SAMSUNG

ACCELERATING
PERFORMANCE

GF85
(GF85-3P, GF85-SP)

GF85

Floor-mounted Tube Stand

Type	Automated
Longitudinal travel range	59.1 in (rail length: 79.5 in), 82.7 in (rail length: 103.1 in)
	102.4 in (rail length: 122.8 in), 129.9 in (rail length: 150.4 in)
Vertical travel range	59.1 in (15.7 in ~ 74.8 in)
Vertical movement method	Manual and Motorized
Vertical movement speed	≥3.5 inch/sec
Tube rotation around the horizontal axis	260° (±130°)
Tube rotation movement method	Manual and Motorized
Column rotation angle range	±90°
Column rotation movement method	Manual only
Arm lateral movement range	Approx. ±3 inch
Arm lateral movement method	Manual only
Motorized Power Assist System	Yes
Multi-functional display with color touch screen	12.1 inch touch screen ⁻ Automatic SID measurement, Display of tube rotation angle ⁻ Automatic/Manual modification of kV, mAs and ms, Focal spot selection ⁻ System standby, System movement check, Projection setting, Provision of screen information ⁻ Image collection, Image preview, positioning help ⁻ X-ray projection related information entry, Intra-radiology lab image check possible after X-ray photography ⁻ Auto-repositioning setting, Smart Stitching function related information entry
Camera* for patient monitoring and stitching	Yes
* Optional	

Tube

	Type A	Type B	Type C
Tube construction	Rhenium-Tungsten faced Molybdenum	Rhenium-Tungsten faced Molybdenum	Rhenium-Tungsten faced Molybdenum
Tube heat storage capacity	1339 kHU (950kJ)	1250 kHU (900kJ)	1250 kHU (900kJ)
Anode heat storage capacity	400 kHU (280kJ)	300 kHU (210kJ)	150 kHU (111kJ)
Anode angle	12°	12°	12°
Focal spot size	0.6 mm/1.2 mm	0.6 mm/1.2 mm	0.6 mm/1.2 mm
Permanent filtration	0.8 mmAl @75 kV	0.9 mmAl @75 kV	1.3 mmAl @75 kV
Anode speed	Min. 3200 rpm (60 Hz) Min. 9700 rpm (180 Hz)	Min. 3200 rpm (60 Hz) Min. 9700 rpm (180 Hz)	Min. 3200 rpm (60 Hz)

* Tubes and HVGs must be ordered in matched pairs as follows; 80 kW HVG – 400 kHU Tube, 65/50 kW HVG – 300 kHU Tube, 40 kW HVG – 150 kHU Tube
* The available tube assembly may vary by country and date.

High Voltage Generator

	Type A	Type B	Type C	Type D
Model name		GF85-3P		GF85-SP
Max. output power	80 kW, 150 kVp, 1000 mA	65 kW, 150 kVp, 800 mA	50 kW, 150 kVp, 630 mA	40 kW, 150 kVp, 500 mA
Exposure voltage	40 ~ 150 kV (1kV step)	40 ~ 150 kV (1kV step)	40 ~ 150 kV (1kV step)	40 ~ 150 kV (1kV step)
mA range	10 ~ 1,000 mA	10 ~ 800 mA	10 ~ 630 mA	10 ~ 500 mA
mAs range	0.1 ~ 1,000 mAs	0.1 ~ 1,000 mAs	0.1 ~ 630 mAs	0.1 ~ 500 mAs
Exposure time range	0.001 to 10 sec	0.001 to 10 sec	0.001 to 10 sec	0.001 to 10 sec
Switching frequency	Max 250 kHz	Max 250 kHz	Max 250 kHz	Max 250 kHz
Line voltage	380/400/480 VAC±10%, 3-Phase, 50/60 Hz	380/400/480 VAC±10%, 3-Phase, 50/60 Hz	380/400/480 VAC±10%, 3-Phase, 50/60 Hz	208-240 VAC±10%, 1-Phase, 50/60 Hz
Generator cabinet dimensions (L x W x H)	(HVG) 454.0 x 359.5 x 461.5 mm (H/W) 405.8 x 501.5 x 483.0 mm	(HVG) 454.0 x 359.5 x 461.5 mm (H/W) 405.8 x 501.5 x 483.0 mm	(HVG) 454.0 x 359.5 x 461.5 mm (H/W) 405.8 x 501.5 x 483.0 mm	(HVG) 454.0 x 359.5 x 461.5 mm (H/W) 405.8 x 501.5 x 483.0 mm

* Select 1 type of 4 kinds of High Voltage Generator. The configurations may vary by country.

GF85

Collimator

	Type A	Type B
Collimation control	Motorized	Manual
Camera	Yes (RGB Camera)	No
Blade control	2 axis motorized control	2 axis manual blade control
Light	LED	LED
Additional filter	Selectable filter (0.1mmCu & 0.2mmCu & 0.3mmCu)	Selectable filter (0.1mmCu & 0.2mmCu & 0.3mmCu) (Manual)
Illuminance	>160 lux	> 160 lux
Inherent filtration	1 mmAl at 75kV	1 mmAl at 75kV
Rotation angle	-90° / +180° (Total 270°)	-90° / +180° (Total 270°)
ETC	Measuring Tape DAP Integration*	Measuring Tape DAP Integration*

* Optional

Patient Table

The flexible 6-way or 4-way table can endure heavy weight. Thin table legs make the best use of fixed space, and the outstanding traffic line will improve workflow.

	6-way movement	4-way movement
Table top dimensions (L x W)	31.5 x 86.6 inch	31.5 x 86.6 inch
Table top material	HPL	HPL
Table top X-ray density	<1.5 mmAl	<1.5 mmAl
Elevating (Up/Down) range	10.6 inch (19.7 ~ 30.3 inch)	Fixed (26.8 inch : Table top from the floor)
Longitudinal (Left & Right) movement range	±15.7 inch	±15.7 inch
Transverse (Front & Rear) movement range	±4.1 inch	±4.1 inch
Bucky movement range	23.6 inch(±11.8 inch)	23.6 inch(±11.8 inch)
Max. patient weight	661.4 lb for Static load center 661.4 lb for Dynamic load center 440.9 lb for Dynamic load off center	661.4 lb for Static load center 661.4 lb for Dynamic load center 440.9 lb for Dynamic load off center
Elevating speed from min. to max. height (No load)	0.6 inch/sec	N/A
Auto-tracking	Available	N/A
Auto-centering	Available	N/A
Shared Bucky™	Both of sizes (1714 and 1717) are available on a bucky.	
Available detector size	17 x 17 inch / 14 x 17 inch	17 x 17 inch / 14 x 17 inch
Detector installation	17 x 17 inch Fixed and 17 x 14 inch Rotation	17 x 17 inch Fixed and 17 x 14 inch Rotation
Grid configuration	85 lp/cm or none (SID 110 cm / 140 cm / 180 cm for In-bucky Grid, SID 110 cm, 130 cm for Portable Grid)	
In-Bucky charging	Yes / Detector Supply Voltage 240 VDC	Yes / Detector Supply Voltage 240 VDC

GF85

Wall Stand

	Type A	Type B
Up/Down range	59.1 inch (15.7 ~ 74.8 inch)	59.1 inch (15.7 ~ 74.8 inch)
Receptor tilting	Available (-20° ~ 90°)	N/A
Detector rotate range	17 x 14 inch Bucky Rotation, 17 x 17 inch Bucky Fixed	17 x 14 inch Bucky Rotation, 17 x 17 inch Bucky Fixed
Receptor rotation	Available (0° ~ 45°)	N/A
Auto-tracking	Available (Vertical and rotational tracking of tube with vertical travel and tilting of detector)	Available (Vertical and rotational tracking of tube with vertical travel and tilting of detector)
Auto-centering	Available (Automatically adjusts and centers the detector and the tube)	Available (Automatically adjusts and centers the detector and the tube)
LED indicator	The change of the light on the column shows the step of the test directly.	The change of the light on the column shows the step of the test directly.
Operating panel	Multi-functional operating panel Manual/Motorized Up/Down Motorized Receptor Tilting (-20° ~ 90°) Auto Sync Receptor Up/Down Receptor Tilt Up/Down Collimator Light On/Off	Multi-functional operating panel Manual/Motorized Up/Down Auto Sync Receptor Up/Down Collimator Light On/Off
Available detector size	17 x 17 inch / 14 x 17 inch	17 x 17 inch / 14 x 17 inch
Detector installation	Fixed or Removable	Fixed or Removable
Grid configuration	85 lp/cm or none (SID 110 cm / 140 cm / 180 cm for In-bucky Grid, SID 110 cm, 130 cm for Portable Grid	85 lp/cm or none (SID 110 cm / 140 cm / 180 cm for In-bucky Grid, SID 110 cm, 130 cm for Portable Grid
In-Bucky charging	Yes / Detector Supply Voltage 240 VDC	Yes / Detector Supply Voltage 240 VDC

Automatic Exposure Control (AEC)

AEC function prevents excessive radiation exposure.

Number of measuring fields	3
KV range	40kV-150kV Additional output sensitivities available upon request
Exposure time range	1ms-10s
Sensitivity typ.	0.6V/uGy @80kV/100mA/21mmAl Filter
Dose range	1uGy-50uGy@default sensitivity
Offset	≤50mV/10s
Output signal	0-10V@±12V or 0-12V@±15V
Deviation from chambers	≤3%@ default sensitivity
Deviation between fields	≤5%@ default sensitivity
Transmittance of X-ray	85%@40kV , 92%@80kV
Aluminum Equivalent	0.35 mm Al @ 100kV 3.6 mm Al HVL
Ionization fields voltage	102V±10V
Operating voltage	±12V or ±15V , ±5%
Operating current	+12V , ≤200mA / -12V , ≤100mA
Operating Temperature	10°C-40°C
Operating Humidity	10%-90% , Non condensing
Atmospheric Pressure	70-106kPa
Storage Temperature	-40°C-70°C
Storage Humidity	10%-90% , Non condensing
Storage Atmospheric Pressure	50-106kPa

GF85

Control Interface Box (CIB)

Power On/Off switch	For Tube Stand, Patient Table, Wall Stand and S-Station
Exposure button	2-Step (Ready, Shot) button
X-ray exposure Indicator	Standby : None, Ready : Green, Exposure : Orange
Emergency stop button	Yes

Network Specifications

DICOM functions	
- DICOM Verification (SCU)	
- DICOM Modality worklist (SCU)	Interface with HIS / RIS with auto refresh option
- DICOM MPPS (SCU)	Send the status of exams to HIS / RIS
- DICOM Storage (SCU)	Send Image (DX or CR IOD) and GSPS to PACS
- DICOM Storage commitment (SCU)	Send commitment status
- DICOM Grayscale print (SCU)	Support DICOM printers
- DICOM Query / Retrieve (SCU)	Query and retrieve DX and CR images from PACS
- DICOM GSPS (SCU)	Send overlay information along with the image
- DICOM Media exchange (DICOM DIR)	Patient images export to DVD/CD
- DICOM DOSE Structured Report (SCU)	Send Dose Information to DOSE Server
IHE Integration Profile	
- Scheduled Workflow	Acquisition Modality
- Patient Information Reconciliation	Acquisition Modality
- Radiation Exposure Monitoring	Acquisition Modality
- Consistent Time	Time Client
- Portable Data for imaging	Portable Media Creator

Remote Maintenance System (RMS)

The remote management system analyses performance and emerging technical issues.

Real-time use information	Rounds of filming, distribution of use, operating ration, new & re-filming rate and accumulated radiation dose.
Remote access	Real-time monitoring system enables quick responses to problematic situations. Remote assistant service allows auto-diagnosis and remote repair.

GF85

Workstation

Hardware	
- CPU	More than Intel i3
- RAM	16G (2x8GB) DDR4

- Storage	SSD 1 TB
	- Image storage capacity
	    F4343-AW : ~ 12,000 images
	    F4335-AW : ~ 14,000 images
	    S4343-AW/AWM : ~ 12,000 images
	    S4335-AW/AWM : ~ 14,000 images
	    S3025-AW/AWM : ~ 30,000 images
	- Hard drive encryption

- Operating System	More than Microsoft Windows 10
- Accessories	Keyboard, Mouse

Software	
- Image acquisition times* (X-ray exposure to image)	F4343-AW (Tethered) : Preview < 2 sec, Final < 5 sec F4343-AW (Wireless) : Preview < 2 sec, Final < 6 sec F4335-AW (Tethered) : Preview < 2 sec, Final < 4 sec F4335-AW (Wireless) : Preview < 2 sec, Final < 5 sec S4343-AW/AWM (Tethered) : Preview < 2 sec, Final < 5 sec S4343-AW/AWM (Wireless) : Preview < 2 sec, Final < 6 sec S4335-AW/AWM (Tethered) : Preview < 2 sec, Final < 4 sec S4335-AW/AWM (Wireless) : Preview < 2 sec, Final < 5 sec S3025-AW/AWM (Wireless) : Preview < 3.5 sec, Final < 6 sec
- Post processing	S-Vue™ - Protocol (Body part) adaptive multi scale image processing - Advanced noise reduction processing - Excess contrast reduction processing for minimizing metal artifact
- Display functions	Window level control, Zoom / Magnifier. Flip / Rotate, Invert, Shutter (Fixed / Auto / Manual), Grid View Annotations (Marker / Free text / Arrow / Line / Length / Angle / Cobbs angle / Rectangle / Ellipse) Layout (1×1, 1×2, 2×1, 2×2, Full Screen View)
- Auto cropping	Auto shutter (Rectangle / Polygon)
- Auto APR (Anatomical Programmed Radiography) Matching	X-ray conditions, Mechanical position, Image processing parameters, Marker etc.
- Multi-language	English, French, German, Italian, Spanish, Russian, Simplified Chinese, Portuguese, Turkish, Finnish, Swedish, Czech, Polish

Display	
- Size	23"
- Resolution	1920 x 1080 (16:9)
- Touch	Yes (*optional)
- DICOM	Yes

* It depends on the image processing parameters and wireless condition.

GF85

AccE Glass-Free Detector

Wireless Portable Detector

Detector model	F4335-AW
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	18.1 x 15.1 x 0.6 inch
Active detector matrix (Effective pixel matrix)	3,040 × 2,466 pixels
Effective area	16.8 × 13.6 inch
Pixel pitch	140 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	3.57 lp/mm
Detective Quantum Efficiency (DQE)	76% (0.0 lp/mm, Typical)
Modulation Transfer Function (MTF)	86% (0.5 lp/mm, Typical)
Installation	Wireless / Tethered
Image acquisition	Tethered / Wireless (802.11 a/b/g/n & ac) @2.4/5 GHz
AED	Available, v3.0
Weight	Approx. 4.4 lb (w/o Battery Set*), Approx. 4.9 lb (w/ Battery Set*)
Max. load capacity	881.8 lb for uniform load, 440.9 lb for local load (40 mm in diameter disk at the center)
Dust/Water-resistance	IP57
Self diagnosis	Automatic detection & correction of line artifact
Shock logging†	Real-time detection, logging and alarming of shock level
Battery charging time	Typ. 6 hrs. (Tethered), Typ. 3 hrs. (Battery charger)
Battery operation time	500 images for 4 hrs. Waiting for more than 10 hrs. under deep sleep mode

* The Battery Set includes the battery and the battery cover.
† Only shock logging data from F4335-AW, F4343-AW, S4335-AW and S4343-AW detectors is compatible with SMART Center.

Wireless Portable Detector

Detector model	F4343-AW
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	18.1 x 18.1 x 0.6 inch
Active detector matrix (Effective pixel matrix)	3,040 × 3,036 pixels
Effective area	16.8 × 16.7 inch
Pixel pitch	140 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	3.57 lp/mm
Detective Quantum Efficiency (DQE)	76% (0.0 lp/mm, Typical)
Modulation Transfer Function (MTF)	86% (0.5 lp/mm, Typical)
Installation	Wireless / Tethered
Image acquisition	Tethered / Wireless (802.11 a/b/g/n & ac) @2.4/5 GHz
AED	Available, v3.0
Weight	Approx. 5.5 lb (w/o Battery Set*), Approx. 6 lb (w/ Battery Set*)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center)
Dust/Water-resistance	IP57
Self diagnosis	Automatic detection & correction of line artifact
Shock logging†	Real-time detection, logging and alarming of shock level
Battery charging time	Typ. 6 hrs. (Tethered), Typ. 3 hrs. (Battery charger)
Battery operation time	500 images for 4 hrs. Waiting for more than 10 hrs. under deep sleep mode

* The Battery Set includes the battery and the battery cover.
† Only shock logging data from F4335-AW, F4343-AW, S4335-AW and S4343-AW detectors is compatible with SMART Center.

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AccE Detector

Detector model	S4335-AW
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	18.1 x 15.1 x 0.6 inch
Active detector matrix (Effective pixel matrix)	3,040 × 2,466 pixels
Effective area	16.8 × 13.6 inch
Pixel pitch	140 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	3.57 lp/mm
Detective Quantum Efficiency (DQE)	76% (0.0 lp/mm, Typical)
Modulation Transfer Function (MTF)	86% (0.5 lp/mm, Typical)
Installation	Wireless / Tethered
Image acquisition	Tethered / Wireless (802.11 a/b/g/n & ac) @2.4/5 GHz
AED	Available, v3.0
Weight	Approx. 6.1 lb (w/o Battery Set*), Approx. 6.6 lb (w/ Battery Set*)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center) > 440.9 lb @ 3-point bending condition
Dust/Water-resistance	IP57
Self diagnosis	Automatic detection & correction of line artifact
Shock logging†	Real-time detection, logging and alarming of shock level
Battery charging time	Typ. 6 hrs. (Tethered), Typ. 3 hrs. (Battery charger)
Battery operation time	500 images for 4 hrs. Waiting for more than 10 hrs. under deep sleep mode

* The Battery Set includes the battery and the battery cover.
† Only shock logging data from F4335-AW, F4343-AW, S4335-AW and S4343-AW detectors is compatible with SMART Center.

Detector model	S4343-AW
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	18.1 x 18.1 x 0.6 inch
Active detector matrix (Effective pixel matrix)	3,040 × 3,036 pixels
Effective area	16.8 × 16.7 inch
Pixel pitch	140 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	3.57 lp/mm
Detective Quantum Efficiency (DQE)	76% (0.0 lp/mm, Typical)
Modulation Transfer Function (MTF)	86% (0.5 lp/mm, Typical)
Installation	Wireless / Tethered
Image acquisition	Tethered / Wireless (802.11 a/b/g/n & ac) @2.4/5 GHz
AED	Available, v3.0
Weight	Approx. 7.4 lb (w/o Battery Set*), Approx. 7.9 lb (w/ Battery Set*)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center) > 440.9 lb @ 3-point bending condition
Dust/Water-resistance	IP57
Self diagnosis	Automatic detection & correction of line artifact
Shock logging†	Real-time detection, logging and alarming of shock level
Battery charging time	Typ. 6 hrs. (Tethered), Typ. 3 hrs. (Battery charger)
Battery operation time	500 images for 4 hrs. Waiting for more than 10 hrs. under deep sleep mode

* The Battery Set includes the battery and the battery cover.
† Only shock logging data from F4335-AW, F4343-AW, S4335-AW and S4343-AW detectors is compatible with SMART Center.

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AccE Detector

Detector model	S3025-AW
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	13.8 x 11.3 x 0.6 inch
Active detector matrix (Effective pixel matrix)	2,536 x 2,024 pixels
Effective area	12.4 × 9.9 inch
Pixel pitch	124 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	4.0 lp/mm
Detective Quantum Efficiency (DQE)	75% (0 lp/mm, Typical)
Modulation Transfer Function (MTF)	87% (0.5 lp/mm, Typical)
Installation	Wireless only
Image acquisition	Wireless (802.11 n/ac) @2.4/5 GHz
AED	N/A
Weight	4.6 lb (Typical)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center)
Dust/Water-resistance	IP67
Self diagnosis	Automatic detection & correction of line artifact
Shock logging	Real-time detection, logging and pop-up alarming
Battery charging time	2 hrs. (AC-DC adaptor)
Battery operation time	270 images for 7.5 hrs.

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AccE Standard Detector

Wireless Portable Detector	
Detector model	S4335-AWM
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	18.1 x 15.1 x 0.6 inch
Active detector matrix (Effective pixel matrix)	3,040 × 2,466 pixels
Effective area	16.8 x 13.6 inch
Pixel pitch	140 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	3.57 lp/mm
Detective Quantum Efficiency (DQE)	65% (0.0 lp/mm, Typical)
Modulation Transfer Function (MTF)	88% (0.5 lp/mm, Typical)
Installation	Wireless / Tethered
Image acquisition	Tethered / Wireless (802.11 a/b/g/n & ac) @2.4/5 GHz
AED	Available, v3.0
Weight	Approx. 6.5 lb (w/o Battery Set*), Approx. 7.1 lb (w/ Battery Set*)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center) › 440.9 lb @ 3-point bending condition
Dust/Water-resistance	IP57
Self diagnosis	Automatic detection & correction of line artifact
Shock logging	Real-time detection, logging and pop-up alarming
Battery charging time	Typ. 6 hrs. (Tethered), Typ. 3 hrs. (Battery charger)
Battery operation time	500 images for 4 hrs. Waiting for more than 10 hrs. under deep sleep mode

* The Battery Set includes the battery and the battery cover.

Wireless Portable Detector	
Detector model	S4343-AWM
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	18.1 x 18.1 x 0.6 inch
Active detector matrix (Effective pixel matrix)	3,040 × 3,036 pixels
Effective area	16.8 x 16.7 inch
Pixel pitch	140 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	3.57 lp/mm
Detective Quantum Efficiency (DQE)	65% (0.0 lp/mm, Typical)
Modulation Transfer Function (MTF)	88% (0.5 lp/mm, Typical)
Installation	Wireless / Tethered
Image acquisition	Tethered / Wireless (802.11 a/b/g/n & ac) @2.4/5 GHz
AED	Available, v3.0
Weight	Approx. 7.4 lb (w/o Battery Set*), Approx. 7.9 lb (w/ Battery Set*)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center) › 440.9 lb @ 3-point bending condition
Dust/Water-resistance	IP57
Self diagnosis	Automatic detection & correction of line artifact
Shock logging	Real-time detection, logging and pop-up alarming
Battery charging time	Typ. 6 hrs. (Tethered), Typ. 3 hrs. (Battery charger)
Battery operation time	500 images for 4 hrs. Waiting for more than 10 hrs. under deep sleep mode

* The Battery Set includes the battery and the battery cover.

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AccE Standard Detector

Wireless Portable Detector	
Detector model	S3025-AWM
Detector type	Amorphous Silicon TFT / Cesium Iodide scintillator (CsI)
Dimensions (L x W x H)	13.8 x 11.3 x 0.6 inch
Active detector matrix (Effective pixel matrix)	2,536 x 2,024 pixels
Effective area	12.4 x 9.9 inch
Pixel pitch	124 μm
A/D conversion (Pixel depth)	16 bits
Spatial resolution	4.0 lp/mm
Detective Quantum Efficiency (DQE)	60% (0 lp/mm, Typical)
Modulation Transfer Function (MTF)	90% (0.5 lp/mm, Typical)
Installation	Wireless only
Image acquisition	Wireless (802.11 n/ac) @2.4/5 GHz
AED	N/A
Weight	4.3 lb (Typical)
Max. load capacity	881.8 lb for uniform load 440.9 lb for local load (40 mm in diameter disk at the center)
Dust/Water-resistance	IP67
Self diagnosis	Automatic detection & correction of line artifact
Shock logging	Real-time detection, logging and pop-up alarming
Battery charging time	2 hrs. (AC-DC adaptor)
Battery operation time	270 images for 7.5 hrs.

GF85

Dose Area Product (DAP)*

DAP provides patient level dose estimates and recommended exposure. Also connected to PACS system, relevant information is stored on PACS, enabling cumulative dose tracking.

Response	
- Without additional absorber	800 pC/μGy·m^2
- With additional absorber (0.5 mm Al)	920 pC/μGy·m^2
Response versus radiation quality	-6 % / +0 % (50~150 kV, acc. IEC 60580)
Quality equivalent filtration	0.2 mm Al @ 70 kV
Transparency	>70 %
Active area (max.)	1 ~ 200 cm^2
Chamber voltage	300 V
Distance of the electrodes	6 mm
Stabilization time	5 min
Transportation Temperature	-20 ~ 60 °C
Transportation Humidity	10 ~ 80 % (max. 20g/m^3 ; non-condensing)

* Optional

H/W Optional Items

Accessories	P-bar for lateral exam for Stand
	Patient hand grips for Table
	Barcode Scanner
	Patient compression belt for Table
	Lateral detector holder
	Grid holder
	Auto Stitching Stand
	Detector Weight Distribution Cap (17x17 inch size)
	QAP - SW V3.09, 21 mm AL Filter, Phantom (Pehamed co. DIGRAD A+K)
	DVD-RW (External USB type)
	RFID Reader (Support 125kHz, 13.56MHz) (Recommended card type : HID Prox / iCLASS ID)
Detector Accessory	Detector Battery Charger
	Detector Battery

Grid	In-bucky Grid
	- Patient Table : 18.1 x 18.1 inch, 85 lp/cm, 10:1, SID 110 cm, Carbon Cover
	- Wall Stand : 18.1 x 18.1 inch, 85 lp/cm, 10:1, SID 140 cm, Carbon Cover
	                         18.1 x 18.1 inch, 85 lp/cm, 10:1, SID 180 cm, Carbon Cover
	Portable Grid
	- 1714 : 15.9 x 18.9 inch, 85 lp/cm, 10:1, SID 110 cm, Carbon cover
	               15.9 x 18.9 inch, 85 lp/cm, 6:1, SID 130 cm, Carbon cover
	- 1717 : 18.9 x 18.9 inch, 85 lp/cm, 10:1, SID 110 cm, Carbon cover
	               18.9 x 18.9 inch, 85 lp/cm, 6:1, SID 130 cm, Carbon cover

GF85

Smart Stitching* – Spine and long bone imaging

The X-ray tube and the detector move automatically when a full body image is being captured. It captures 2 or more images consecutively and then stitches the images into one. The Smart Stitching function can be operated using in two different methods; Tube Angle and Collimator Control.

Stitching range at Patient Table	Max. 37.0 inch for 4 images (14X17), Max. 40.2 inch for 3 images (17X14, 17X17)
Stitching range at Wall Stand	(Stand only) Max. 54.3 inch for 5 images (14X17), Max. 70.1 inch for 5 images (17X14, 17X17) (With table) Max. 54.3 inch for 5 images (14X17), Max. 58.7 inch for 5 images (17X14, 17X17)
Average acquisition time for a 3-images exam	‹ 17 sec (Stand), ‹ 18 sec (Table)
Image pasting and processing time for a 3-image exam	‹ 6 sec from last exposure (Stand/Table)
Grid configuration	85 lp/cm or none (SID 110cm / 140cm / 180cm)
Stitching direction	Top to bottom, Bottom to top

* Optional

S/W Optional Items

	Description
SimGrid™	Enhancing the visibility of image without physical grid by compensating the decrease in contrast caused by scatter radiation
SimGrid™ In-bucky	Extending SimGrid™ function to Stand/Table protocols
Bone Suppression	Improving the clarity of soft tissues by suppressing the appearance of bones in chest images
S-Enhance	Enhancing visibility of foreign body in chest, abdomen and l-spine images
CXR Assist Lunit INSIGHT CXR Triage	On-device CADt solution prioritizing time-sensitive patients (Only for the US)
QAP Package	Quality Assurance Program and Al Filter/Phantom
S-DAP	Software DAP (Dose Area Product) (Only for the motorized collimator)
S-Share™ [1]	Sharing detectors between GF85 and Samsung DR system
Value-up Package	Voice Guide / Image Auto Rotation[2] / Additional Patient Information / Prior Exam Review / S-Align™ Info. To DICOM / Detector Connection Alarm / Bariatric Exposure Management / Easy Protocol Management / Smart Crop Management / Virtual Remote Controller / Trauma Exam
Mirror View	Provide secured screen sharing of S-Station to the display device using Wi-Fi CERTIFIED Miracast
WBS Activation	Support verified wireless barcode scanner - Refer to the verified scanner list - Interface (Host/Wireless Scanner) : USB Serial/Bluetooth (2.4GHz-2.5GHz, ISM)
Vision Stitching (Stitching Manual Planning)	Planning the stitching range based on the camera image before Smart Stitching
Vision Capture	Providing patient snapshot for better understanding of patient condition and exam environment

1) There are restrictions on sharing between detectors, please refer to separate guide.
2) Image Auto Rotation supports Chest/Abdomen/Pelvis/Infantogram/Extremity protocols.

About Samsung Electronics Co., Ltd.

Samsung Electronics Co., Ltd. inspires the world and shapes the future with transformative ideas and technologies. The company is redefining the worlds of TVs, smartphones, wearable devices, tablets, cameras, digital appliances, medical equipment, network systems, semiconductor and LED solutions. For the latest news, please visit the Samsung Newsroom at news.samsung.com.

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