

Columbia Elektronik AB

INDUSTRY	Electronics
LOCATION	Sweden
APPLICATION	Testing Fixtures
PRINTER	X7
MATERIAL	Onyx ESD



Columbia Elektronik AB is a Swedish manufacturer of complete test fixturing solutions for the Nordic electronics industry. The company has seen a steady increase in demand for ESD-safe materials over the years due to the changing manufacturing landscape and rise in the need for more complex electronics. Columbia Elektronik — like many businesses — is looking for reduced labor hours, reduced costs, and the ability to continuously improve its products.

Test snap-fit fixtures pictured hold electronic components in place during testing. Previously, the team would either machine these fixtures or outsource 3D printed ESD-safe parts. Neither was a perfect solution — machining the parts in house limited geometric freedom and used internal machinist time, while third-party 3D printed ESD-safe parts had poor surface quality and dimensional accuracy. Columbia Elektronik now has the opportunity to use Markforged Onyx ESD, which will allow them to seamlessly manufacture complex parts. They were also able to save their customers both time and effort when using their product by improving functionality enabled by the freedom of additive manufacturing. Columbia Elektronik designed the 3D printed Onyx ESD fixtures in one piece instead of two, eliminating the need for additional assembly time or tooling. The team was also impressed by the cost reduction and the sleek surface finish of the fixture parts, straight off the print bed. “Now with Onyx ESD, we will be able to print high-strength ESD-safe parts on demand that are customer ready. With Markforged Onyx ESD, engineers and designers at Columbia Elektronik will finally have the tools they need to meet rising demands in their industry.”

“We are seeing an increase in demand for ESD-safe parts, to keep up with the advancements of the technology in our industry”

CHRISTER LANG
DESIGN ENGINEER
COLUMBIA ELEKTRONIK