FOCUS: Valve 2021
3D live surgeries - workshops - wetlabs
Training minimally invasive valve surgery in the era of interventional valve therapies

12th Training Course for
Minimally Invasive Heart Valve Surgery
Medical University Innsbruck
INNSBRUCK | AUSTRIA | DEC. 5 – 8, 2021

www.focusvalve.org
Dear colleagues and friends!

Persevering still in the challenging situation of severe restrictions imposed on our daily lives and activities by the COVID-19 disease we are confident to revert to some normality in late autumn. The postponed 12th FOCUS Valve course will take place from December 5-8, 2021. In contrast to the virtual meetings we have become accustomed to, at Focus Valve we will resume physical presence with all the personal encounters missed so dreadfully for a long time. Focus Valve remains a surgical course based on live surgeries and live discussions between participants and experienced operators and a 3D experience which enhances understanding of the pathology and techniques. We strongly believe that surgical experience, tips and tricks can be transferred to the attending surgeons but not to the web.

Compelling proof of the outstanding results of surgical valve repair and replacement is extremely important in the era of rapidly developing interventional techniques. Minimally invasive valve surgery must become the standard of care for the majority of patients and surgeons in a heart valve center must be ready to perfectly perform less traumatic procedures. Excellence in valve surgery includes the routine use of minimally invasive operations. Only these procedures must be compared to interventional techniques. Therefore, it is more important than ever to train surgeons in minimally invasive surgery as well as interventional techniques.

FOCUS Valve 2021 will address these issues providing a proven 4 days training course including live surgeries transmitted in 3D from our OR, lectures, how-to-do-it presentations, workshops, MICS wetlabs and valve interventions in a beating heart model. This makes the course the ideal teaching platform for teams dedicated to minimally invasive valve surgery. Special attention will be given to minimally invasive mitral valve repair, aortic valve replacement and ablation of atrial fibrillation. Live surgeries performed by internationally renowned surgeons as well as surgeons in training will give testimony for the appropriability of including MICS into cardiac surgical training.

FOCUS Valve is an educational program in minimally invasive valve surgery offered by the Department of Cardiac Surgery of Medical University Innsbruck including presentations and live surgeries (Module I), wetlab training (Module II), observership in our OR (Module III) and local proctoring on request (Module IV). Modules II and III are comprised also in the MICS Training Days to be held in February 2022.

We are looking forward to welcome you again personally in Innsbruck!

Ludwig Müller, Michael Grimm
Nikos Bonaros
Course Directors

Daniel Höfer
Scientific Secretary

Ottavio Alfieri, Öztekin Oto
Patrick Perier, Jose Luis Pomar
Co - Directors

HIGHLIGHTS 2021:

Mitral valve prolapse and rheumatic diseases

Live surgeries:
• OR live transmissions with the most advanced 3D technology

Interactive workshops:
• Echocardiography
• MICS techniques for aortic, mitral, tricuspid and atrial fibrillation

Wetlabs:
• Aortic and mitral valve interventions in a porcine beating heart model

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COURSE DIRECTORS:

Müller Ludwig, AT
Grimm Michael, AT
Bonaros Nikolaos, AT

SCIENTIFIC SECRETARY:

Höfer Daniel, AT

FACULTY (to be completed)

Bauer Axel, AT
De Bonis Michele, IT
Doenst Torsten, DE
Doll Kai Nicolas, DE
Dumfarth Julia, AT
Fischlein Theodor, DE
Freemantle Nicholas, UK
Friedrich Guy, AT
Gasser Simone, AT
Girdauskas Evaldas, DE
Gollmann-Tepeköylü Can, AT
Grabenwöger Martin, AT
Graber Michael, AT
Gunn Jarmo, FI
Hangler Herbert, AT
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Hintringer Florian, AT
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Krapf Christoph, AT
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Liebold Andreas, DE
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Mair Peter, AT
Mayr Agnes, AT
Metzler Bernhard, AT
Nägele Felix, AT
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Vohra Hunaid, UK
Walther Thomas, DE
Wiedemann Dominik, AT
Wisser Wilfried, AT
Wunderlich Nina, DE
Yadav Rashmi, UK
Zacharias Joseph, UK
Zilla Peter, ZA

CO DIRECTORS:

Alfieri Ottavio, IT
Oto Öztekin, TR – for the turkish
Heart and Health Foundation
Perier Patrick, DE – for the
Endoscopic Cardiac Surgeons Club
Pomar Jose-Luis, ES

FOCUS VALVE PARTNERS:

ECS - Endoscopic Cardiac Surgeons Club
www.ecsclub.org
Heart and Health Foundation of Turkey
www.tksv.org/en
<table>
<thead>
<tr>
<th>Time</th>
<th>Session</th>
<th>Chair</th>
</tr>
</thead>
</table>
| 13:00-14:30| **Workshop 1:** Prolapse: Imaging and basic science  
*Chair: Bauer A, Bonaros N, Doenst T* | Wunderlich N  
Holfeld J  
De Bonis M  
Yadav R |
|            | Quantification of mitral regurgitation       |                        |
|            | Basic science: Mitral valve prolapse         |                        |
|            | The science behind repair:                  |                        |
|            | - Annuloplasty / ring types                  |                        |
|            | - Pathophysiology of artificial chords and neochoords |            |
| 14:30-15:00| Coffee break                                 |                        |
| 15:00-16:00| **Workshop 2:** Basics of MV repair for prolapse  
*Chair: Alfieri O, De Bonis M, Müller L* | Perier P  
Doenst T  
Walther T |
|            | My approach to leaflet prolapse              |                        |
|            | Evidence for leaflet resection               |                        |
|            | Evidence for artificial chords               |                        |
| 16:00-16:30| Coffee break                                 |                        |
| 16:30-18:00| **Workshop 3:** Video session on repair techniques  
*Chair: Grimm M, Vohra H, Treede H* | NN  
Holubec T  
Mayr A  
Klautz R  
Girdauskas E  
Zacharias J |
|            | PML resection                                |                        |
|            | Chordae loops                                |                        |
|            | Mitral annular disjunction: Pathophysiology and diagnosis (presentation) |            |
|            | Functional prolapse                          |                        |
|            | Avoid SAM - treat SAM                        |                        |
|            | MIC mitral reoperation                       |                        |
DAY 2, Monday, December 6, 2021

08:30 - 09:00 Welcome
Grimm M, Bonaros N
Introductory lecture: Biases in randomized trials
Müller L
MIMVS: Evolution over 20 years
Bonaros N

09:00 - 12:00 Live surgeries transmitted from OR
Moderation: Pomar J-L
Panel: Girdauskas E, Fischlein T, Grabenwöger M, Kocher A, Oto Ö

Case presentation
Nägele F

Live case 1
Mini-thoracotomy (ART) aortic valve replacement
Surgeons: Mahr S / Laufer G
Learning objectives: Right anterior minithoracotomy access, exposure, cannulation, prosthesis selection (rapid deployment valves vs. standard)

Live case 2
Partial sternotomy for ascending aorta + valve replacement
Surgeons: Dumfarth J / Grimm M
Learning objectives: Minimally invasive AVR, hemisternotomy, cannulation, exposure replacement of the ascending aorta

Live-in-a-box:
Endoscopic aortic valve replacement
Pitsis A

Discussion of strategies: Panel

Coffee break

Presentations during live surgeries:

Valve selection between 50 and 70 years:
pro: Biological
Wiedemann D
pro: Mechanical
Gunn J
Summary: Aortic valve prosthesis selection
Fischlein T
Why do aortic valves calcify
Gollmann-Tepeköylü C

09:00 - 12:00 Wetlab: Artificial chordae implantation and valve sizing
Tutor: Sakic A (parallel during live surgeries – 2 working stations, 60 min training)

12:30 - 13:00 Lunch break
## SCIENTIFIC PROGRAM

**DAY 2, Monday, December 6, 2021**  
*main auditorium*

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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</thead>
</table>
| 13:00 - 13:45 | **Workshop 4:** Transcatheter mitral valve therapies  
Chair: Bauer A, Grimm M, Laufer G  
Transapical neochordae  
Interventional edge-to edge repair for leaflet prolapse  
TMVI  
Walther T  
Hausleiter J  
Treede H |
| 13:45 - 14:15 | **Honored guest lecture:** Ebstein's anomaly  
Perier P |
| 14:15 - 14:30 | **Coffee break** |
| 14:30 - 18:00 | **Live surgeries transmitted from OR**  
Moderation: Pomar J-L  
Panel: Doll K N, Liebold A, Obadia J-F, Perier P, Walther T  
Case presentation  
Gasser S  
**Live case 3**  
Totally endoscopic MV repair  
Surgeons: Bonaros N / Müller L / Stastny L  
Learning objectives: Team approach, cannulation, cardioplegia, port placement, valve exposure, chordae loops, annuloplasty  
**Live case 4**  
The pragmatic approach: Direct vision MV repair  
Surgeon: Jacobs S  
Learning objectives: Essentials of mini-thoracotomy MV repair  
Discussion of strategies: Panel  
**Coffee break** |
| 14:30 - 17:30 | **Wetlab:** Hands-on training of transcatheter transapical mitral valve replacement  
Tutor: Sakic A (parallel during live surgeries – 2 working stations, 60 min training)  
**Live-in-a-box:** Beating heart tricuspid annuloplasty  
Treede H |
| 18:00 | **End of Day 2** |

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### SCIENTIFIC PROGRAM

**DAY 3, Tuesday, December 7, 2021**

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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</thead>
<tbody>
<tr>
<td>08:30</td>
<td>ICU report</td>
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<tr>
<td></td>
<td>Introduction</td>
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<tr>
<td></td>
<td><strong>Key note address: Industry sponsored vs. academic studies in cardiac surgery</strong></td>
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<tr>
<td></td>
<td>Comment</td>
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<tr>
<td></td>
<td>Surgeon on duty: Reichenspurner H</td>
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<tr>
<td>09:00 - 12:30</td>
<td>Live surgeries transmitted from OR</td>
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<tr>
<td></td>
<td><strong>Moderation: Perier P</strong></td>
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<td><strong>Panel: Holfeld J, Holzinger C, Pfannmüller B, Solinas M, Suwalski P</strong></td>
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<tr>
<td></td>
<td>Case presentation</td>
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<tr>
<td></td>
<td><strong>Live case 5</strong></td>
</tr>
<tr>
<td></td>
<td>Cryoablation and left appendage occlusion concomitant with MV repair</td>
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<tr>
<td></td>
<td>Surgeon: Doll K N</td>
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<tr>
<td></td>
<td><strong>Learning objectives:</strong> Energy sources, ablation lines, LAA occlusion</td>
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<tr>
<td></td>
<td><strong>Live case 6</strong></td>
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<tr>
<td></td>
<td>Hemisternotomy MV+TV repair</td>
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<td></td>
<td>Surgeons: Holfeld J / Grimm M</td>
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<tr>
<td></td>
<td><strong>Learning objectives:</strong> Hemisternotomy access to the mitral and tricuspid valves, MV and TV repair strategy and technique</td>
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<tr>
<td></td>
<td><strong>Discussion of strategies:</strong> Panel</td>
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<tr>
<td>09:00 - 12:00</td>
<td>Wetlab: Artificial chordae implantation and valve sizing</td>
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<tr>
<td></td>
<td><strong>Tutor: Sakic A</strong></td>
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<td></td>
<td>(parallel during live surgeries - 2 working stations, 60 min training)</td>
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<tr>
<td></td>
<td>Coffee break</td>
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<tr>
<td></td>
<td>Presentations during live surgeries:</td>
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<tr>
<td></td>
<td>Atrial fibrillation ablation</td>
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<td></td>
<td>Tricuspid valve repair: Indications and outcomes</td>
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<tr>
<td></td>
<td>Is the endoclamp still alive?</td>
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<td></td>
<td>Lunch break</td>
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</tbody>
</table>

**www.focusvalve.org**
### SCIENTIFIC PROGRAM

#### DAY 3, Tuesday, December 7, 2021

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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<tbody>
<tr>
<td>13:30 - 14:15</td>
<td><strong>Workshop 5:</strong> Underappreciated: Rheumatic mitral valve disease</td>
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<tr>
<td></td>
<td>Underappreciated: Rheumatic valve disease</td>
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<tr>
<td></td>
<td>Repair techniques</td>
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<td></td>
<td>Zilla P</td>
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<td></td>
<td>Oto Ö</td>
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<tr>
<td>14:15 - 18:00</td>
<td><strong>Live surgeries transmitted from OR</strong></td>
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<td></td>
<td><em>Moderation: Perier P</em></td>
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<td></td>
<td><em>Panel: Dumforth J, Grimm M, Özpeker C, Oto Ö, Wisser W</em></td>
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<tr>
<td></td>
<td>Case presentation</td>
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<td></td>
<td>Stastny L</td>
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<td></td>
<td><strong>Live case 7</strong></td>
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<tr>
<td></td>
<td>Endoscopic prosthetic mitral valve replacement</td>
</tr>
<tr>
<td></td>
<td>Surgeons: Höfer D / Müller L / Gasser S</td>
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<tr>
<td></td>
<td><strong>Learning objectives:</strong> Valve selection, orientation, fixation</td>
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<tr>
<td></td>
<td><strong>Live case 8</strong></td>
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<tr>
<td></td>
<td>Advanced endoscopic mitral valve repair</td>
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<tr>
<td></td>
<td>Surgeon: Girdauskas E</td>
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<td></td>
<td><strong>Learning objectives:</strong> Advanced repair strategies</td>
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<td><strong>Discussion of strategies:</strong> Panel</td>
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<td></td>
<td><strong>Coffee break</strong></td>
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<tr>
<td></td>
<td>Presentations during live surgeries:</td>
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<tr>
<td></td>
<td><strong>Live-in-a box</strong> presentations</td>
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<tr>
<td></td>
<td>MV repair for functional regurgitation</td>
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<td></td>
<td>Endoscopic ablation and LAAO for stand alone AF</td>
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<td></td>
<td>Ozaki aortic valve procedure</td>
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<td>Hemisternotomy MV surgery</td>
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<td></td>
<td><strong>Closing remarks</strong></td>
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<tr>
<td>14:30 - 17:30</td>
<td><strong>Wetlab: Hands-on training of transcatheter transapical mitral valve replacement</strong></td>
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<tr>
<td></td>
<td><em>Tutor: Sakic A</em> (parallel during live surgeries - 2 working stations, 60 min training)</td>
</tr>
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<td>Adjourn – End of Day 3</td>
</tr>
</tbody>
</table>
### SCIENTIFIC PROGRAM

**DAY 4, Wednesday, December 8, 2021**

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>08:00 - 12:00</td>
<td>TEE for surgeons</td>
<td>conference room anaesthesiology</td>
</tr>
<tr>
<td></td>
<td>Tutors: Velik-Salchner C, Mair P</td>
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<tr>
<td>08:30 - 16:30</td>
<td>Porcine beating heart wetlab (8 groups of 5 - 7 participants)</td>
<td>seminar room I</td>
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<tr>
<td></td>
<td>Wetlab aortic:</td>
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<tr>
<td></td>
<td>Hands-on training of balloon expandable TAVI under fluoroscopy and cardioscopy, 90 minutes per group of 5-7 participants</td>
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<tr>
<td></td>
<td>Hands-on training of self-expandable TAVI under fluoroscopy and cardioscopy, 90 minutes per group of 5-7 participants</td>
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<td></td>
<td>Wetlab mitral:</td>
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<tr>
<td></td>
<td>Hands-on training of Mitraclip implantation under TEE and cardioscopy guidance, 90 minutes per group of 5-7 participants</td>
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<tr>
<td></td>
<td>Hands-on training of beating heart transapical neochoordae implantation for p2 prolapse, 90 minutes per group of 5-7 participants</td>
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<tr>
<td>09:00 - 13:00</td>
<td>MIMVS Wetlab I (morning)</td>
<td>seminar room II</td>
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<tr>
<td></td>
<td>Tutors: Hangler H, Höfer D</td>
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<tr>
<td></td>
<td>Practising MIMVS. Focus on shafted instruments, videoendoscopy, knot tying</td>
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<tr>
<td>14:00 - 18:00</td>
<td>MIMVS Wetlab II (afternoon)</td>
<td>seminar room II</td>
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<tr>
<td></td>
<td>Tutors: Hangler H, Höfer D</td>
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</tr>
<tr>
<td></td>
<td>Identical to MIMVS Wetlab I</td>
<td></td>
</tr>
</tbody>
</table>
### ONLINE REGISTRATION: [https://registration.maw.co.at/valve21](https://registration.maw.co.at/valve21)

#### REGISTRATION FEES

<table>
<thead>
<tr>
<th>Event</th>
<th>Preregistration until NOV. 15, 2021</th>
<th>On site registration after NOV. 15, 2021</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>DAY 1 – 3, December 5 – 7, 2021</strong></td>
<td></td>
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<tr>
<td>Focus valve training course</td>
<td>€ 800.–</td>
<td>€ 950.–</td>
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<tr>
<td><strong>DAY 4, December 8, 2021</strong></td>
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<tr>
<td>TEE for surgeons</td>
<td>€ 400.–</td>
<td>€ 500.–</td>
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<tr>
<td>08:00 -12:00, Limited registration</td>
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<tr>
<td>MIMVS wetlab I (morning)</td>
<td>€ 400.–</td>
<td>€ 500.–</td>
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<tr>
<td>09:00 - 13:00 (identical to wetlab II)</td>
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<tr>
<td>MIMVS wetlab II (afternoon)</td>
<td>€ 400.–</td>
<td>€ 500.–</td>
</tr>
<tr>
<td>14:00 - 18:00 (identical to wetlab I)</td>
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<tr>
<td>Porcine beating heart wetlab</td>
<td>€ 250.–</td>
<td>€ 300.–</td>
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<tr>
<td>(price per session)</td>
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</tr>
<tr>
<td>TAVI sessions</td>
<td>8:30-10:00 10:30-12:00 13:00-14:30 15:00-16:30</td>
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<tr>
<td>Mitral sessions</td>
<td>8:30-10:00 10:30-12:00 13:00-14:30 15:00-16:30</td>
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<tr>
<td>Residents and nurses are entitled to a 50% discount. Medical students can register free of charge.</td>
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<tr>
<td>Combo Beating heart wetlab</td>
<td>€ 400.–</td>
<td>€ 500.–</td>
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<tr>
<td>TEAM REGISTRATION:</td>
<td></td>
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<tr>
<td>Bring your team colleagues to Focus Valve and save up to 50% of the Registration and Workshop fees. Just use the team code of your registration confirmation mail to receive a group discount for further registrations (up to 5 team members).</td>
<td></td>
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<tr>
<td>Registration fees include admittance to scientific sessions [incl. coffee and lunch breaks].</td>
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</tr>
</tbody>
</table>
| Cancellation must be done in writing to the congress secretariat before November 15, 2021. The registration fee will be refunded less € 50. – service fee.
## SPONSORS AND PARTNERS

(as of July 2021)

<table>
<thead>
<tr>
<th>Sponsor</th>
<th>Website</th>
</tr>
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<tbody>
<tr>
<td>ATRICURE</td>
<td><a href="http://www.atricure.com">www.atricure.com</a></td>
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<tr>
<td>BBRAUN</td>
<td><a href="http://www.bbraun.com">www.bbraun.com</a></td>
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<td>CANON MEDICAL</td>
<td><a href="https://at.medical.canon">https://at.medical.canon</a></td>
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<td>EDWARDS LIFESCIENCES</td>
<td><a href="http://www.edwards.com">www.edwards.com</a></td>
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<td>ETHICON – JOHNSON &amp; JOHNSON</td>
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<td>MAC’S MEDICAL</td>
<td><a href="http://www.macsmedical.eu">www.macsmedical.eu</a></td>
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<td>NOVOMED</td>
<td><a href="http://www.novomed.at">www.novomed.at</a></td>
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<tr>
<td>RICHTER – SERAG WIESSNER</td>
<td><a href="http://www.richter-pharma.at">www.richter-pharma.at</a></td>
</tr>
<tr>
<td>SCANLAN INTERNATIONAL</td>
<td><a href="http://www.scanlan.com">www.scanlan.com</a></td>
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</tbody>
</table>
INNSBRUCK | AUSTRIA
DECEMBER 5 – 8, 2021

GENERAL INFORMATION

COURSE DIRECTORS
Ludwig MÜLLER
Michael GRIMM
Nikolaos BONAROS

CO DIRECTORS:
Ottavio ALFIERI
Öztekin OTO
Patrick PERIER
Jose Luis POMAR

SCIENTIFIC SECRETARY
Daniel HÖFER
Department of cardiac surgery
Medical University, Innsbruck

COURSE LOCATION
LKI/Universitätskliniken Innsbruck
Chirurgie (Building no. 8)
Main Auditorium (Großer Hörssaal)
Entrance Innerkoflerstrasse
6020 Innsbruck, Austria

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CONGRESS ORGANIZER
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Medizinische Ausstellungs- und Werbegesellschaft
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Phone: +43 1 536 63-34 or -62 or -64
Fax: +43 1 536 63-16
Email: valve@maw.co.at
Web: www.maw.co.at

Information about
ONLINE REGISTRATION
HOTEL RESERVATION
INVITATION LETTER FOR VISA APPLICATION
please visit: www.focusvalve.org