

# GENORAY MAKES INVISIBLE VISIBLE !



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## GENORAY RELIABLE SERVICES

Service and support is always our number one priority. If you require any service after the purchase of a Genoray unit, GENORAY is always there to support you. Our service staff is waiting to support you so please feel free to give us a call. We have built up a reputation for superior quality and service in Korea which we hope to extend to you.

\* The specifications above can be changed to improve performance without notice.



## prime OSCAR

### SURGICAL MOBILE C-ARM X-RAY SYSTEM



# GENORAY MAKES INVISIBLE VISIBLE

With the incessant challenge, and the enthusiastic passion, we, Genoray is the company committed to making contribution to the happiness and the healthy life of human being through the X-Ray technology, a valuable light which saves lives.

- Developed OSCAR Prime
- Established Genoray Japan, Genoray EU, Genoray America
- 1M CCD camera is equipped to all C-Arm  
Acquired CE certificate for ZEN-2090Pro  
ZEN-2090Pro FDA 510(K091918)  
Developed ZEN-7000
- Developed C-Arm with 1M pixel camera  
Developed economical C-Arm (ZEN-2060)
- Developed High Performance C-Arm (ZEN-3090)  
Acquired CE certificate for ZEN-3090
- Selected as Superior Technology Company  
Selected as INOBIZ Company, Awarded export prize  
Approved KGMP Quality Management Standard Conformity  
Awarded with "10 Million Dollars Trophy" from Korea International  
Awarded Design&Tech innovation grand prize

# YOUR OSCAR!

Our new level of C-Arm OSCAR prime is made by decades of developing experience of Genoray. Your needs will be satisfied and your productivity will be improved.



- 

230x230 / 260 x 260 mm Flat-Panel detector
- 

5.3kw, HFG
- 

Active air cooling HFG
- 

±180° Dynamic Orbital Rotation
- 

Free space 800mm SID 1,000mm
- 

10.4" Touch Screen
- 

34" Wide Monitor
- 

Dual Foot Switch (Shot/ Lift Up, Save/Lift Down )
- 

Smart Review
- 

Lowering Dosage
- 

Structured Dose Report
- 

-DICOM 3.0  
-CD/DVD Burner  
- USB Port



## YOUR CHOICE

- ### 1 FLAT-PANEL

230 x 230 / 260 x 260 mm
- ### 2 MONITOR

  - 34" Monitors
  - Two 19" Monitors
- ### 3 FOOT SWITCH

  - Dual Foot Switch
  - Triple Foot Switch

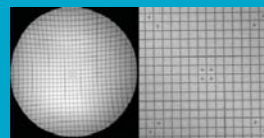
As a surgeon you need skill and dedication to perform an increasing number of challenging interventions. Crisp, clear images are also crucial, whether you are performing open surgery or advanced minimally invasive procedures.

# EXCEPTIONAL IMAGING QUALITY

Optimum size 23cm x 23cm flat panel detector doesn't miss a thing on image by its high quality resolution. It makes accurate diagnosis in variety of department especially DSA(Digital Subtration Angiography).



## DISTORTION-FREE FLAT DETECTOR IMAGING



Distortion & Brightness uniformity

Flat-panel highlights:

- > Larger opening
- > Distortion-free imaging
- > High-dynamic images
- > Larger field of view

Laser localizer marks exact field of fluoroscopy to decrease dose exposure.

## ACTIVE AIR COOLING HIGH FREQUENCY GENERATOR

Our 5.3kW generator is one of the powerful generator in the world. Active aircooling system prevent overheating and offer stable results and long duration of operation.



- High Performance Active Air Cooling
- Protect expensive parts (tube, HFG, etc.) from overheating and damage ; Guaranteed lifetime, safe medical treatment
- Response to increased use time & frequency with increasing interventional procedures ; Long-term stable X-ray
- Various Pulsed X-Ray
- Smart collimator

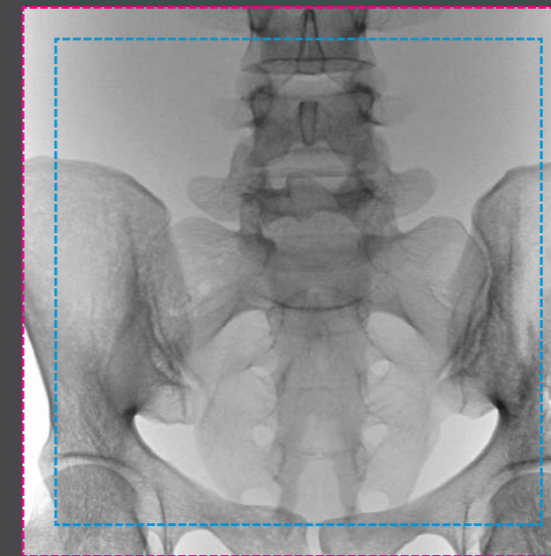
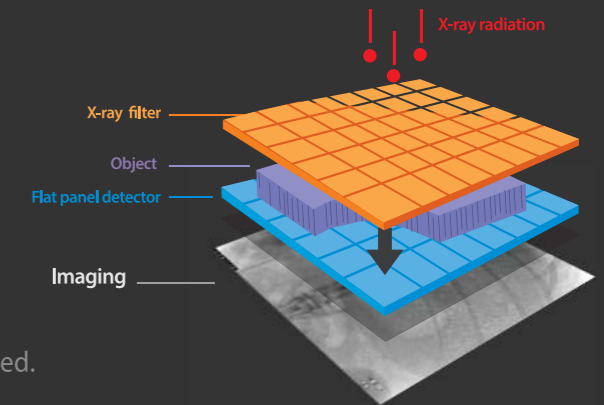
## SMART IMAGE PROCESSING

### HIGH SPEED READOUT, HIGH DEFINITION

flat panel detector doesn't miss a thing on image by its high quality resolution.

### WIDE FOV, LOW NOISE, LOW DOSE, HIGH CONTRAST RATE

Your needs will be satisfied and your productivity will be improved.



FOV (Field of View) 230 x 230 mm / 260 x 260 mm

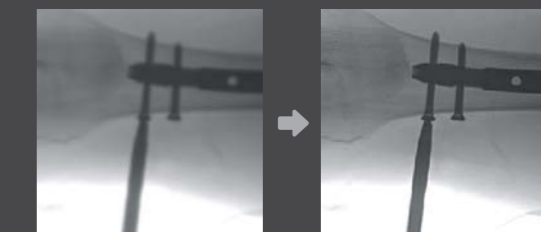
### EDGE ENHANCEMENT

For user to get more accurate diagnosis result enhancing edge of image.



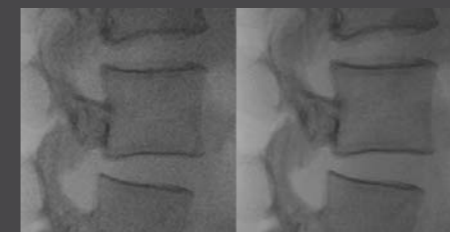
### METAL CORRECTION

To prevent over-dose radiation or low quality image casued by metal inturrption on field of view.



### DENOISING

Techniques to reduce noise through many X-ray image processing algorithms



### MOTION CORRECTION

This function detects the movement and reduce the after image while exposing X-ray.



# COMPACT & INTELLIGENT DESIGN

Convenient touch screen and simple foot switch make easy image acquisition.  
Rewind missed image by software to prevent retake of image.

## LIGHTWEIGHT ARCHITECTURE

OSCAR Prime is designed to be moved easily.

## INTELLIGENT OPERATION

Measurement of length, angle, and Input and storage of line, arrow, characters

## COMPACT & HYBRID BODY

Compact body with excellent movement and ease of operation with perfect balanced C-Arm

## 10.4-INCH TOUCH LCD

The 10.4-inch touch LCD Screen is highly sensitive and allows you efficient operation of the system  
live image

## 34-INCH WIDE MONITOR

34 inch wide monitor shows superior image by outstanding contrast, colour, and resolution.



  
 > C-Arm doesn't need to be flipped because of  $\pm 180$  degree orbital rotation.  
 Dynamic 800mm free space.

## X-RAY DOSE MANAGEMENT

### LOW DOSE MODE

Kind dosage! Low dose mode is to acquire the reasonable image to diagnose the patient with minimum dosage.

### SMART REVIEW

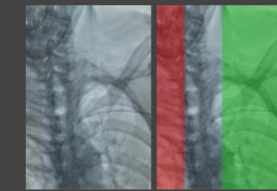
Review and store image maximum 10 seconds before last image.

### DOSE STRUCTURED REPORT

Dose SR enables efficient radiology workflow, improves patient care, and enhances the radiology working conditions.

### VIRTUAL COLLIMATOR

Reduction of exposure using virtual collimator  
Ability to set user's desired field in OP Panel without X-Ray investigation



### AUTO COLLIMATION

By automatically collimating the remaining areas excluding the area of interest according to preset reference values, unnecessary X-ray exposure prevention



### IMAGE CHAIN TECHNOLOGY

X-ray for acquisition of low-dose / high-quality medical images Image chain technology considering interaction with human body, detector, image processing algorithm etc.

# POWERFUL SOFTWARE ZENIS

A total solution from acquisition, storage, management, communication to print out  
 Provide convenient environment from user-centric interface /  
 Diagnosis and confirm from recognizable simple icons /  
 Convenience of database management



- Convenient diagnostic environment for easy management
- Accurate diagnostic tools
- Improve the efficiency of your hospital management

- Perfect compatibility with all PACS
- A must have for a digitally equipped hospital
- Convenient communication and management for your customers

## IMAGE MANAGEMENT

Invert, rotation, zoom In/out, magnify glass and etc

## MEASUREMENT & ANNOTATION

Measurement of length, angle, and Input and storage of line, arrow, characters

## DICOM 3.0

Storage service, worklist service

## RECOMMENDED SYSTEM REQUIREMENTS FOR ZENIS

## DATABASE MANAGEMENT IN HIPAA APPROVED FORMAT

## DICOM SUPPORT



## DSA [DIGITAL SUBTRACTION ANGIOGRAPHY]

Improves diagnosis by utilizing a repeating stored video feature along with detailed time measurement functions in the software.

### NATIVE DSA

To display contrast media included original fluoroscopy image

### MOTION MATCHING

To store various mask images and find proper mask and apply to remove artifacts made by patient's movement or breath.

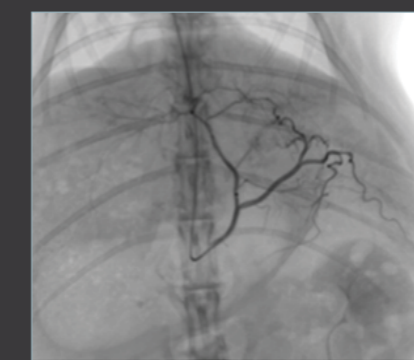
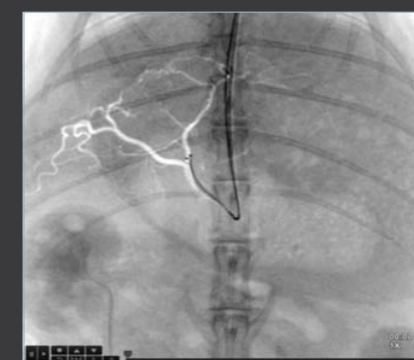
### POST-PROCESSING

To provide postprocessing function changing DSA mask, transparency, brightness and contrast by user after DSA.

### PEAK OPACIFICATION

To diagnose whole blood vessel by small amount of contrast media accumulating contrast media flow in blood vessel.

### LANDMARKING / BRIGHTNESS / CONTRAST



Guide wire insertion using Roadmap function

Live imaging with contrast injection

DSA images with non-vascular images removed

## Road mapping, land mark, Peak opencification and motion detection

After setting a position for a vessel, the subject can be moved back to their original place by using the shift function to compensate for any movement. Provides various functions that helps accurately to insert a guide wire, catheter. is compatible with the hybrid operating room.

### AUTO ROADMAP MASK

To use roadmap mask obtaining blood vessel type information using small amount of contrast media.

### MANUAL ROADMAP MASK

To use roadmap mask using previously taken DSA image.

### ROADMAP PIXEL SHIFT

To change position of roadmap mask.

### ROADMAP LANDMARKING / BRIGHTNESS / CONTRAST