

UČNI NAČRT PREDMETA / COURSE SYLLABUS

Predmet:	Žilni vsadki
Course title:	Vascular Implants

Študijski program in stopnja Study programme and level	Študijska smer Study field	Letnik Academic year	Semester Semester
Biomedicinska tehnologija/Biomedical Technology 3. stopnja/3rd Degree		2	3 ali 4

Vrsta predmeta / Course type

Izbirni/Elective

Univerzitetna koda predmeta / University course code:

Predavanja Lectures	Seminar Seminar	Vaje Tutorial	Klinične vaje work	Druge oblike študija	Samost. Delo Individ. Work	ECTS
15	20	10			105	5

Nosilec predmeta / Lecturer:

Izr. prof. dr. Kazimir Miksić

Jeziki /

Predavanja / Lectures:

Slovenski, Angleški/Slovenian, English

Languages:

Vaje / Tutorial:

Slovenski, Angleški/Slovenian, English

Pogoji za vključitev v delo oz. za opravljanje študijskih obveznosti:

Prerequisites:

Kandidat mora doseči 300 ECTS na predhodnem študiju.

Graduate degree 300 ECTS

Vsebina:

Content (Syllabus outline):

- Temeljni koncepti
- Metodološki pristopi
- Odgovor gostitelja na vsadke
- Razgradnja vsadkov v biološkem okolju
- Postopki in metode zaviranja trombogenosti
- Razpočitev aterosklerotične lehe
- Novi postopki slikovnega prikaza žilja
- Nove tehnologije umetnih vsadkov
- Nove tehnologije notranjih žilnih opornic
- Tromboliza in mehanska odstranitev aterosklerotične lehe

- Background concepts
- Methodological approach
- Host reaction to biomaterials and their evaluation
- Degradation of materials in the biological environment
- Nonthrombogenic treatments and strategies
- Cardiovascular plaque rupture
- Advances in vascular imaging
- Advances in graft technologies
- Advances in stent technology
- Thrombolysis and mechanical thrombectomy for arterial disease

Temeljni literatura in viri / Readings:

- Ratner BD et al. Biomaterials science. An introduction to materials in medicine. Academic Press. London 1996.
- Park JB, Bronzino JD. Biomaterials. Principles and applications. CRC Press. Boca Raton 2003.
- Weaver FA, BH Hood ed. Endovascular management of vascular disease: current technology and applications. Surg Clin North Am 2004.

Cilji in kompetence:

Objectives and competences:

- metodološki in teoretični koncepti na področju žilnih vsadkov
- koncepti odziva kardiovaskularnega sistema na vsadke
- metode, uporabljane v sodobni klinični aplikaciji

- methodological and theoretical concepts in the field of vascular implants
- concepts of cardiovascular response to biomaterials
- methods used in modern clinical practice

Predvideni študijski rezultati:

Intended learning outcomes:

Znanje in razumevanje:

Razumevanje novih tehnologij umetnih vsadkov, novih

Knowledge and understanding:

Understanding new technologies of artificial implants,

tehnologij notranjih žilnih opornic, poznati odgovor gostitelja na vsadke
Prenesljive/ključne spretnosti in drugi atributi:
 Študent mora poznati metodološke pristope slikovnega prikaza ožilja in nove tehnologije umetnih vsadkov

Metode poučevanja in učenja:

Predavanja, samostojno raziskovalno delo

new technologies of internal vascular sprains, knowing host response to implants
Transferable/Key Skills and other attributes:
 The student must know the methodological approaches to the visual image of the vascular and new technology of artificial implants.

Learning and teaching methods:

Lectures and independent research

Načini ocenjevanja:

Projektno delo,
 Seminarska naloga

Delež (v %) /

Weight (in %)

Assessment:

Project work,
 Report