CarestreamNDT

INDUSTREX HPX-1 Plus
Digital System

The INDUSTREX HPX-1 Plus Digital System is ideal for a lab environment where high-resolution is critical with adjustable PMT and laser power to fine tune every image for optimum capture every time. This CR system has a wide dynamic range with high sensitivity, making it suitable for almost any type of imaging application.

The Benchmark in Computed Radiography

HPX-1 Plus Digital CR System

The HPX-1 Plus is a full width CR reader capable of running the longest plates in the industry – up to 85 inches (216 cm) – with an imaging plate transport system specifically designed to protect imaging plates for longer life. It offers faster throughput on long saturated plates (very high exposure) and has a wide dynamic range with high sensitivity, making it ideal for almost any type of imaging application.

Whether you're using a gamma or X-ray source, the HPX-1 Plus high sensitivity can help reduce shot time. It shows exceptional performance in weld applications, delivering quality images consistently and dependably.

Built from the Ground Up Specifically for NDT

Ultra High Image Quality
Pixel Pitch: 25 µm, 35 µm, 50 µm and 100 µm operation
Spatial Resolution: 50 µm (10 lp/mm)

Positive Pressure Fans and Dual Air Filters (including HEPA) for NDT Environments
HPX-1 Plus is the only CR system on the market that has positive airflow and dual filters to keep contaminants outside the unit.

Image Plate Flexibility
Capable of handling single plates, multiple plates at one time, custom cut sizes (with plate carrier), imaging plates in rigid cassettes and long plates up to 85 inches (216 cm) without special feed guides.

Plate Transport System
The HPX-1 Plus plate transport system extends plate life-cycle by minimizing contact with the imaging plate. Unlike costly magnetic plate drive systems that require uniquely designed imaging plates or drum systems using plate protective covers, the HPX-1 Plus runs plates phosphor side up with a transport system that won't damage your plates.
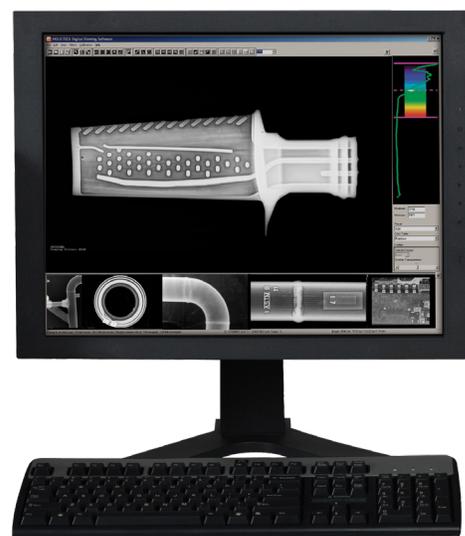
Fine Tune Imaging
HPX-1 Plus optics improve sensitivity and reduce unwanted artifacts. CR systems often make it possible to lower your exposure while still achieving the required sensitivity. Our adjustable PMT and Laser Power allow you to fine-tune images for optimum capture.

Powerful INDUSTREX Digital Viewing Software

The HPX-1 Plus runs on INDUSTREX Digital Viewing Software, an all-in-one software enabling customers to standardize on one software platform both CR and DR inspection.

The software platform was developed for ease-of-use to reduce operator training and equipment onboarding time, thus reducing risk of error and increasing profitability. Further operating cost reductions are realized with the suite of image process automation tools to streamline the inspection process and increase production rates.

The combination of high-resolution defect detection, a heavy-duty design, reliable service and powerful image processing software gives unsurpassed value to every customer.

Dual Layered HEPA Air Filters feed clean air to the system.

Positive Airflow – Three large fans blow positive air through the unit to to keep contaminants out.

Sturdy Knights Armor colored molded outer shell for protection in rugged environments.

Plate Transport – Low contact design minimizes contact with imaging plates.

Vibration Absorbing Feet – Minimizes vibration artifacts and reduces maintenence issues.

Halogen Erase Lights – Extra bright to mimimize ghost images, even on saturated plates.

SmartErase – System will check plates after scanning and during the erase cycle automatically adjust and optimize the erase level.

Imaging Plate Flexibility – Accepts bare plates, extra long and custom cut plates. Also accepts rigid cassettes for optimal plate protection. Optional plate carrier can transport plates as small as 1 x 1 inch. (2.5 x 2.5 cm)

System Status – Diagnostic Tool – optional accessory allows user to monitor system stability per ASTM E2445.

Adjustable PMT and Laser Power – Simple to change PMT and Laser settings allow fine-tuning for the best image possible.

Ultra High Resolution imaging.

The HPX-1 Plus Will Change the Way You Work

Easy to Install and Set Up

With only a few cable connections you can be up and running fast. Our INDUSTREX software is DICONDE compliant and designed for optimizing workflow to improve productivity.

Shot Time Improvement

Shoot faster, radiate less and keep your source longer. In certain circumstances, it's even possible to reduce exposure time.

Process, Analyze & Approve

THE HPX-1 Plus can process imaging plates up to 85 inches (216 cm) long. Preset the system so images appear with the desired filters already applied and approve in one click.

Customized Reporting

Create a customized job report by simply selecting the shots to be included and click "create report."

Performance Accessories

- GP, HR and XL Blue imaging plates
- Small plate carrier
- Diagnostic tool to monitor system stability
- Job setup module (DICONDE)
- DR panel interface
- Archiving interface

Swap-Out Service Repair

Comes with one full year of Swap-Out Service Repair. If your unit goes down during warranty we will ship you a loaner so you can keep working.

SPECIFICATIONS

System Type	Computed Radiography (CR)		
Scanning Capture	16 bit linear or 12 bit log		
Throughput: Single Plate	66 plates/hour for qty (1) - 14 x 17 in @ 100 μm		
	33 plates/hour for qty (1) - 14 x 17 in @ 50 μm		
Throughput: Multi-Plate Scan	274 plates/hour for qty (3) - 4.5 x 10 in @ 100 μm		
	151 plates/hour for qty (3) - 4.5 x 10 in @ 50 μm		
Imaging Media	Accepts both rigid cassettes and flexible plates		
Rigid Cassette Sizes	10 x 8 in	10 x 12 in	14 x 17 in
Flexible Plate Sizes	10 x 8 in	4.5 x 17 in	10 cm x 24 cm
	3.5 x 10 in	7 x 17 in	30 cm x 40 cm
	4.5 x 10 in	14 x 17 in	10 cm x 40 cm
	10 x 12 in	14 x 36 in	70 mm x 10 in
	3.5 x 17 in	14 x 51 in	70 mm x 17 in
		14 x 60 in	Custom plate sizes available on request
Multi Plate Scanning	Can scan multiple plates simultaneously without carrier or adaptors		
Laser Intensity	User selectable laser intensity		
Pixel Pitch	25 μm, 35 μm, 50 μm, 100 μm		
Spatial Resolution	50 μm (10 lp/mm)		
Operating Modes	Scan and Erase | Erase only | Scan and hold for preview before deciding to erase		
Erase	Smart Erase Halogen System: applies only the erase needed based on dose		
Erase Speed	Automatically varies from 0.2 to 2.2 seconds per inch travel		
Feed Mechanism	Internal horizontal roller pairs. Protected from dirt ingress to prolong plate life.		
Connectivity	Ethernet connection standard (1 Gb/s)		
Network	DICONDE compliant		
Air Flow	Filtered, positive air pressure in scanner keeps damaging particulates out		
Mirror Surfaces	Face downwards eliminating gravity driven particulates		
Maintenance	User serviceable wear parts		
Calibration	Fully factory calibrated and ready to operate		
Software	INDUSTREX (Turnkey ready, Windows 10 64 bit)		
Filter	EDGE is a unique display filter which runs without modifying the original image data Image is adjustable with a variety of pre-defined or user customizable settings		
Chassis	Rigid aluminum construction with vibration damping feet		
Power	100-240 VAC (Automatic Level Sensing)		
Warranty	One Year Parts and Labor		
Installation	Ships complete and can be easily and quickly installed on-site by the customer		
Dimensions	26 in (66 cm) x 23 in (58.4 cm) x 17.5 in (44.5 cm)		
Weight	120 lb (54.4 kg)		

BAM Design-type tested
Certification N°: BAM/ZBF/001/18

BAM Design-type tested
Certification N°: BAM/ZBF/002/18

The HPX-1 Plus Digital System has been BAM certified with our HR and XL Blue imaging plates, certificates BAM/ZBF/001/18 and BAM/ZBF/002/18 respectively. Our system meets requirements according to EN 14784-1:2005, ISO 16371-1:2011 and ASTM E2446-16.

Carestream manufactures these products in a certified Quality Management System which complies with the requirements of ISO 9001:2015

CARESTREAM NDT AND YOU.
WE'RE BETTER TOGETHER.

carestream.com/ndt

Carestream