

# Blended Learning for Computed Tomography

Success Stories



# Increase workforce productivity

## High service delivery achieved with online and onsite training

### Blended Learning Strategy



### CIM Laennec, Saint-Grégoire, France

“The installation of the go.All has been optimal. From the first day we were able to perform all the urgent examinations of the clinic (~15) and from the second day all external and hospital patients (~30). Before we started, the application engineer prepared around forty protocols adapted to our needs. This process allowed us to become familiar with the platform, which we did not know, very quickly and very smoothly. We quickly moved to the phase of optimizing protocols and improving image quality with the radiologists. In one week, 10 technologists were confident in using this new modality”

Nicolas Couëpel, Technologist

### Challenge

#### Optimize image quality

Experienced user with high expectations on image quality on the new SOMATOM go.All system

#### Optimize clinical operations

Advanced procedures needed to be performed from the start of daily operations

#### Manage reputation

Perform training while meeting high service delivery demands from in-hospital, emergency and outpatient departments

### Solution

- The existing customer relationship was leveraged to implement a blended learning approach, with elements of the user training being delivered remotely
- Protocols based on the SOMATOM Edge were implemented for the SOMATOM go.All and were remotely customized by a senior Clinical Education Specialist using the SmartSimulator\*
- Pre-training materials were assigned to groups using PEPconnect

### Value contribution

>45 Patients

≈10 Techs

Scanning from **Day 1**



Scanned within the first two days of training

Trained and confident in using the new scanner

Ability to scan high priority patients with confidence

# Increase workforce productivity: Improving the efficiency of training: much faster, much easier

## Blended Learning Strategy



### Santa Maria della Misericordia, Udine, Friuli Venezia Giulia, Italy

“The Virtual Training provided us operational effectiveness during the COVID-19 outbreak. All the team was able to attend and join remotely. Thanks to the SmartSimulator\* we could learn the user interface, the acquisition parameters and simulate the operativity of the scanner CT SOMATOM go.Top without any pressure. Despite the lack of previous knowledge about Siemens technologies, we’ve been able to scan routine examination before on site training could commence. Thanks to the blended learning the training was faster and easier”

Erica Trevisan, Radiographer

## Challenge

### Optimize clinical operation

Operational effectiveness  
from day 1 for users without  
experience on equipment  
from Siemens Healthineers

### Improve staff engagement

Provide fundamental product  
knowledge to entire  
workforce by using digital  
technologies

### Improve clinical reputation

Focus on the most important  
advanced clinical procedures  
with the onsite training

## Solution

- Created a blended learning curriculum to train more than 10 technologists to operate the CT scanner
- Pre-training of the CT scanner’s functionalities and capabilities was done using PEPconnect
- Training was managed using PEPconnect and SmartSimulator\*, and Microsoft Teams as communication platform, and was performed over 2 days (split into 2 shifts with 5 participants per shift). Participants were trained on the CT scanner with virtual acquisition workstations using SmartSimulator\*s in a Virtual Classroom setting
- Protocol customization was performed using the Smart Remote Services (SRS) connection during regular follow ups

## Value contribution

>10

>10 Techs

<3 days



Patients scanned before on-  
site training could commence

Trained online to confidently  
enable daily operations

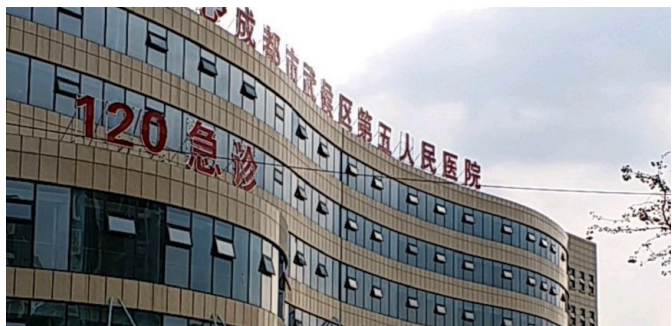
Of onsite training to scan  
advanced clinical procedures  
with confidence

The results by customers of Siemens Healthineers described herein are based on results that were achieved in the customer's unique setting. Since there is no "typical" hospital and many variables exist (e.g. hospital size, case mix, level of IT adoption) there can be no guarantee that other customers will achieve the same results.

\*Not for clinical use. For training purposes only.

# Flexible and efficient advanced training with digital technologies

## Blended Learning Strategy



Chengdu Wuhou District Fifth People's Hospital

“Through this remote training approach, more participants were able to attend the training. This proved to be highly efficient. We could solve problems at hand quickly. Training time was flexible, which was very important to us”

Mr. Deng Jia, CT Technician

## Challenge

### Expand clinical capabilities

Introduce product fundamentals to a large group of technicians

### Fixed training time

Difficult to reach all technicians for training due to very busy schedule, and changing work location

### Achieve customer confidence

Perform training and continue clinical operations efficiently

## Solution

- Blended learning approach, where virtual training prepared the ground for on-site advanced CT training
- Online collaborative tools allowed technicians to participate in Virtual Classroom sessions that covered theoretical content, enabling multiple users to attend the same training
- Each technologists could be trained on virtual acquisition CT workstations using SmartSimulators\*
- Remote support was provided using the Smart Remote Services (SRS) connection

## Value contribution

-2 days

100%

>90%

On-site follow-up reduced to achieve same overall training quality

Technicians trained on-line, otherwise not possible with prior on-site approach

Of follow-up questions could be answered immediately on-line



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# Increase operational efficiencies with remote Handover Training using digital technologies

## Blended Learning Strategy



Orlando Health Orlando Regional Medical Center, Orlando, Florida

“The pre-education was very helpful and having that resource is awesome. This combined with their onsite training make the transition very smooth!”

Terry Meierkort, Lead technologist

## Challenge

### Increase efficiency

With product training on completely new user interface and technology

### Improve quality of care

By optimizing scan protocols to different clinical workflows focusing on dose minimization

### Manage reputation

Avoid shift of patients to other sites by achieving confident routine operation shortly after initial training

## Solution

- Developed a blended learning schedule to complete training on the CT scanner for the 8 technologists slated to operate the system. Mandatory Initial training on PEPconnect for lead technologist
- Scan protocols were created in advance using SmartSimulator\*, this enabled focused training on routine workflows during the onsite visit
- Protocols from existing SOMATOM go.Top in outpatient center were adapted to X.cite in main hospital, minimizing adoption time

## Value contribution

<80%

>8 Techs

Scanning from Day 1

Of onsite time was spent on protocol configuration

Trained with PEPconnect, greatly increased confidence with new platform

Safe and confident scanning of routine and specialized procedures



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# Thank you for your enthusiasm!

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