other spaces unknown. Research-driven since the 1950's, the company continues to develop a range of micro-acoustic technologies that includes sound porting, microphones, speakers, and software.

On a mission to perfect the "acoustic interface", the company has extensive offerings in the areas of SMD microphones, condenser microphones, specialty transducers, customized sub-assemblies, and sound conditioning software.

For more information, contact Knowles Acoustics, York Road, Burgess Hill, West Sussex, RH15 9TT, England; phone +44-1444-235432; fax +44-1444-248724; email europa@knowles.com; or visit www.knowlesacoustics.com

