

KUBTECÂ® Scientific launches XSEEDÂ® X-ray imaging systems to enable rapid seed quality assessment

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KUBTEC®, a global leader in X-ray imaging technology, has launched the XSEED® family of X-ray Systems, a range of high-resolution X-ray imaging systems and software solutions designed specifically for use in seed and agricultural analysis applications.

In contrast to traditional methods, such as tetrazolium chloride or germination testing, the XSEED systems can image the internal seed morphology in fully intact seeds, enabling non-destructive evaluation of seed quality in a fraction of the time.

DIGISEED® software provides researchers and seed specialists with the tools they need to perform precise, customizable, and repeatable seed analyses. DIGISEED software delivers quick seed characterization, including count, size, density, and fill percentage, in just seconds.

Furthermore, all XSEED systems are cabinet X-ray systems that can be used anywhere with little training. The systems can be installed in mobile labs to support research in the field, with only standard power required; no water or other resources are needed.

The XSEED family has 3 models - XSEED mini, XSEED, and XSEED Plus - designed to meet a variety of budgets and imaging needs.

A benchtop solution such as XSEED mini is an economical choice for laboratories with limited space. XSEED and XSEED Plus systems are equipped with a wide range of proprietary workflow management features such as Image Blender®, which combines X-ray and optical images. Using this combination, users can map externally visible damage to internal seed structures, as well as conveniently identify labelled samples, as sample data can be embedded right in the image. For optimal seed quality assessment, XSEED Plus provides detailed images of minute seed cracks, voids, and evidence of plant infestations.

Shane Smithee, Global Sales Manager of KUBTEC Scientific, said, "At KUBTEC we are at the forefront of X-ray imaging innovation, with many firsts in our 20 year history. We're very excited to now be the first company to design a line of X-ray systems and software specifically for agricultural applications"

Vikram Butani, CEO of KUBTEC Scientific, shared the vision that led to the launch of the XSEED family of systems. Butani explained: "Agriculture and the seed industry face significant challenges right now, including climate change impacting seed quality and yields, evolving pest resistance, and the need for increased agricultural productivity and sustainable farming practices. We are confident that XSEED can be a tool for addressing these challenges, and provide a more efficient, accurate, and insightful alternative to traditional seed testing methods."