

LASEA appoints Rainford Precision as UK and Ireland agent

LASEA—a Belgium-based manufacturer of high-precision laser machines—has appointed Rainford Precision Machines (Rainford Precision), a UK-based supplier of precision tooling, as the UK and Ireland agent for its ultrashort pulse (USP) laser micromachining centres, namely the LS3, LS4, LS5 and LS6.

USP laser micromachining is used in multiple industries, including aerospace, electronics, eyewear, jewellery and medical, and its applications are many and varied. An especially important application in the medical industry is biomedical implant surface treatment for the modification, adaptation or enhancement of cellular interaction and improvement of bone mating. Laser-matter interaction and negligible thermal effects mean that it is possible to create unique surface structures and preserve material properties.

However, a limiting factor of conventional 5-axis USP laser micromachining technology in advanced biomedical studies has been the difficulty in processing 3D parts. LASEA has addressed this issue through its development of a 7-axis USP laser micromachining technology that combines



► Clockwise from top to bottom, the LASEA LS3, LS4 and LS5 ►



the five (x, y, z, a, c) mechanical axes of a 5-axis CNC system and two (x, y) optical axes controlled by a 2D scanner, used to optimise USP laser path generation. This means that complex 3D parts can be machined and engraved or textured using simultaneous motions, and both stitching error effect and cycle times are reduced.

The 7-axis technology is a feature of LASEA's LS4 ACCURATE 3D and LS5 ACCURATE 3D micromachining centres. All other models afford a combination of either one (z) or three (x, y, z) mechanical axes and the two (x, y) optical axes.

The LS micromachining centres are controlled using LASEA's KYLA software, thus allowing for capabilities such as positioning control, high-accuracy vision assistance and shop floor programming to resolve production issues.

UK- and Ireland-based precision engineering companies that are interested in learning more about LS micromachining centres are invited to contact Rainford Precision. ■

LASEAwww.lasea.eu**Rainford Precision Machines**
<https://rainfordprecision.com>

► From top to bottom, brass cutting, mother of pearl cutting and glass drilling applications. ►

