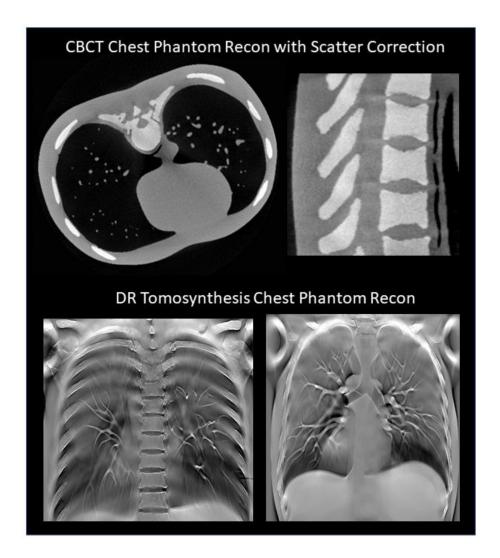




Advanced 3D Reconstruction Software for CBCT and DRT

The launch of IBEX Trueview[®] Recon represents a new era for high quality, artefact-free 3D reconstruction.

Trueview Recon, IBEX's 3D Reconstruction Engine, generates the most accurate reconstructions, with unparalleled HU uniformity, contrast, and noise, even at reduced dose. The state-of-the-art technique takes a unique AI and physics-based approach to tomographic reconstruction which considers the true origin of noise and artefacts to deliver high quality 3D volumes with minimal artefacts and low noise.





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Applicable to all tomographic X-ray systems including Cone Beam Computed Tomography (CBCT), Digital Radiography Tomosynthesis (DRT), and Digital Breast Tomosynthesis (DBT) systems, the software includes a range of artefact correction plugins such as metal and ring artefact reduction, beam hardening correction.

Trueview Recon also incorporates more advanced features including foreign object removal which can be used to remove casts, shoes, clothing, and any other unwanted objects from the volume.

The goal of the engine is to bring the image quality closer to that of multi-slice CT. Advanced post-reconstruction tools allow clinicians to bridge the gap between 2D and 3D imaging by generating fast, clear, and efficient visualisation of volume data with a familiar DR-style presentation.

Advanced Artefact Correction

Trueview Recon includes a range of powerful and accurate artefact corrections to deliver the highest possible image quality. This includes state-of-the-art noise management, scatter and beam hardening corrections and advanced metal artefact reduction.

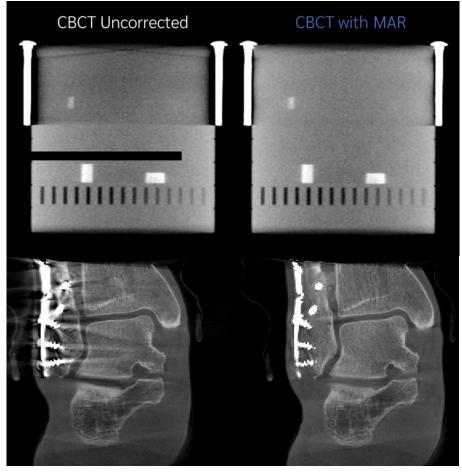




Figure 1 – Metal artefact reduction using IBEX Trueview $^{\circledast}$



Iterative Reconstruction Methods

Trueview Recon includes iterative reconstruction methods to actively reduce noise and artefacts and deliver the very best image quality.

It is designed with a flexible 3D geometry to cover all tomographic imaging modalities, including cone beam computed tomography (CBCT), digital tomosynthesis (DRT), and digital breast tomosynthesis (DBT) applications.

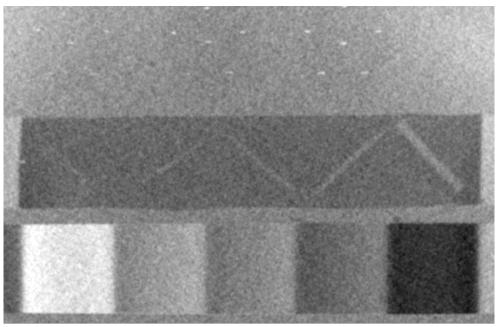


Figure 2 - Iterative DBT reconstruction using IBEX Trueview $^{\circledast}$

Advanced Visualisation

The product offers a package of advanced post-reconstruction visualisation tools to project 3D volume data into high quality 2D digital radiographs.

This method, known as Digitally Reconstructed Radiographs (DRRs), provides a means of offering quick and clear visualisation of 3D volume data, with the same image quality as found in regular digital radiography and with no limitation on viewing angle or orientation.

The DRR package uses a range of AI methods and segmentation tools, coupled with advanced multi-frequency image post-processing methods to deliver excellent image quality of projected 3D volumes.



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Figure 3 – Digitally Reconstructed Radiographs produced by CurveBeam CubeVue Insta-X and enhanced using IBEX Trueview®

Trueview Recon can significantly improve the imaging performance and competitiveness of your flatpanel tomography X-ray system by delivering the very best image quality through a range of iterative reconstruction methods and artefact corrections algorithms.

With a range of 3D volume advanced visualisation tools, Trueview Recon is a complete package for delivering the next level of performance to your tomographic X-ray system.

If you have any questions about IBEX and its range of X-ray imaging software solutions, please don't hesitate to get in touch - <u>ibexinnovations.co.uk/contact</u> - or visit our website to learn more – <u>ibexinnovations.co.uk</u>



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