



**SIEMENS**



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# Luminos Fusion

The 2-in-1 system that fits your needs and fits your budget

Answers for life.

# Luminos Fusion

## The 2-in-1 system that fits your needs and fits your budget

Luminos Fusion provides the innovation of 2-in-1 in a system that solves the challenge of meeting your needs within your budget. In both radiography and fluoroscopy.



Luminos Fusion fits your needs with a large 43 cm x 43 cm image, a safer design and outstanding dose saving.

It fits your budget with proven 2-in-1 efficiency and our one customer experience with industry-leading technologies from our high-end systems. Resulting in an investment that fits.

## Fits your needs

- 43 cm x 43 cm
- SmartTouch
- CARE

## Fits your budget

- 2-in-1 efficiency
- 1 customer experience



# Large 43 cm x 43 cm image

With the 43 cm x 43 cm detector, Luminos Fusion provides large images in both radiography and fluoroscopy. Unique Siemens imaging technologies deliver excellent patient coverage with high-quality distortion-free images in radiography and fluoroscopy.

## 2-in-1 radiography and fluoroscopy with flat detector technology

### Excellence in fluoroscopy



Large 43 cm x 43 cm field-of-view



Fluoroscopy with up to 30 p/s



Easier procedures with excellent patient access from all sides

### Excellence in radiography



Large 43 cm x 43 cm field-of-view



High resolution radiography with low dose



Flexible positioning for a wide range of examinations

### Large dynamic flat detector

Combining superb coverage with exceptional image quality, the 43 cm x 43 cm flat detector delivers 2-in-1 imaging with distortion-free high-quality dynamic sequences and static images with a resolution of up to 3.4 lp/mm.

### Enhanced image quality

Unique Siemens image enhancement technologies improve image quality without increasing dose. DiamondView Plus reduces noise while increasing sharpness and soft tissue detail of radiographic images. Digital Density Optimization (DDO) improves image contrast and detail recognition in bright and dark image areas.





**Flat detector**

- 43 cm x 43 cm flat detector for excellent coverage
- High resolution fully digital radiography and fluoroscopy

With DiamondView Plus



Without DiamondView Plus



DiamondView Plus: enhances flat detector images by increasing the detail and contrast of both soft tissue and bone.

# SmartTouch

## Improves safety for patients and staff

Joysticks that are only activated with the touch of a human hand – preventing unintentional system movements. These touch-sensitive joysticks are part of a seamlessly intuitive user interface – keeping you in control.



### Touch user interface

The compact control console with an intuitive touch user interface allows easy access to all system functions at your fingertips. And as it is the same on all Luminos fluoroscopy systems, you only need to learn it once.

### SmartTouch – stay in control

The control console joysticks only allow system movement with the touch of a human hand. This innovation improves safety and is unique to Siemens fluoroscopy systems.



### Table-side controls

Comprehensive table-side controls allow easy access to the relevant functions without having to leave the patient's side. Saving you time and improving safety.

# Easy access

## For a more comfortable examination

Excellent access to the patient from all sides, a clean, compact table design and flexible system movement mean faster, easier and safer patient positioning.

### Safer patient positioning

Whether for transfer onto or off the table, during interventional procedures, or to reassure a nervous patient, the clean and compact table design means you have access to your patient without over-extending your reach. Resulting in easier and safer patient positioning.

### Positioning flexibility

Experience how the compact system design can adapt to almost any examination need – including free exposures, lateral projections, and even patients in wheel chairs or beds. This flexibility has benefits in examination speed, system utilization and patient comfort.



# Easy positioning For a faster examination

The 160 cm longitudinal table top movement means you can image your patient from head to toe with the simple touch of a joystick.



## Long table movements

Luminos Fusion's  $\pm 80$  cm longitudinal movement enables total patient coverage. Even with extreme tube or table angulations the area of interest can be quickly and comfortably brought into view.

## Single-touch positioning

With just one button press, the system can quickly and directly be moved to either a horizontal or vertical patient transfer position. Optimized for moving the patient onto or off the table, these positions shorten the preparation time for each examination.

## Low footstep

The lowest footstep height of just 4 cm above the floor makes stepping onto the system safer and more comfortable for your patients.

## Synchronized table movements

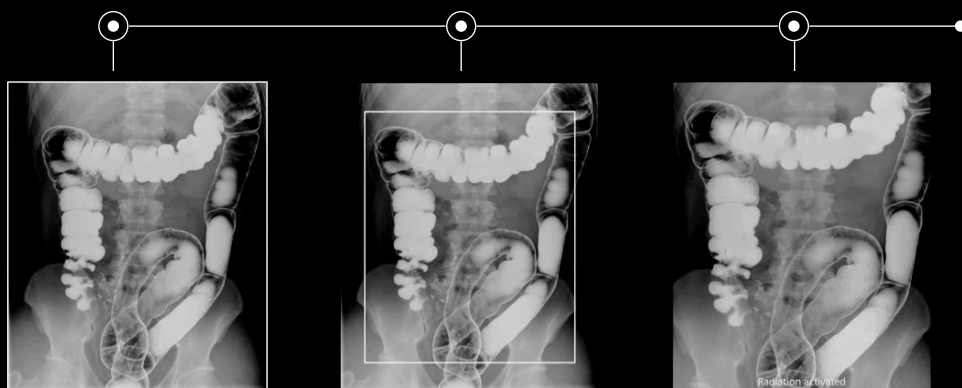
When the tube column reaches the end of its travel range, synchronized table movements automatically switch to table top movement. The area of interest remains in the field-of-view and you can continue without changing joysticks. This allows you to concentrate on the examination and your patient.



# CARE

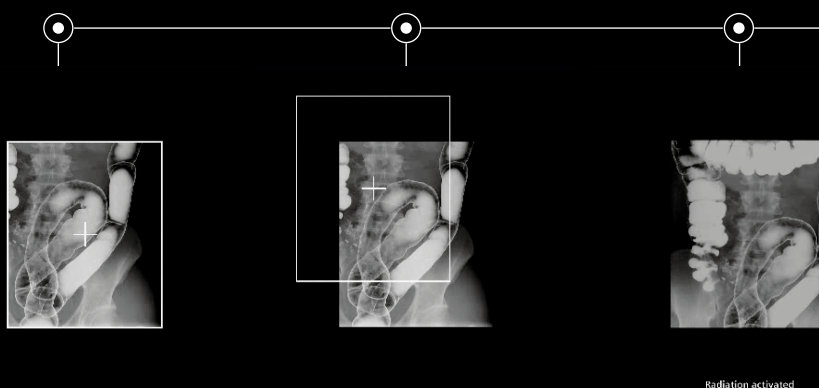
## Comprehensive dose saving

Lower dose for you and your patients. Combined Applications to Reduce Exposure (CARE) including the unique CAREPOSITION\* for radiation-free patient positioning, provide outstanding dose reduction without compromising image quality.



Radiation-free collimation with CAREPROFILE\*

- Begins with the last-image-hold (LIH)
- A graphic on the LIH displays changes in collimation without radiation
- The defined collimated field is then visible with the next fluoroscopy activation



Radiation-free patient re-positioning with CAREPOSITION\*

- Begins with the last-image-hold (LIH)
- A graphic on the LIH displays changes in the patient position without radiation
- The defined patient position is then visible with the next fluoroscopy activation

### CAREFILTER

Automated copper filter selection that reduces the body entrance dose.

### CAREMATIC

Automatic calculation and optimization of exposure parameters.

### CAREMAX

Dose area measurement and monitoring.

### CAREVISION

Pulse frequencies of 15, 7.5, and 3 pulses per second for low-dose imaging in real-time.

### CAREPROFILE\*

Radiation-free collimation is achieved using the last-image-hold for orientation.

### CAREPOSITION\*

Radiation-free patient re-positioning by using a virtual field display on the last-image-hold.

### FluoroLoop\*

Background memory buffer for retrospective viewing and storage of fluoroscopic sequences, reducing the need for re-exposure.

### Removable grid

Reduces dose in extremity and pediatric examinations.

\*Option

# Proven 2-in-1 efficiency

Luminos Fusion is a powerful addition to a broad range of clinical environments. The flexibility and high utilization of the system saves time, space and costs in both radiography and fluoroscopy. With the flat detector, images can be reviewed almost instantly, dramatically shortening examination times for you and your patients.



## 2-in-1 room utilization

The key benefit of 2-in-1 is increased room utilization. Luminos Fusion can quickly adapt to your mix of fluoroscopy and radiography and maximize system use. With the one-click digital workflow, and the fast and easy patient positioning, examination times are shorter and patient though put higher with both the image intensifier and flat detector versions.

## Wide range of options and applications

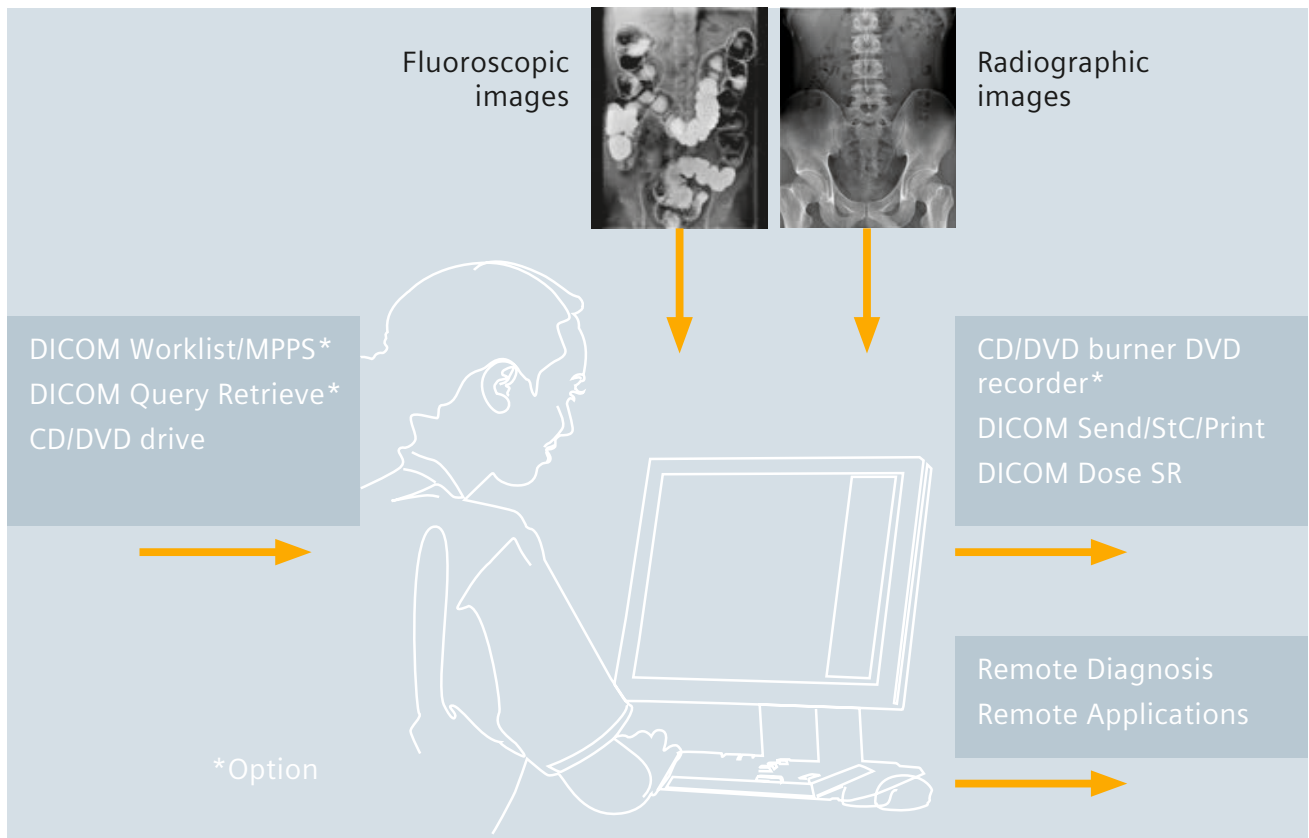
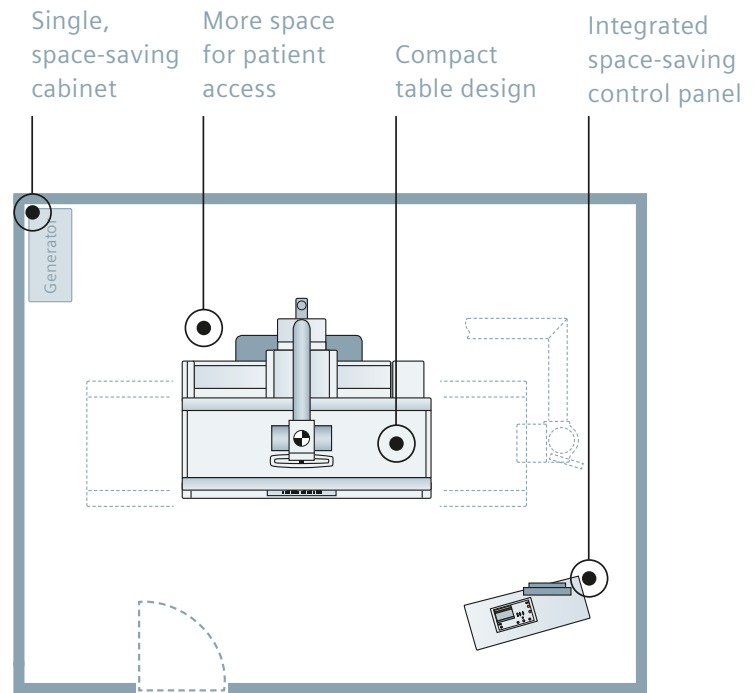
With Luminos Fusion, the choice of flat detector or image intensifier version is just the beginning. Applications such as digital subtraction angiography (DSA) and tomography expand the range of exams. And optional monitors and control consoles smooth your workflow. You can also increase flexibility in radiography with a Bucky wall stand and a ceiling suspended tube. The result is a system tailored to your needs and budget.

## Efficient space requirements

The compact table design, single space-saving generator cabinet and integrated control room panel mean easier installation and more flexibility in planning your department.

## One-click workflow

Luminos Fusion can be seamlessly integrated into your workflow. With *syngo* FLC you have a digital imaging and examination management system. It can be integrated into HIS/RIS and PACS. And it guides the user through the examination from registration to documentation. The result is a complete digital workflow and faster examinations.



# 1 customer experience – A trusted partner in radiography and fluoroscopy

Luminos Fusion is part of a one family platform that is unique to Siemens and combines industry-leading technologies from our high-end systems. With one usability, one digital workflow, one image impression and one service partner. The result is one customer experience, across all radiography and fluoroscopy systems from Siemens.



## Technology from Siemens high-end systems

Much of the technology in Luminos Fusion is from our high-end systems, including the high-frequency generator, the 783 kHU high anode heat storage capacity tube, the motorized collimator, the *syngo* FLC, and the flat detector. Bringing you high-end technology in a system that fits your needs and fits your budget.

## 1 usability

Because the user interface and control elements are the same across Siemens radiography and fluoroscopy systems, once you have used one Siemens system, you will be familiar with them all. This results in faster and easier training, more consistent examination results and more flexibility in staff allocation between different systems.

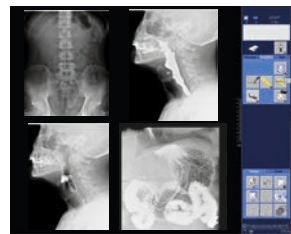
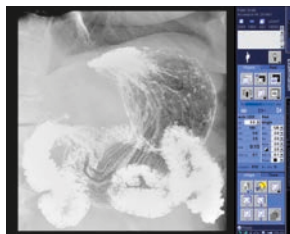
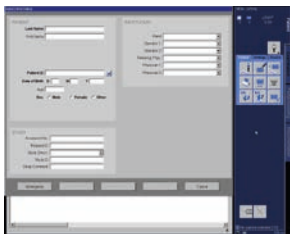




## 1 syngo FLC

The *syngo* FLC offers direct access to patient data and organ programs as well as image storage, review, and archiving. And the *syngo* user interface is common to all Siemens systems. The result is a consistent and efficient fully digital workflow across all Siemens radiography and fluoroscopy systems.

### One digital workflow



#### Registration

- Automatic organ program selection with DICOM worklist
- Emergency registration with just two clicks

#### Examination

- Last-image-hold
- FluoroLoop\* and image storage
- Advanced image processing

#### Post-processing

- Annotations, graphics, measurements
- Digital Density Optimization (DDO)
- DiamondView Plus for flat detector images

#### Documentation

- Send to archive, print, CD/DVD or USB
- Virtual film-sheet
- Optional video out (e.g. speech studies)



### 1 image impression

Siemens' unique imaging technologies and the intelligent organ program database provide you with a consistent image impression, independent of which Siemens system the image comes from. This provides for easier image comparison and more efficient patient scheduling.



### 1 service partner

Siemens fluoroscopy systems have proven reliability backed up by a world-wide service network. Innovations such as the Netviewer application gives you online access to system optimization and training. Helping you to maximize the potential of your system.

\*Option

# Luminos Fusion

## The 2-in-1 system that fits your needs and fits your budget



**2-In-1 efficiency**  
Increase utilization

**Easy access**  
Faster and safer  
patient positioning

Wide range of options  
and applications

**43 cm x 43 cm**  
Large image

**CARE**  
Outstanding dose reduction

Ceiling suspension and  
wall stand expand flexibility

**1 customer experience**  
**1 usability**

**Smart Touch**  
Improves safety

**1 service partner**  
Remote support



Luminos Fusion is not commercially available in all countries. Due to regulatory reasons its future availability cannot be guaranteed. Please contact your local Siemens organization for further details.

The information in this document contains general descriptions of the technical options available and may not always apply in individual cases.

The required features should therefore be specified in each individual case at completion of contract. Siemens reserves the right to modify the design and specifications contained herein without prior notice. Please contact your local Siemens sales representative for the most current information.

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In the interest of complying with legal requirements concerning the environmental compatibility of our products (protection of natural resources, waste conservation), we recycle certain components. Using the same extensive quality assurance measures as for new components, we guarantee the quality of these recycled components.

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