



**Delavnica - 3D tisk kovin – 28. okt. 2020 / Workshop - 3D metal print – Oct. 28<sup>th</sup> 2020**

**Program / Program**

**1. Uvodni nagovor / Introductory address**

9:00 – 9:10: Mitjan Kalin, Dekan FS / Dean of FME  
Miloš Šturm, Direktor SiEVA d.o.o. / Director of SiEVA Ltd.

**2. Proizvajalca SLM 3D tiskalnikov / Manufacturers of SLM 3D printers**

09:10 – 09:40 Aydın Yağmur (EOS) *Repeatability & Reliability of EOS Ti64 ELI on the EOS M 290*  
09:40 – 10:10 Florian Feucht (DMG MORI) *Industrialization of AM Holistic approach – DMG MORI process chain*

**3. RR primeri in problematika 3D tiska v okviru SiEVA 3D tisk konzorcija /**

**R&D examples and issues of 3D printing within the SiEVA 3D printing consortium**

10:10 – 10:25 Boštjan Podlipec (SiEVA) *2 leti delovanja SiEVA 3D LAB na Fakulteti za strojništvo, 2 years of 3D metal printing in SiEVA 3D LAB*  
10:25 – 10:40 Jan Štucin (HIDRIA) *Primeri uporabe 3D kovinskega tiska v podjetju HIDRIA, Use cases of 3D metal printing in company HIDRIA*  
10:40 – 10:55 Gašper Sedej (KOLEKTOR) *Primeri uporabe 3D kovinskega tiska v podjetju KOLEKTOR, Use cases of 3D metal printing in company KOLEKTOR*

**Odmor / Coffe brake 10:55 – 11:15 (20 min)**

**4. Raziskave in razvoj 3D tiska kovin na JRO in FS / R&D of 3D metal print at PRO and FME**

11:15 – 11:30 Matjaž Godec (IMT) *Pregled raziskav na področju 3D tiska kovin na IMT, Review of 3D metal printing research at IMT*  
11:30 – 11:45 Tadeja Kosec (ZAG) *Implementacija aditivnih tehnologij v stomatološki protetiki, Implementation of additive technologies in prosthodontics*  
11:45 – 12:00 Jernej Klemenc (FS) *Optimizacija notranjih podpornih struktur kot integralni del izdelka za ciljno prenašanje obremenitev, Optimization of internal support structures as an integral part of the product for targeted load transfer*  
12:00 – 12:15 Damijan Klobčar (FS) *Razvoj procesa 3D obločnega navarjanja in poobdelava, Wire Arc additive manufacturing: Process development and post processing*  
12:15 – 12:30 Edvard Govekar (FS) *Raziskave in razvoj anularne laserske direktne depozicije kovine, R&D of annular laser beam direct deposition of metal*

12:30 – 12:45 Franci Pušavec (FS) *Naknadne obdelave 3D tiskanih kovinskih površin*  
*Post processing of 3D printed metal surfaces*

**Odmor / Lunch brake 12:45 – 13:30 (45 min)**

13:30 – 13:45 Nikolaj Mole (FS) *Numerično modeliranje procesa dodajanja materiala in karakterizacija mehanskega odziva tiskanih struktur*

*Numerical modeling of the material addition process and characterization of the mechanical response of printed structures*

13:45 – 14:00 Božidar Šarler (FS) *Numerična simulacija strjevanja na več merilih pri aditivnih tehnologijah*

*Multiscale numerical simulation of solidification in additive technologies*

14:00 – 14:15 Matija Jezeršek (FS) *Lasersko čiščenje 3D tiskanih odprtoceličnih struktur*

*Laser cleaning of 3D printed open-cell structures*

14:15 – 14:30 Mitjan Kalin (FS) *Tribologija in površinske lastnosti komponent izdelanih z aditivnimi tehnologijami*

*Tribology and surface properties of components made with additive manufacturing*

**Zaključek delavnice / Workshop closure**