DRYPRO
MODEL 873

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KONICA MINOLTA

LASER IMAGER

DRYPRO

MODEL 873

Giving Shape to Ideas

Fastest and smallest in the world

World's fastest drive power (*1)

By adopting a number of new technologies, the first printing time, for which a user has to wait at shooting, has been reduced significantly to about 50 seconds. Also, the compact body, which resembles a small copier, offers the same high performance as the large flagship machine. By processing approximately 180 sheets (mixed sizes) per hour, the unit contributes to the steep rise in the productivity of printing work.

*1: As of August 2008

Fully compatible with five sizes and the world's smallest design (*2)

The unit comes in less imposing compact body with 1150 mm in height and commands only 0.35 m^2 for an installation area while providing five sizes of printing film ranging from 14"x17" to 8"x10". Since it supports the main film sizes, it is possible to run a life-size printing operation. Also, it can support additional supply units of up to 3 trays. Film size can be selected depending on the purpose.

*2: Footprint as of August 2008

Full options for various purposes

The standard film supply uses two trays but up to three trays can be optionally mounted. An additional optional film supply tray for the DRYPRO 873 (five sizes from 14"x17" to 8"x10") is available, and any combination is possible depending on the purpose. Also, the 6-channel sorter is available, which is useful for sorting after printing.

Design for 30% energy saving

The dry imager involves heat processing in the imaging step. Konica-Minolta is aggressively tackling eco-friendly technology. In the usual printing operation, we managed to achieve a 30% reduction in electricity consumption compared with previous types (*3), realizing earth -friendly ECO dry.

*3: 8 hours/day, printing of 100 sheets

The mechanism, size, touch ····· all friendly for humans

User-friendly quiet design

The excellent design means the unit emits less noise for a user-friendly working environment. The actual noise is tuned to the lower tones with little high-frequency tones, making users feel the unit is quieter than the actual noise level. The overall noise, especially noise during the standby run, has been reduced. Even where the standby run is often used as an imager for the filmless era, it can provide a quiet working environment.

Thoroughly pursued ease of use

To realize user-friendly ease of use, we pursued easy, simple operation to allow users to intuitively grasp the body's condition. Status indicators, such as Film Empty, can be visibly recognized from a distance and the tray selection direct button at film setting have been adopted. Also, ease of operation has been realized like simple film setting with little mechanical operation.

Stable operation without HDD

The hard disk stores system data; however, there is a risk that any damage to the disk will cause the operation of the equipment to halt. With the DRYPRO 873, we changed the system configuration that activates the basic system software from memory and saves the image data to an external PC (*4). This change made it possible to eliminate the HDD from the body, contributing to stable system operation.

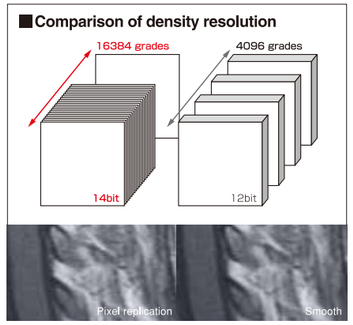
*4: ImagePilot, CS-2/3, ACIES, Printlink5-IN

Not just compact ···
Not just fast ···
The genuine ease of use and the feeling of safety were the goal.
The appearance represents user friendliness that creates a new dimension.

PERFORMANCE

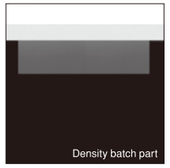
Provision of high-quality images

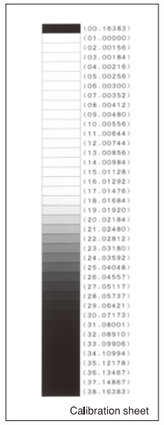
The image interpolation processing (pixel replication/function interpolation) has been enhanced, and intensity conversion processing has been adopted, which automatically recognizes images and letters in the images, executes proper processing, and displays smooth images and sharp letters.



Consistent quality finish

The DRYPRO 873 has an automatic density control function that prints constant exposure density batch onto the film, automatically measures the density with the built-in density meter, and controls the finishing density. Furthermore, the automatic calibration at film exchange enables image printing with consistent image quality.





Imaging Film SD-Q/SD-QM

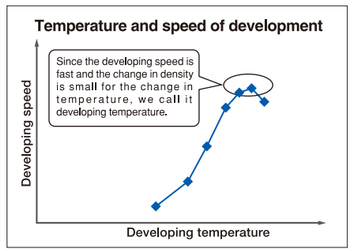
As for films for CR/modality (SD-Q) and digital mammography, the silver ion capacity that is pivotal for image formation on dry films has been greatly boosted and the ingredients of developer have changed to achieve highly sensitive, fast developing. As a result, sharp, stable images are swiftly provided.
One pack of daylight package contains 125 sheets that can be handled under room light. Both blue base and clear base are available depending on the purpose.

For digital mammography

The combination of the optical unit (43.75 μm) that enables detailed recording and the newly developed image recording film SD-QM can support a maximum density 4.0D. As for daily maintenance of mammography, this imager can support mammography QC patterns for film density control and can clean roller dust, which is an ideal response to digital mammography.

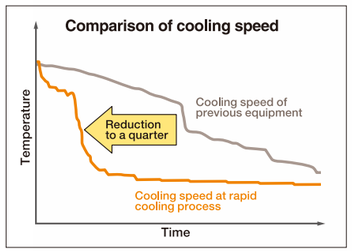
* Cleaning is recommended every 2000 sheets.

Unparalleled image stability and fast technology!
The pursuit of dry image quality has now evolved into a new dimension.



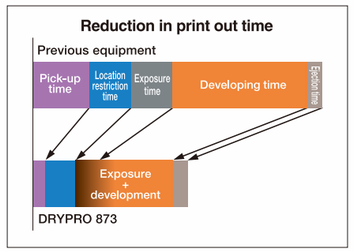
Reasons for fast printing Fast heat developing process

With the DRYPRO 873, the developing process has been fully reviewed to respond to fast and mass volume processing. Pre-heating the film from the early stage of film transfer is to be implemented. In addition to reducing unstable temperature areas when heating films, fast mass volume processing and excellent density stability have been achieved by dividing the heat developing part into five parts and closely controlling the process. Ten sheets of 14”x17”-size film can be printed within four minutes.



It is fast so it is small. Rapid cooling process

To increase the printing speed, in addition to increasing the speed of image formation, a completely new control has been added to the cooling process that comes at the end of printing. To rapidly cool films after image formation, a film temperature history control system that controls both heating and cooling has been adopted. By accurately halting heat development and greatly increasing the cooling speed and time (some quarter) compared with previous equipment, stable quality images can be swiftly obtained even in centralized processing. In addition to the speed, the increased cooling speed has enabled the drastic downsizing of the unit, contributing to the compact body size.



It is small so it is fast. The shortest film pass structure

To realize the compact body and the fast/mass volume processing, the hardware for the DRYPRO 873 has been overhauled. Various approaches to the compact imager, such as adoption of feed roller of film supply unit and adoption of the plate-method heating unit, have contributed to creating the shortest film pass structure. Speed and compactness have been realized.

**The first printing time is about 50 seconds.
With the world’s fastest dash speed,
this imager can print 10 sheets of 14”x17”-size film within 4 minutes.
The sufficient recording capacity exerts its power for usual modalities as well.
The excellent stability provides high-quality images.**

TECHNOLOGY

SPEC. & NETWORK

The network function and substantial specs th at take open and flexible imaging environment into account

Specifications for the DRYPRO MODEL 873

Laser source:	semiconductor laser	Input interface:	Ethernet 1000base-T
Film size:	Selectable from 14"×17"／14"×14"／11"×14"／10"×12"／8"×10"	DICOM Support:	DICOM Print Management Service Class, Presentation LUT Service Class …. (For details, refer to DICOM conformance statement)
Films to be used:	dry image recording films, SD-Q/SD-QM		
Image format:	1,2,4,6,8,9,12,15,16,20,24,25,30,35,36,42,48,54,56,60,63,64	Supply:	Two channels standard, maximum of three channels (option)
Image memory:	compact flash(standard 128MB) Main memory(256 MB) Print memory(256 MB)	Standby function:	Transfers to energy-saving mode after pre-set time for none-printing Boot time from the energy-saving mode is less than three minutes.
		Border processing:	Black/white
Input port:	maximum 16 ports	Image trimming frame:	Possible
Matrix(14×17):	REGIUS connection: 8079 × 9725 pixels(at 43.75 μm) Connection other than the REGIUS: 7730 × 9260 pixels(at 43.75 μm)	Density correction function:	Built in the body
		Negative/Positive:	Available
Matrix size:	78.6μm/43.75μm	Noise level:	Less than 53 db when printing／less than 46 db in standby
Image data input:	8-bit,12-bit	Footprint:	0.35 m²
Output grades:	16384 grades(14-bit)	Operation conditions:	15℃ to 30℃(59F to 86F), 30% to 70%RH (no condensation)
Image mode:	Pixel replication/function interpolation (with intensity conversion process function)	Power:	UL: AC 120 V±10% ;60 Hz ±1Hz 10A CE: AC 220 – 240 V±10% ; 50/60 Hz ±1Hz 6A
Processing capacity:	180 sheets/hour (mixed sizes/at ordinary modality)	Dimension:	H1150 × W599 × D585 mm Weight: approx. 152 kg(335lb)

Options for the DRYPRO MODEL 873

873 additional supply tray/ 873 additional supply tray for mammography

・The supply unit for the third additional tray compatible with five sizes (14"×17"/14"×14"/11"×14"/10"×12"/8"×10") There are two types, ordinary type and mammography.

873 sorter (6 bin)

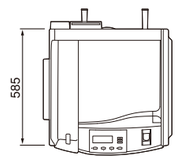
・This sorter is useful to sort films. One bin can stock up to 30 sheets.

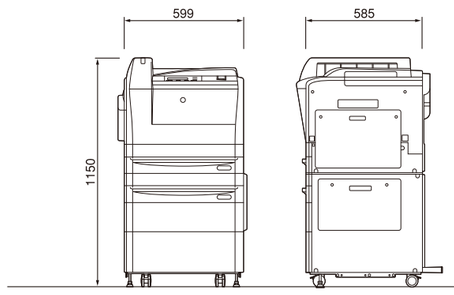
Demension: H1459 × W599 × D585 mm(873 body +sorter) Weight: 170 kg(374lb)(873 body +sorter) Number of bins: 6

Sheets that can stored: A maximum of 30 sheets/pin Film size: 5 sizes (14"×17"/14"×14"/11"×14"/10"×12"/8"×10") Power: provided by the DRYPRO 873

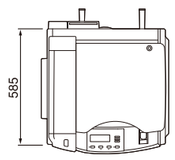
Outer sizes

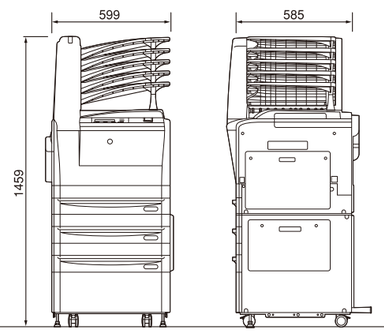
<Two channels standard specs>





<Three channels/specs with a sorter>





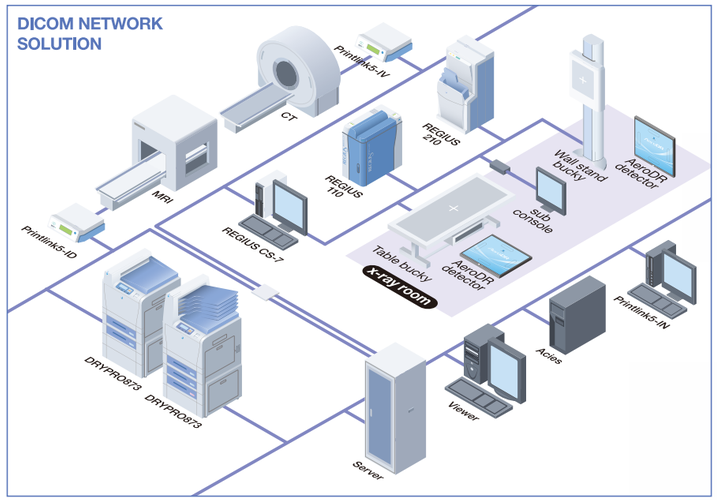
Unit: mm, magnification of 1/30

* The specs above are subject to change without prior notice for performance improvement.

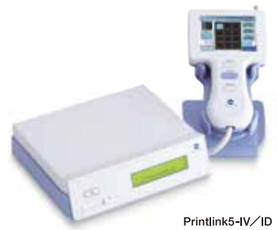
Imager Network-Building Support by Printlink

Printlink5-IV,ID,IN

The Printlink5-IV/ID unit provides an open network environment for imager systems by converting signals from diagnostic devices into DICOM 3.0 (Print Management Service Class) international standard protocol. When combined with the Printlink5-IN, the various licensed functions (optional) of the Printlink5-IN can also be used. The Printlink5-IN enables network printing from DICOM modalities. By employing a variety of different functions, the network can be expanded to include storage that transmits images to an image server or viewer, extraction of patient information from image data by the automatic character recognition function, enlarged printing of the identified patient's name and ID number in the film margin, and MWM compatibility.



Printlink5-IN



Printlink5-IV／ID

Storing and Handling Dry Film

Dry image recording film SD-Q/SD-QM does not require a WET process. When storing and handling film, be sure to observe the following.

1. Storing and handling unused film

After confirming that film is packaged, store unused film, like ordinary film, in a cool, dark place (recommended temperature : 10-23˚C (50-74˚F)) where it will not be affected by radiation. If film is stored in a place where temperature is more than 30˚C (86˚F) for a long period of time, the quality of the film may change. When storing film in a film storage, it should be stored in a place where temperature is not likely to rise.

2. Storing and handling processed film (image)

(1) As heat-processed-type film is susceptible to high temperature or strong sunlight even after it's processed, it should be stored in a cool, dark place. When storing film for a long period of time, be sure to place it in a film bag and store it in a place where temperature is 25˚C (77˚F) or below. The rise in density or discoloration may occur more frequently as the temperature rises.

(2) If the film is stored at a temperature of 40˚C (104˚F) or higher, this may cause density changes or discoloration even over a short period of storage. Avoid leaving the film in a car in daytime, or using it with a hot lamp etc.

(3) As the film is susceptible to strong sunlight as well as temperature, avoid exposing it to direct sunlight, or leaving it on a viewing screen for a long time.

Dry film should not be cleaned with alcohol or cleaning agents that may cause density blotching and other defects. The film is resistant to water, so it may be cleaned with a soft cloth dampened with water.