



masterclass

DAY 1, 24<sup>th</sup> June 2024

ABC...

- 3.00 pm**     **Basics of IOUS**  
 IOUS for staging: B-mode and contrast  
 Open surgery: the access and the IOUS guidance MALS: lap  
 and robotic US exploration  
 Tips & trick for IOUS guided dissection  
*G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana*
- Coffee break*
- 4.00 pm**
- 4.15 pm**     **Case presentation**  
*G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana*
- 4.30 pm**     **The technological corner**  
 Ultrasound System  
 3D CAST  
*G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana*
- 5.00 pm**     **Hands-on with Phantoms**  
*P. Oliva*
- 7.00 pm**     *End of first day*

DAY 2, 25<sup>th</sup> June 2024

**Live surgery and intraoperative skills**  
*(participants will join the OR as observers)*

- 8:30 am**     **Live surgery from OR and intraoperative skills – 1° part**  
*Operation: Parenchyma-sparing hepatectomy for multiple CLM*  
*IOUS technique for liver exploration: probes and OR setting, IOUS & liver anatomy, Staging by IOUS*  
*G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana*
- 1:00 pm**     *Lunch*
- 2:00 pm**     **Live surgery from OR and intraoperative skills – 2° part**  
*Liver mobilization, Definition of surgical planning by IOUS-guidance, Liver resection under IOUS-guidance*  
*G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana*
- 5:00 pm**     *End of the second day*

## The Program

DAY 3, 26<sup>th</sup> June 2024

## LAB 3D

*(participants will join the work station to learn the 3D cast release)*

- 10.00 am**     **LAB 3D: how to build a 3Dcast**  
G. Torzilli / F. Procopio / P. Oliva / G. Costa / J. Galvanin / F. Milana
- 1:00 pm**     *Lunch*
- 2.00 pm**     **LAB 3D: 3Dcast simulations**  
G. Torzilli / F. Procopio / P. Oliva / G. Costa / J. Galvanin / F. Milana
- 4.00 pm**     **LAB 3D: 3Dcast printing**  
G. Torzilli / F. Procopio / P. Oliva / G. Costa / J. Galvanin / F. Milana
- 5:00 pm**     *Closing of the day 3*

DAY 4, 27<sup>th</sup> June 2024

## Live surgery and intraoperative skills

*(participants will join the OR as observers)*

- 8:30 am**     **Live surgery - Liver Resection**  
G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana
- 1:00 pm**     *Lunch*
- 2:00 pm**     **Live surgery - Biliodigestive anastomosis**  
G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana
- 5.00 pm**     **Matching simulation & reality**  
G. Torzilli / F. Procopio / P. Oliva / G. Costa / J. Galvanin / F. Milana
- 6:00 pm**     *Closing of the day 4*

DAY 5, 28<sup>th</sup> June 2024

## Live surgery and intraoperative skills

*(participants will join the OR as observers)*

- 8:30 am**     **Live surgery**  
G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana
- 1:00 pm**     *Lunch*
- 2:00 pm**     **Live surgery**  
G. Torzilli / F. Procopio / A. Palmisano / G. Costa / J. Galvanin / F. Milana
- 5.00 pm**     **Matching simulation & reality**  
G. Torzilli / F. Procopio / P. Oliva / G. Costa / J. Galvanin / F. Milana
- 6:00 pm**     *Take home message and end of the course*

PLANNED LIVE SURGERIES:

*\*\*Typologies of live surgeries might be switched in the course agenda based on patients' schedule and clinical preparation.*

# ESSU

# masterclass

european school of surgical ultrasound

# The Program

## GENERAL INFORMATION

*Course open to a maximum of 10 participants specialized in general surgery - epathology*

### VENUE

*Humanitas Research Hospital IRCCS  
Via Manzoni 56  
20090 Rozzano (Milan) - Italy*

### REGISTRATION FEE

*€ 2.700 (vat included)*

*The fee will guarantee*

- access to course,*
- access to OR and specific PPE,*
- access to 3D Lab and lab machinery (phantoms prep),*
- lunches and breaks as shown in the programme,*
- attendance certificate*
- 1:2 ratio with faculty for an immersive/practical event*

*Registrations are opened online @ [www.humanitasedu.it](http://www.humanitasedu.it)*

*For further information please contact [edu@hunimed.eu](mailto:edu@hunimed.eu)*



## FACULTY

**Guido Costa** - Division Hepatobiliary Surgery, IRCCS Humanitas Research Hospital, Rozzano (MI)

**Jacopo Galvanin** - Division Hepatobiliary Surgery, IRCCS Humanitas Research Hospital, Rozzano (MI)

**Flavio Milana** - Division Hepatobiliary Surgery, IRCCS Humanitas Research Hospital, Rozzano (MI)

**Paolo Oliva** - Head of 3D Printing team and Lab, Humanitas University, Pieve Emanuele (MI)

**Angela Palmisano** - Division Hepatobiliary Surgery, IRCCS Humanitas Research Hospital, Rozzano (MI)

**Fabio Procopio** - Division Hepatobiliary Surgery, IRCCS Humanitas Research Hospital, Rozzano (MI)

**Guido Torzilli** - Director Dept. Surgery & Div. Hepatobiliary Surgery, IRCCS Humanitas Research Hospital, Rozzano (MI)