Changing The World
One Hospital At a Time
miPlatform is an integrated All-in-One medical imaging platform, including: Enterprise PACS/RIS, Regional PACS, Web-based 3D post processing, Clinical image-based Conferencing, TeleMed/TeleRad and Mobile Imaging Systems. It supports:

- Browser/Server (B/S) based architecture
- Cloud-based image storage and computation
- Web-based workstations and viewers
- Web-based 3D image post processing and visualization
- Integrated TeleMed/TeleRad capability
- HTML5 based zero footprint cross platform mobile image viewing and 3D processing
miPlatform PACS/RIS System is based on a Browser/Server (B/S) architecture with optimized work flow management. It supports 24/7 online medical image storage; real-time on-demand image querying, retrieving and viewing; overview of patient historical examinations in time sequence and synchronized comparison between images from different examinations. It enables physicians to perform diagnosis and treatment planning with greater efficiency.

PACS System

Image Management
- Query, retrieve, store, distribute, process and display images and associated data (DICOM 3.0)
- Patient study browser
- Image input (DICOM 3.0 images stored on remote server)
- Network protocol (TCP-IP)
- Capture of key images and batches for saving as DICOM images for exporting

Image Reading / Review
- On demand real time image review
- Quick access of prior studies for comparison
- Comprehensive hanging protocol support for quick image layout
- Image measurement (for length, angle, area and etc.)
- Image operation (WW/WL, Pan, Zoom, Cine, Flip, Invert and etc.)
- Image annotation
- Report generating and reviewing
- Key Image panel for sharing with referring physician
- Print to film/paper capability
RIS System

Registration and Scheduling
- Patient registration
- Exam scheduling

Patient Information Management
- Information exchange with HIS/EMR
- Scanning of paper order
- Scanning of barcode
- Merging of patient examination records, with log record and privilege control.

Workflow Management
- Supports IHE, easy to integrate with HIS/EMR
- Calling & Queuing system, with flexible queuing rules.

Equipment Management
- Modality worklist support
- DICOM MPPS support
- Equipment scheduling support
- Statistics on equipment usage

Report
- Template-aided, highly efficient report creation
- General or user specific report templates
- Multi-level structured report templates
- Customer defined report templates
- Report reviewing
- Report revision history record
- Full text searching

Query & Statistics
- Pre-defined query filters
- User-defined query filters
- Printable graphic statistics report

miPlatform Image-based Conferencing System

System Architecture
- Browser/Server (B/S) based
- Flexible and extensible architecture, supporting all the specialists participating over the Internet, even under limited bandwidth conditions (2Mbps ADSL or 3G/4G wireless network)
- Can be integrated with existing third party PACS system within hospital/enterprise

Real-time Image-based Collaboration Conference
- Supports real time sharing of images/annotations/reports/measurements in an interactive manner
- Support concurrent access by multiple users during collaboration

miPlatform Image-based Conferencing System designed for online clinical image sharing and conferencing between specialists and referring physicians. It not only supports real time synchronization of diagnostic quality radiological images, but also ultrasound, pathology images and other type of images. Furthermore, image annotations, measurements and reports may be shared in real time manner during conferences, enabling highly effective communication between physicians, radiologists and radiologists. Allows hospitals to tele-consult with each other, and for specialists, from around the World, to participate over the Internet.
Web-based 3D Processing System

3D Visualization
- MPR (orthogonal, oblique, curved)
- MIP, MinIP, and AverageIP
- Volume rendering
- Remove, keep, restore ROI (region of interest)
- Bone removal
- Volume rendering presets
- Advanced semi-automated and manual segmentation to isolate anatomy
- Colored, volume rendering presets, optimized for imaging protocols

Vessel Analysis
- Vessel center line detection
- Vessel CPR
- Vessel cross sectional image
- Vessel center line editing
- Vessel length and lumen diameter measurement

Calcium Scoring
- Calcified lesion labeling
- Agatston scoring
- Calcium statistical report

CT Colonography
- Auto-segmentation of colon
- Fly-through and Transparent-wall views, increasing the speed and ease of polyp localization

Lung Nodule Analysis
- Auto-detection of nodule candidates
- Report on nodule findings and measurements

miPlatform Web-based 3D Processing System is developed based on a proprietary 3D Visualization Rendering Engine that is fully optimized using latest nVidia GPU parallel processing technology. Based on cloud-computing architecture, miPlatform Web-based 3D Processing System frees radiologists and physicians from the limitations of traditional 3D workstations. A radiologist may perform 3D post-processing and view results, including cardiac analysis and other clinical applications, using any device that’s connected to a miPlatform 3D server via the Internet. A clinician may view live 3D models and analysis results and confer with radiologist in real time, to facilitate and expedite diagnosis and perform treatment planning. It not only provides accessibility, but also cost savings for a hospital by eliminating the need to purchase multiple heavy duty & expensive 3D workstations.

Ready to be integrated with existing third party PACS systems within a hospital. Allows specialists, radiologists and physicians to participate in diagnosis and treatment planning from anywhere, at anytime.
miPlatform TeleMed/TeleRad System is designed based on industry leading technologies and provides high performance image transmission, viewing and image-based conferencing under typical web environments (as low as 2Mbps, or 3G/4G wireless network connection). It employs B/S architecture and is browser based to allow easy access and implementation. It provides integrated image/audio/video conferencing capability for real-time sharing of DICOM quality images, annotations, reports, measurements and other clinical information. It supports one-to-one and one-to-many conference mode, meeting the needs of tele-consultation and online teaching/training. Also integrated are conference assignment, monitoring, quality control and billing modules. It is scalable and may be deployed to support a single TeleMed/TeleRad dispatching center or multi-tier regional TeleMed/TeleRad centers.

Allows hospitals to tele-consult with each other, and for specialists, from around the World, to participate in diagnosis and treatment planning.
Overview: Collaboration across Distributed Hospitals

miPlatform Regional PACS Platform provides a scalable and flexible common platform for patient centric collaboration of medical imaging services across different hospitals in a region. It makes it easier for radiologists and specialists to share digital radiology images and reports so that they can become an integral part of the patient health record.

miPlatform Regional PACS Platform allows more effective use of medical imaging resources, including CT, MRI, X-Ray, US and other equipments. Medical staff resources, especially radiologists and specialists, are now able to collaborate and be shared across hospitals, thus allowing a hospital group to manage medical imaging services with higher efficiency and quality.

Architecture
- A Central Index Server is utilized to manage master patient and examination information across different hospitals.
- A hybrid model combines both centralized and distributed image storage modes, to best fit requirements of different hospitals.
- Web-based viewer provides access to images and reports, anywhere and anytime, to authorized users.
- Regional PACS Gateway bridges miPlatform with existing PACS/RIS/HIS systems in medical institutions to ensure smooth implementation and integration.

Benefits
- Radiologists will be able to collaborate and provide diagnosis on medical cases from different hospitals and clinics in different locations.
- Clinicians can have web-based secured access to patients’ historical medical images and reports from various medical facilities, easing follow-up evaluation and management of chronic disease.
- Healthcare administrators can have access to statistical charts, graphs and reports, with comprehensive view of radiological examinations taken across hospitals.
**miPlatform Mobile Imaging System** is consisted of a mobile imaging server platform software with a zero footprint cross-platform viewer implemented with cutting-edge HTML5 technology and compatible with iOS, Android and Windows operating systems. It enables anytime, anywhere access to images and reports via mobile devices, through WiFi/3G/4G networks. It allows radiologists to read images from any location, at any time, to cover emergency cases. It also allows clinicians to review images and reports, in real time, during daily rounds within a hospital. With integrated image based conferencing capability, real time tele-consultation becomes a reality. Combined with cloud based miPlatform 3D processing system, basic 3D review can be performed readily on any mobile device having adequate resolution.

Ready to be integrated with existing third party PACS/RIS systems within a hospital. Allows radiologists and physicians to participate in diagnosis and treatment planning from anywhere, at anytime.