



Osor v fokusu znanosti

Znanstvena konferenca • Koper, 4.–5. november 2025
Program in knjiga povzetkov

Osor in the Scientific Spotlight

Scientific Conference • Koper, 4–5 November 2025
Programme and Abstract Book



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Osor v fokusu znanosti: Osor onkraj mita

Martina Blečić Kavur in Boris Kavur

Dvostranski raziskovalni projekt Osor onkraj mita, ki ga financirata Javna agencija za znanstvenoraziskovalno in inovacijsko dejavnost Republike Slovenije (ARIS) ter Avstrijski znanstveni sklad (FWF) v okviru programa Weave, je uspel združiti številne raziskovalce različnih disciplin pri preučevanju Osorja. Gre za mesto, ki leži na stičišču otokov Cresa in Lošinja v Kvarnerskem zalivu na Hrvaškem. V času mlajše prazgodovine in rimskega obdobja je veljalo za eno najpomembnejših regionalnih središč. Projekt tako subtilno prepleta mitološko ozadje s sodobnimi znanstvenimi spoznanji, pri čemer Osor obravnava kot enoten kopenski in morski organizem – prostor, kjer se stikata mit in resničnost, narava in kultura. Z multidisciplinarnim pristopom – od geologije in arheologije, prek zgodovine in epigrafike do antropologije, biologije in kemije – je omogočeno poglobljeno razumevanje kompleksnosti življenja v preteklosti na tem izjemnem prostoru. Posebna pozornost je namenjena krajinskemu kontekstu, obrobni rabi zemljišč ter dinamiki in strateški vlogi mesta znotraj severnojadranskega prostora in kulturnih mrež tistega časa.

V zadnjih dveh desetletjih so raziskave pokazale precejšnje število novih arheoloških najdb, večjo kulturno variabilnost in intenzivnejše kulturne stike. Zato je bil cilj projekta med drugim na novo ovrednotiti kulturno zgodovino Osorja v kontekstu otočnosti ter regionalnih in nadregionalnih povezav na inovativen način. K razvoju projekta so pomembno prispevala najnovejša zaščitna arheološka izkopavanja (2018–2025), ki so bistveno dopolnila zbrane podatke in odprla številne nove raziskovalne izzive.

Namen konference Osor v fokusu znanosti je zbrati najnovejše raziskave in različne pristope ter njihove rezultate združiti v celovito znanstveno sintezo, ki bo omogočala poglobljeno razumevanje mesta in njegovega razvoja v širšem kulturnem in časovnem okviru – torej onkraj mitov. Dejstvo, da se je na konferenci zbralo impresivno število udeležencev iz šestih držav, potrjuje uspešnost in aktualnost tega pristopa. V več kot 150-letni zgodovini raziskav so se prvič zbrali strokovnjaki z različnih področij ter svoj znanstveni fokus usmerili izključno na Osor – v malo večno mesto, ki s svojim obstojem že več kot 3000 let povezuje in navdihuje.

Osor in the Scientific Spotlight: Osor Beyond the Myth

Martina Blečić Kavur and Boris Kavur

The bilateral research project *Osor Beyond the Myth*, funded by the Slovenian Research and Innovation Agency (ARIS) and the Austrian Science Fund (FWF) within the Weave programme, has successfully brought together researchers from various disciplines to study Osor. The town, situated at the junction of the islands of Cres and Lošinj in Kvarner Bay, Croatia, was one of the most important regional centres during the Late Prehistoric and Roman periods. The project subtly weaves together the mythological background with contemporary scientific insights, viewing Osor as a unified terrestrial and maritime organism – a place where myth and reality, nature and culture, converge. Through a multidisciplinary approach – including geology, archaeology, history, epigraphy, anthropology, biology and chemistry – the project enables a deeper understanding of the complexity of past life in this exceptional area. Special attention is given to the landscape context, peripheral land use, and the dynamics and strategic role of the town within the northern Adriatic region and its cultural networks of the time.

In the past two decades, research has revealed many new archaeological finds, greater cultural variability, and more intensive cultural interactions. Consequently, one of the main aims of the project has been to re-evaluate the cultural history of Osor in the context of insularity, as well as its regional and interregional connections in an innovative manner. The project has also greatly benefited from recent rescue excavations (2018–2025), which have significantly enriched the available data and introduced numerous new research challenges.

The aim of the conference *Osor in the Scientific Spotlight* is to bring together the latest research and a range of methodological approaches, integrating their results into a comprehensive scientific synthesis to provide a deeper understanding of the town and its development within a broader cultural and temporal framework – beyond the myth. The impressive number of participants from six countries attests to the success and relevance of this approach. For the first time in over 150 years of research, experts from diverse disciplines have gathered and focused their scholarly attention exclusively on Osor – the small eternal town, whose existence has connected and inspired for more than three millennia.



Program/Programme Outline

Torek, 4. november 2025/Tuesday, 4 November 2025

- 10:00–10:15 Pozdravni nagovori/Welcome addresses:
prof. dr. Aleksander Panjek, dekan/dean
izr. prof. dr. Martina Blečić Kavur
- 10:15–10:30 Mreženje/Networking
- 10:30–10:45 Nives Doneus, Martin Fera, Michael Doneus: Projekt »Osor onkraj mita«: Rimsko mesto, njegovo pomorsko okolje in nekdanja raba zemljišč na območju arhipelaga Cres-Lošinj v arheološki prospekciji/'Osor Beyond the Myth' Project: The Roman City, its Maritime Setting, and Past Land Use Across the Cres-Lošinj Archipelago in Archaeological prospection
- 10:45–11:00 Dea Brunović, Slobodan Miko, Ozren Hasan, Nikolina Ilijanić: Podvodne krajine Lošinske ožine/Submerged Landscapes of the Lošinj Channel
- 11:00–11:15 Slobodan Miko, Dea Brunović, Ozren Hasan, Nives Doneus, Nikolina Ilijanić, Petra Hus, Filip Šegović, Ivan Razum, Michael Doneus, Martina Šparica Miko: Pet tisočletij človeškega vpliva zabeleženega v geokemijski sestavi morskih sedimentov Osorskega zaliva/Five Millennia of Human Influence Recorded in the Geochemical Composition of Marine Sediments from Osor Bay
- 11:15–11:30 Odmor za kavo/Coffee break
- 11:30–11:45 Tena Karavidović, Ana Konestra, Matija Makarun: Razkrivanje pretekle poselitve in rabe tal obrobne otoške krajine – intenzivni terenski pregled območja Matalda na otoku Cresu/Unveiling Past Settling and Land Use of a Marginal Insular Landscape – the Matalda Area Intensive Field Survey on the Cres Island
- 11:45–12:00 Mateja Baričević, Matija Makarun, Dalibor Branković, Martin Bažoka: Preliminarni rezultati zaščitnih arheoloških raziskav v Osorju (2022–2025)/Preliminary Results of Rescue Archaeological Investigations in Osor (2022–2025)

- 12:00–12:15 Zrinka Ettinger Starčić, Martina Blečić Kavur: Pregled podvodnih arheoloških raziskav v osorskem akvatoriju/An Overview of Underwater Archaeology in the Osor Aquatorium
- 12:15–12:30 Igor Miholjek, Pavle Dugonjić: Osor 2023: Podvodne arheološke raziskave/Osor 2023: Underwater Archaeological Research
- 12:30–12:45 Odmor za kavo/Coffee break
- 12:45–13:00 Martina Blečić Kavur, Boris Kavur, Maja Čuka, Mario Novak, Mateusz Cwaliński, Wayne G. Powell: O Kositrnih otokih na jantarni poti: Otočna ekskluzivnost Osorja/On the Tin Islands along the Amber Route: The Island Exclusivity of Osor
- 13:00–13:15 Mario Novak, Martina Blečić Kavur, Boris Kavur, Mario Carić, Federico Lugli, Fabio Cavalli: Nova dognanja o življenju in smrti v železnodobnem Osorju: Preliminarne bioarheološke študije človeških ostankov/New Insights into Life and Death in Iron Age Osor: Preliminary Results from the Bioarchaeological Study of Human Remains
- 13:15–13:30 Wayne G. Powell, Ryan Mathur, Martina Blečić Kavur, Boris Kavur: Uvoz kositra v Osor v času starejše železne dobe (900–700 pr. n. št.)/Tin Imports to Osor in the Early Iron Age (900–700 BCE)
- 13:30–14:30 Kosilo/Lunch break
- 14:30–14:45 Feđa Milivojević: Urbane in administrativne transformacije na vzhodnem Jadranu: primer Absora/Urban and Administrative Transformations on the Eastern Adriatic: The Case of Absorus
- 14:45–15:00 Anamarija Kurilić: Latinski napisi v kamnu iz antičnega Osorja/Latin Inscriptions in Stone from Ancient Osor
- 15:00–15:15 Katarina Šmid: Stare najdbe v novi luči: Ponovna obravnava kiparskih del Apsora/Old Discoveries, New Insights: Reconsidering the Sculpture of Apsorus
- 15:15–15:30 Irena Lazar: Steklene najdbe kot pokazatelj bogastva in prestiža v Osorju/Glass Finds as an Indicator of Wealth and Prestige in Osor
- 15:30–15:45 Odmor za kavo/Coffee break

- 15:45–16:00 Josip Burmaz, Dženi Los, Dinko Tresić Pavičić: Arheološke raziskave osorske nekropole na območju Kavanele in Preko mosta/Archaeological Investigations of the Osor Necropolis in the Area of Kavanela and Preko mosta
- 16:00–16:15 Andrej Janeš, Kristina Turkalj, Marin Matković: Zahodna nekropola antičnega Osorja/The Western Necropolis of Ancient Osor
- 16:15–16:30 Željka Bedić, Andrej Janeš: Bioarheologija človeških skeletnih ostankov z zahodne rimske nekropole/The Bioarchaeology of Human Skeletal Remains from the Western Roman Necropolis
- 16:30–16:45 Andreja Sironić, Nives Doneus: Vpliv morskega okolja na propadanje malte v arheoloških ostalinah: primer otoka Cresa/The Influence of the Marine Environment on Mortar Degradation in Archaeological Remains: A Case Study of the Island of Cres
- 16:45–17:00 Odmor za kavo/Coffee break
- 17:00–17:15 Morana Čaušević-Bully, Sébastien Bully: Sveti Peter v Osorju: Poglavitni rezultati dvanajstih let arheoloških raziskav/Saint Peter of Osor: The Main Results of Twelve Years of Archaeological Investigations
- 17:15–17:30 Georgie Baudry: Najdbe odkrite med izkopavanjem opatije svetega Petra v Osorju/The Small Finds Discovered During the Excavation of the Abbey of Saint Peter in Osor
- 17:30–17:45 Anaïs Delliste: Dva pogrebna prostora pri svetem Petru v Osorju: arheološko-antropološka perspektiva/Two Funerary Spaces at Saint Peter of Osor: An Archaeo-Anthropological Perspective
- 17:45–18:00 Odmor za kavo/Coffee break
- 18:00–18:15 Zrinka Mileusnić: Osor ponovno veličasten: Dosegljivost arheološke dediščine Osorja – Med otokom in oblakom/Make Osor Great Again: Accessibility of Osor's archaeological Heritage – Between the Island and the Cloud
- 18:15–19:00 Diskusija/Discusion
- 19:30–22:00 Večerja/Dinner

Sreda, 5. november 2025/Wednesday, 5 November 2025

- 10:00 Ogled razstave Smrt v Osorju/Tour of the Exhibition Death in Osor
- 10:30 Zaključna diskusija osorskih perspektiv in podelitev certifikatov/Concluding Discussion on Osor Perspectives and Certificate Ceremony
- 12:00 Ekскурzija/Field Trip

Povzetki/Abstracts



Projekt »Osor onkraj mita«: Rimsko mesto, njegovo pomorsko okolje in nekdanja raba zemljišč na območju arhipelaga Cres-Lošinj v arheološki prospekciiji

Nives Doneus, Martin Fera in Michael Doneus

Vabljeno predavanje

Povzetek V zadnjem desetletju sta razvoj in uporaba različnih neinvazivnih arheoloških metod, zlasti tehnik prospekciije, v velikem merilu premaknila raziskovalni poudarek s posameznih najdišč na kulturne krajine kot celoto. V tem kontekstu je aerolasersko skeniranje postalo ena najpomembnejših raziskovalnih metod, zlasti pri preučevanju mediteranskih krajin. Rezultati projekta »Osor onkraj mita« (2023–2026) kažejo, kako lahko uporaba takšnih metod skupaj s povezanim pristopom k raziskovanju območij znotraj in zunaj naselbin vpliva na rezultate raziskav. Projekt obravnava vprašanje, ali je mogoče pomorsko vlogo mesta, ki jo potrjujejo trgovske dobrine, podpreti z njegovim krajinskim kontekstom. Hrbtno ogrodje krajinskega pristopa predstavlja uporaba aerolaserskega skeniranja in batimetrije, kopenske in podvodne geofizikalne prospekciije ter geoarheoloških raziskav za pridobivanje podatkov skritih za vegetacijo, sedimenti in morsko vodo. Novi rezultati ponujajo podrobne dokaze o zasnovi mesta ter o tem, kako se je uporabljala in spreminjala okoliška krajina. Nova raziskava gradišč po celotnem arhipelagu Cres-Lošinj, skupaj z novimi vpogledi v rimsko urbanizacijo in vlogo Osorja v njej, zaokrožuje predstavitev.

Ključne besede Osor, arheološka prospekciija, LiDAR, rimska urbanizacija, otok Cres

‘Osor beyond the Myth’ Project: The Roman City, its Maritime Setting, and Past Land Use across the Cres-Lošinj Archipelago in Archaeological Prospection

Nives Doneus, Martin Fera, and Michael Doneus

Invited Lecture

Abstract For over a decade, the development and application of a variety of non-invasive archaeological methods, particularly large-scale prospection techniques, has shifted the focus from individual sites to cultural landscapes as a whole. In this context, airborne laser scanning has become one of the most important research methods, especially in the study of Mediterranean landscapes. The results of the ‘Osor Beyond the Myth’ (2023–2026) project demonstrate how applying such methods alongside a shared focus on on-site and off-site areas can influence research outcomes. The project addresses the question of whether the city’s maritime role, as evidenced by its trade goods, can be supported by its landscape context. The backbone of the landscape-based approach is the use of airborne laser scanning and bathymetry, terrestrial and underwater geophysical prospection and geoarchaeological research, to acquire data behind vegetation, sediments and seawater. The new results provide detailed evidence of the city’s layout and how the surrounding landscape was used and changed. A new survey of the hilltop settlements across the entire Cres-Lošinj archipelago, alongside fresh insights into Roman urbanisation and Osor’s role in it, concludes the presentation.

Keywords Osor, archaeological prospection, LiDAR, Roman urbanisation, Cres Island

Potopljene krajine Lošinjske ožine

Dea Brunović, Slobodan Miko, Ozren Hasan in Nikolina Ilijanić

Vabljeno predavanje

Povzetek Obsežna obalna območja so bila kopna v obdobjih bistveno nižjih morskih gladin, povezanih s kvartarni ledeniški obdobji. Po zadnji poledenitvi, ko se je morska gladina dvignila do današnje ravni, pa so bila ta območja potopljena. Celovite raziskave potopljenih krajin vzhodnega Jadrana so bile izvedene v okviru projekta Hrvaške znanstvene fundacije »Lost Lake Landscapes of the Eastern Adriatic Shelf« (LoLADRIA). Z uporabo tehnik daljinskega zaznavanja (multibeam echosounder in sub-bottom profiler) ter analizo sedimentnih jeder z več indikatorji smo rekonstruirali pretekla okolja, ki so obstajala v Lošinjski ožini v zadnjih 100.000 letih. Naše ugotovitve razkrivajo ponavljanje rečnih, jezerskih in morskih sedimentacij, kar odraža kvartarne ledeniške in medledenške faze. Posebno pomembno je odkritje zakraselega praga med Lošinjsko ožino in Kvarneričem na globini 50 m, ki je omogočal paleookoljske spremembe v skladu s spremembami morske gladine. Rekonstrukcija kvartarne evolucije krajine ni pomembna le za oceno regionalne morske gladine in podnebja. Ima zelo pomembne implikacije za razumevanje prazgodovinskih migracijskih poti in aktivnosti ljudi ob vzhodni obali Jadranskega morja. Te krajine so zagotavljale ključne vire za prazgodovinske skupnosti, ki so naseljevale območje, zaradi česar so raziskave dragocene za preučevanje, kako so se populacije v preteklosti prilagajale in reagirale na spreminjajoče se okoljske razmere skozi pleistocen in holocen.

Ključne besede potopljene krajine, akustične metode, sedimentna jedra, kvartar, Jadransko morje

Submerged Landscapes of the Lošinj Channel

Dea Brunović, Slobodan Miko, Ozren Hasan, and Nikolina Ilijanić

Invited Lecture

Abstract Vast coastal areas were exposed during periods of significantly lower sea levels associated with Quaternary glacial periods. Following the Last Glaciation, these environments got submerged as the sea level rose to its present-day position. Comprehensive research of the submerged landscapes of the eastern Adriatic has been conducted within the scope of the Croatian Science Foundation project 'Lost Lake Landscapes of the Eastern Adriatic Shelf' (LoLADRIA). By application of the remote sensing techniques (multi-beam echosounder and sub-bottom profiler) and multi-proxy sediment core analysis, we reconstructed the past environments that existed in the Lošinj Channel during the last 100,000 years. Our findings revealed the repetition of fluvial, lacustrine and marine sedimentation, reflecting the Quaternary glacial and interglacial phases. Notably, the existence of a karstified sill between the Lošinj Channel and Kvarnerić Bay at a depth of 50 m enabled palaeoenvironmental changes in concert with the sea-level fluctuations. The reconstruction of the Quaternary landscape evolution is not only essential for the assessment of regional sea levels and climate, but also has significant implications for the understanding of prehistoric human migration pathways and activities along the eastern coast of the Adriatic Sea. These landscapes provided crucial resources for the prehistoric communities that inhabited the region, making this research valuable for examining how populations in the past interacted with and adapted to changing environmental conditions throughout the Pleistocene and Holocene.

Keywords submerged landscapes, acoustic methods, sediment cores, Quaternary, Adriatic Sea

Pet tisočletij človeškega vpliva zabeleženega v geokemijski sestavi morskih sedimentov Osorskega zaliva

Slobodan Miko, Dea Brunović, Ozren Hasan, Nives Doneus, Nikolina Ilijanić, Petra Hus, Filip Šegović, Ivan Razum, Michael Doneus in Martina Šparica Miko

Vabljeno predavanje

Povzetek Holocenski sedimenti Osorskega zaliva so bili analizirani z namenom razlikovanja med naravnimi in antropogenimi sledmi v sedimentnih zapisih. Dve datirani jedri s severne strani Osorja sta bila geokemično analizirani za pridobitev indikatorjev človeških vplivov in identifikacijo virov sedimentov. Distalno jedro (OSOR-1M) obsega celoten holocen, medtem ko jedro OSOR-2M, ki se nahaja bližje Osorju, obsega zadnjih 8000 let. Antropogene spremembe okolja so bile ocenjene z izračunom faktorjev obogatitve (EF) za razmerja Cu/Zr, Pb/Zr, Mo/Zr in Zn/Zr, skupaj z vsebnostjo organskega ogljika kot indikatorjem vsebnosti oglja in skupno vsebnostjo fosforja. Razmerja Cr/Zr, Rb/Zr in V/Zr so bila uporabljena za prepoznavanje sprememb geogenih virov v sedimentni geokemiji. V jedru OSOR-2M se je vsebnost organskega ogljika (oglja), koncentracije Cu in Mo ter skupna vsebnost P povečala med 3672-3364 kal pr. n. št., z vrhuncem med 270-584 kal n. št. Razmerja Cr/Zr, Rb/Zr in V/Cr, ki kot indikatorji geogenih virov nakazujejo dotok sedimenta iz Lošinjskega kanala, s tem pa vzpostavitev povezave s slednjim. Povezava je najverjetneje nastala med 1500 in 1000 pr. n. št., verjetno zaradi dviga morske gladine in poplavljanja naravne morfološke nižine. Povečan EF za Pb je povezan z rimskim obdobjem in ga v prejšnjih časih ni bilo mogoče zaznati. V industrijski dobi so koncentracije Pb in P narasle, medtem, ko so se koncentracije organskega ogljika, Cu in Mo zmanjšale. Čeprav je bilo območje Osorja poseljeno že v neolitiku, geokemijski zapis sedimentov ne kaže opaznega okoljskega vpliva.

Ključne besede Osor, pozni holocen, morski sedimenti, faktorji obogatitve, spremembe okolja

Five Millennia of Human Influence Recorded in the Geochemical Composition of Marine Sediments from Osor Bay

Slobodan Miko, Dea Brunović, Ozren Hasan, Nives Doneus, Nikolina Ilijanić, Petra Hus, Filip Šegović, Ivan Razum, Michael Doneus, and Martina Šparica Miko

Invited Lecture

Abstract Holocene sediments from Osor Bay were analyzed to distinguish between natural and human imprints in sedimentary records. Two dated cores from Osor's northern side were geochemically analysed to obtain proxies for anthropogenic impact and sediment source identification. The distal core (OSOR-1M) spans the entire Holocene, while core OSOR-2M, located closer to Osor, spans the last 8000 years. Anthropogenic environmental changes were assessed using calculated enrichment factors (EF) for Cu/Zr, Pb/Zr, Mo/Zr, and Zn/Zr ratios, along with organic carbon content as an indicator of charcoal content, and total P content. The Cr/Zr, Rb/Zr, and V/Zr ratios were employed to detect changes in geogenic sources within the sediment geochemistry. In the OSOR-2M core, organic carbon content (charcoal), Cu and Mo concentrations, and total P increased from 3672-3364 cal BCE, peaking between 270-584 cal AD. The Cr/Zr, Rb/Zr, and V/Cr ratios, serving as geogenic source proxies, suggest sediment influx from the Lošinj Channel and thus the establishment of a marine connection with the Lošinj Channel. This connection likely occurred between 1500 and 1000 BCE, probably due to sea level rise and the flooding of a natural morphological low. The increased EF for Pb is associated with the Roman period and was absent in earlier times. During the industrial era, Pb and P concentrations rose, while organic carbon, Cu, and Mo concentrations declined. Although the Osor area was inhabited during the Neolithic period, no discernible environmental impact is evident in the sediment geochemistry.

Keywords Osor, Late Holocene, marine sediments, enrichment factors, environmental change

Razkrivanje pretekle poselitve in rabe tal obrobne otoške krajine: intenzivni terenski pregled območja Matalda na otoku Cresu

Tena Karavidović, Ana Konestra in Matija Makarun

Vabljeno predavanje

Povzetek Leta 2024 je bilo območje Matalde, ki leži v kraški pokrajini južnega dela otoka Cresa, raziskano z večmetodnim pristopom, ki je združeval daljinsko zaznavanje in intenzivni terenski pregled. Podatki, pridobljeni z letalskim LiDARskim skeniranjem, skupaj z izdelanimi modeli reliefa, so usmerjali strategijo pregleda in omogočili prepoznavo kompleksne mreže struktur. Nato so bili izvedeni sistematični površinski pregledi, ki so zabeležili prostorsko razporeditev predmetov ter podrobno dokumentirali domnevne podpovršinske in površinske strukture. Med njimi so bile prepoznane grobne gomile, različne suhozidne konstrukcije in bolj kompleksni arhitekturni ostanki, ki pogosto kažejo sledi več faz uporabe ali predelav. Raziskava je omogočila prepoznavo štirih obdobjij intenzivnejše rabe območja, ki v grobem ustrezajo času pozne bronaste/starejše železne dobe, rimskemu/poznorimskemu obdobju, poznemu srednjemu veku/zgodnjemu novemu veku ter sodobnemu obdobju. Sledi dejavnosti, razvidne iz analize prostorske razporeditve najdb in struktur, nakazujejo različne stopnje intenzivnosti, značaja in lokalizacije rabe prostora. Rezultati omogočajo proučevanje obdobjno specifičnih vzorcev rabe prostora ter diahronih, dolgoročnih sprememb v povezavi z naravno krajino, vključno s procesi arheološke degradacije in ponovne uporabe starejših struktur. Prispevek predstavlja kompleksen vzorec rabe prostora, ki zajema več arheoloških in zgodovinskih obdobjij, kot edinstven primer kulturne krajine, razvite od prazgodovine do danes, na območju, ki je šele v novejšem času postalo obrobni del otoške krajine otoka Cresa.

Gljučne besede otok Cres, obrobna krajina, sistematični površinski pregled, LiDAR, GIS

Unveiling Past Settling and Land Use of a Marginal Insular Landscape: The Matalda Area Intensive Field Survey on the Cres Island

Tena Karavidović, Ana Konestra, and Matija Makarun

Invited Lecture

Abstract In 2024, the area of Matalda, located on the karst landscape in the southern part of Cres Island, was investigated using a multi-method approach combining remote sensing and intensive field survey. Airborne LiDAR-derived images, along with generated terrain models, informed the survey strategy and enabled the identification of a complex array of structures. Subsequent systematic surface surveys recorded the spatial distribution of artefacts and documented in detail presumed subsurface and surface structures. These were identified as funerary barrows, various functional dry-stone wall constructions, and more complex architectural remains, often bearing evidence of multiple phases of use or modification. This research led to the identification of four periods of more intensive use of the area, broadly corresponding to the Late Bronze/Early Iron Age, the Roman/Late Antique period, the Late Middle Ages/Early Modern era, and the contemporary period. Traces of activity, inferred from the analysis of the spatial distribution of finds and structures, indicate differing intensity, character, and localisation of land use. The results allow the study of period-specific land-use patterns and diachronic, long-term changes in relation to the natural landscape, including processes of archaeological degradation and the reuse of earlier features. This contribution presents the complex pattern of land use spanning multiple archaeological and historical periods, as a unique example of a cultural landscape that evolved from prehistory to the present, in what has only recently become a marginal zone within the insular landscape of Cres Island.

Keywords Cres Island, marginal landscape, systematic surface survey, LiDAR, GIS

Preliminarni rezultati zaščitnih arheoloških raziskav v Osorju (2022–2025)

Mateja Baričević, Matija Makarun, Dalibor Branković in Martin Bažoka
Vabljeno predavanje

Povzetek Od oktobra 2022 do maja 2025 so Hrvaški restavratorski zavod, Arheo Kvarner in Stratum izvedli tri kampanje zaščitnih arheoloških raziskav na območju naselja Osor. Raziskave so potekale pred začetkom del na sistemu odvajanja odpadnih voda in kanalizacije znotraj kulturno-zgodovinske celote Osorja. Kot naselje z neprekinjeno poselitvijo od prazgodovine do danes, je svoj vrhunec doseglo v rimskem obdobju. Doslej izvedene arheološke in geofizikalne raziskave so potrdile pomen in večplastnost naselja skozi zgodovino, enako pa velja tudi za raziskave, ki še potekajo. Že preliminarni rezultati izkopavanj, izvedenih na območju Osorja, so potrdili nekatere že znane ugotovitve, hkrati pa prinesli nova spoznanja. Najzgodnejše plasti mesta so dokazane s prazgodovinskimi najdbami ter z železnodobnim grobom s pridatki. Največ najdb z jasno opredeljeno funkcijo izvira iz rimskega obdobja (1.–3. stoletje), med katerimi izstopajo rimska toaleta (latrinum) v jugovzhodnem delu naselja, ostanki objekta z ogrevanimi prostori (hypocaustum) in bazeni, ponovno uporabljenimi v srednjeveškem obdobju, rimski kanalizacijski sistem (cloaca) ter rimski forum. Največje odkritje nedvomno predstavlja najdba še neopredeljenega sakralnega objekta na območju osorskega mestnega trga s pripadajočimi grobovi.

Ključne besede Osor, poselitev, zaščitne raziskave, urbana arheologija, preliminarni rezultati

Preliminary Results of Rescue Archaeological Investigations in Osor (2022–2025)

Mateja Baričević, Matija Makarun, Dalibor Branković, and Martin Bažoka

Invited Lecture

Abstract From October 2022 to May 2025, the Croatian Conservation Institute, Arheo Kvarner, and Stratum conducted three campaigns of archaeological rescue investigations in the settlement of Osor. The research was undertaken prior to the construction of the wastewater drainage and sewerage system within the cultural-historical complex of Osor. As a settlement with continuous occupation from prehistory to the present, it reached its peak during the Roman period. Previous archaeological and geophysical research has confirmed the significance and stratigraphic complexity of the site over time, which also applies to the ongoing investigations. Preliminary excavation results have confirmed some previously known facts and provided new insights. The earliest layers of the town are evidenced by prehistoric finds and an Iron Age burial with grave goods. The largest number of finds with a clearly defined function date to the Roman period (1st-3rd century), including the remains of a toilet (latrinum) in the south-eastern part of the settlement, a structure with heated rooms (hypocaustum) and pools later reused in the medieval period, the drainage system (cloaca), and the Roman forum. The most significant discovery is the remains of a yet undefined sacral structure on Osor square, accompanied by burials.

Keywords Osor, settlement, rescue archaeology, urban archaeology, preliminary results

Osorski akvatorij: pregled podvodnih arheoloških raziskav

Zrinka Ettinger Starčič in Martina Blečić Kavur

Vabljeno predavanje

Povzetek Na območju Kvarnerja in cresko-lošinjskega arhipelaga je Osor najstarejše in najpomembnejše otoško naselje, hkrati pa je tudi najboljše arheološko raziskano. Že sam strateški položaj njegove lege, tako na samem otočju kot tudi na plovni poti severnega Jadrana, mu je skozi zgodovino zagotovil ključno vlogo v pomorskih in gospodarskih mrežah, pri čemer je za seboj pustil bogato kulturno in arhitekturno dediščino, ki ga je oblikovala skozi tisočletja. Poleg kopenskih arheoloških pregledov in raziskav, ki potekajo že od zadnjih desetletij 19. stoletja, so sistematično potekali tudi pregledi in raziskave podmorja celotnega otoškega akvatorija. Poseben poudarek je bil namenjen osorskemu podmorju prav zaradi pomena in vrednosti materialne kulture, ki izhaja iz samega naselja. V prispevku bodo predstavljene vse dosedanje podvodne raziskave v zadnjih desetletjih, od prvih pregledov in rekognosciranj, do sondažnih raziskav z posameznimi najdbami, ki so se začele izvajati konec 60. let prejšnjega stoletja. Kronološko so razdeljene v dve večji obdobji: prva sistematična raziskovanja v drugi polovici 20. stoletja ter novejša, sistematična in zaščitna, v prvih desetletjih 21. stoletja. Rezultati teh dejavnosti nedvomno dopolnjujejo sliko o načinu in dinamiki življenja tega otoškega središča v različnih zgodovinskih obdobjih, še posebej z vidika antičnega pomorstva, plovbe in same vloge Osorja v uveljavljenih prometnih in gospodarskih povezavah bližnjih in bolj oddaljenih območij.

Ključne besede Cres, Osor, pristanišče, plovna pot, podvodne arheološke raziskave

The Osor Aquatorium: An Overview of Underwater Archaeological Research

Zrinka Ettinger Starčić and Martina Blečić Kavur

Invited Lecture

Abstract Within Kvarner Bay and the Cres-Lošinj archipelago, Osor is the oldest and most significant insular settlement, as well as the best archaeologically researched. Its strategic location, both within the archipelago and along the northern Adriatic maritime route, has historically ensured a key role in maritime and economic networks, leaving a rich cultural and architectural heritage shaped over millennia. In addition to terrestrial archaeological research, ongoing since the late 19th century, systematic underwater surveys and research have been conducted throughout the insular aquatorium. Special attention has been given to the seabed around Osor due to the significance and value of material culture originating from the settlement itself. This presentation covers all underwater research carried out over the past decades, from initial surveys to excavations yielding individual finds, which began in the late 1960s. Chronologically, these investigations can be divided into two major periods: the first systematic research in the second half of the 20th century, and more recent systematic and rescue investigations in the early decades of the 21st century. The results of these activities undoubtedly complement our understanding of the patterns and dynamics of life in this insular centre across different historical periods, particularly regarding ancient maritime activity, navigation, and Osor's role in established trade and economic networks of nearby and more distant regions.

Keywords Cres, Osor, harbour, maritime route, underwater archaeological research

Osor 2023: Podvodne arheološke raziskave

Igor Miholjek in Pavle Dugonjić

Vabljeno predavanje

Povzetek Leta 2023 so bile izvedene arheološke raziskave v podmorju Osorja, na vhodu v Osorski kanal, tj. na območju med otokoma Cres in Lošinj. Raziskave so potekale pred gradbenimi deli na kanalizacijskem sistemu in sistemu odvajanja odpadnih voda ter jih je izvedel Hrvaški restavratorski zavod. Arheološko izkopano območje, dolgo 107 m in široko 3 m, je bilo razdeljeno na pet sektorjev, sektorji pa v 13 sond. Na površini od 320 m² je bilo odkrito več kot 200 najdb materialne kulture, ki jih je bilo mogoče tipološko določiti. Najdbe vključujejo različne odlomke grobe prazgodovinske lončenine, fino izdelano helenistično keramiko različnih tipov (Gnathia, reliefno okrašene posode, posode s črnim premazom), dele amfor (tipa Portorecanati/Unije, Dressel 2–4, Late Roman 1, Spatheon in severnoafriških amfor) ter njihove zamaške, keramiko tipa terra sigillata ter glazirano novoveško keramiko iz severne Italije. Poleg materialne kulture sta bila med izkopavanjem v sektorju 3 odkrita tudi dva večja tramova, postavljena v smeri izmenjave plime in oseke. Tramova sta bila ojačana z vertikalno postavljenimi deskami in rumeno glino, ki se drugod na najdišču ni pojavljala. Glede na dimenzije sta bila verjetno postavljena za usmerjanje morskih tokov v Osorskem kanalu in utrjevanje lošinjske strani obale. Čeprav stratigrafskih slojev ni bilo ohranjenih, različnost obdobij, razvidna iz keramičnih najdb, kaže na zelo dolgo kontinuiteto poselitve na območju mesta Osor.

Ključne besede Osor, osorska luka, podvodne raziskave, strukture, materialna kultura

Osor 2023: Underwater Archaeological Research

Igor Miholjek and Pavle Dugonjić

Invited Lecture

Abstract In 2023, underwater archaeological research was conducted at Osor, at the entrance to the Osor Channel, in the area between the islands of Cres and Lošinj. The investigations preceded construction works on the sewage and wastewater drainage system and were carried out by the Croatian Restoration Institute. The excavation area, measuring 107 m in length and 3 m in width, was divided into five sectors, which were further subdivided into 13 trenches. Over an area of 320 m², more than 200 artefacts were recovered and typologically classified. The finds include fragments of prehistoric pottery, Hellenistic tableware pottery of various types (Gnathia, relief-decorated vessels, black-gloss ware), parts of amphorae (Portorecanati/Unije type, Dressel 2–4, Late Roman 1, Spatheon, and North African amphorae) and their stoppers, terra sigillata pottery, and glazed Early Modern ceramics from northern Italy. In addition to the material culture, two large beams were uncovered in Sector 3, oriented in the direction of tidal flow. The beams were reinforced with vertically positioned planks and yellow clay, which is not found elsewhere on the site. Given their dimensions, they were likely intended to channel sea currents in the Osor Channel and to stabilise the Lošinj side of the coast. Although no stratigraphic layers were preserved, the diversity of periods evident from the ceramic finds indicates a very long continuity of occupation in the Osor area.

Keywords Osor, Osor harbour, underwater research, structures, material culture

O kositrnih otokih na jantarni poti: otočna ekskluzivnost Osorja

**Martina Blečić Kavur, Boris Kavur, Maja Čuka, Mario Novak,
Mateusz Cwaliński in Wayne G. Powell**

Vabljeno predavanje

Povzetek Arheološka dediščina kot dokaz in dejstvo, v celoti potrjuje, da osorska otoška skupnost ni bila izolirana ali izključena, temveč je predstavljala povezovalni člen kulturnih in gospodarskih vezi med različnimi skupnostmi. Razumemo jo kot razvito in premožno družbo, ki je pred tremi tisočletji enakovredno sodelovala v kulturnih in posredniških tokovih jadranskega ter širšega evropskega prostora. Čeprav le delno raziskani in mestoma poškodovani, grobišča in posamezni grobovi o tem pričajo neposredno, razkrivajoč številne pogrebne prakse in obrede s pridruženimi predmeti. Vsak raziskan grob bogati arhiv podatkov, doslej nepoznanih v osorskem kontekstu; vsi skupaj pa odražajo družbo živih, ki je te obrede izvajala in predmete odlagala. Na ta način pomembno prispevajo k razumevanju organiziranosti prebivalstva že v tistem času, njihovih običajev in verovanj ter simbolike prostora znotraj in zunaj tedanjega naselja. Dosedanje interpretacije materialne kulture so odražale izjemen spekter kulturnih povezav, ki se je z novimi analitičnimi metodami znatno razširil in s katerim se poskuša izrecnejše razlagati vključevanje Osorja v kulturne mreže starega zemljepisa Evrope. Poleg geografskega položaja, je družba ta, ki je omogočila določeno ekskluzivnost na severnem Jadranu in s tem zaslužno pridobitev prepoznavnega mesta v antičnih pisnih virih, bodisi v povezavi z mitološkimi izročili bodisi z neizogibno pomembnimi kovinami.

Ključne besede Osor, 1. tisočletje pr. n. št., otočnost, arheologija smrti, materialna kultura

On the Tin Islands along the Amber Route: The Island Exclusivity of Osor

**Martina Blečić Kavur, Boris Kavur, Maja Čuka, Mario Novak,
Mateusz Cwaliński, and Wayne G. Powell**

Invited Lecture

Abstract The archaeological heritage of Osor confirms that the island community was neither isolated nor excluded, but served as a connecting link within the cultural and economic networks of various communities. It can be regarded as a developed and affluent society that, three millennia ago, participated equally in the cultural and intermediary exchanges of the Adriatic and wider European regions. Although only partly excavated and in places deteriorated, burial grounds and individual graves reveal a variety of burial practices and rituals, along with associated grave goods. Each grave enriches the archive of previously unknown data in the Osor context; together, they reflect a community of the living who performed these rituals and deposited these objects. Consequently, they contribute significantly to understanding the organisation of the population at that time, their customs and beliefs, and the symbolic use of space within and beyond the settlement. Previous interpretations of material culture demonstrated an exceptional range of cultural connections, which has been greatly expanded through new analytical methods, allowing a more explicit understanding of Osor's integration into the cultural networks of ancient Europe. Beyond its geostrategic position, it was the society itself that enabled a certain exclusivity in the northern Adriatic, thus earning Osor a notable place in ancient written sources, whether in connection with mythological traditions or with the inevitably important metals.

Keywords Osor, 1st millennium BCE, insularity, funerary archaeology, material culture

Nove ugotovitve o življenju in smrti v železnodobnem Osorju: preliminarni rezultati bioarheološke študije človeških ostankov

Mario Novak, Martina Blečić Kavur, Boris Kavur, Mario Carić, Federico Lugli in Fabio Cavalli

Vabljeno predavanje

Povzetek Prispevek predstavlja preliminarne rezultate multidisciplinarne študije človeških ostankov, pridobljenih iz grobov železne dobe, odkritih na različnih lokacijah v Osorju in njegovi okolici v zadnjih desetletjih. Na splošno je ohranjenost skeletov slaba, saj so večinoma močno fragmentirani, medtem ko so skeleti iz starejših izkopavanj ohranjeni le delno in so na voljo za analizo le v omejenem obsegu. Do sedaj je študija vključevala konvencionalno bioarheološko makroskopsko analizo, AMS radiokarbonsko datiranje izbranih skeletov, analizo stabilnih izotopov ogljika in dušika ter analizo starodavne DNK. Čeprav je število odkritih grobov železne dobe v Osorju še vedno relativno majhno, so pridobljeni podatki že omogočili natančnejši vpogled v kronologijo preučevanih grobov, hkrati pa razkrivajo prej neznane podrobnosti o splošnem zdravstvenem stanju, vsakodnevni prehrani in strukturi železnodobnih prebivalcev tega pomembnega prazgodovinskega naselja. Nadaljnje raziskave, ki vključujejo tudi analizo izotopov stroncija, bodo prinesle več informacij o mobilnosti in morebitnih migracijah teh ljudi, medtem ko bo rekonstrukcija obraza določenih kranijev dala več podatkov o njihovem fizičnem izgledu.

Ključne besede Osor, grobovi železne dobe, človeški ostanki, stabilni izotopi, analiza sDNK

New Insights into Life and Death in Iron Age Osor: Preliminary Results from the Bioarchaeological Study of Human Remains

**Mario Novak, Martina Blečić Kavur, Boris Kavur, Mario Carić,
Federico Lugli, and Fabio Cavalli**

Invited Lecture

Abstract The paper presents the preliminary results of a multidisciplinary study of human remains recovered from Iron Age burials found at different sites in and around Osor in the last few decades. In general, the preservation of the skeletons is poor as most of them are highly fragmented, while those from older excavations have only been partially collected and available for the analysis. The study so far included conventional bioarchaeological macroscopic analysis, direct AMS radiocarbon dating of selected skeletons, carbon and nitrogen stable isotopes analysis, and ancient DNA analysis. Although the number of the recovered Iron Age burials from Osor is still relatively small, the already obtained data provided a more precise picture on the chronology of the studied burials, but also previously unknown details about the general health, everyday diet as well as the population structure of Iron Age inhabitants of this important prehistoric site. Additionally, the ongoing investigation including strontium isotopes analysis will provide more information on mobility and possible migrations of these people, while facial reconstruction of certain crania will tell us more about their physical appearance.

Keywords Osor, Iron Age burials, human remains, stable isotopes, aDNA analysis

Uvoz kositra v Osor v času starejše železne dobe (900–700 pr. n. št.)

Wayne G. Powell, Ryan Mathur, Martina Blečić Kavur in Boris Kavur

Vabljeni predavanje

Povzetek Statistična porazdelitev izotopske sestave zbirk predmetov se razlikuje tako v času kot v prostoru. Te razlike razkrivajo spreminjajoče se kovinske trge, ki so povezovali vir surovine s porabnikom. Začetna analiza 17 bronastih predmetov iz Osorja, datiranih v obdobje med 900 in 700 pr. n. št., je pokazala razpon vrednosti $\sigma^{124/116}\text{Sn}$ (NIST 3161a) 0,95‰, od –0,07 do 0,88‰, s povprečno vrednostjo 0,41‰. To je primerljivo s širšim značajem istrskega bronastega bronastega časa: 54 vzorcev z razponom od –0,25 do 1,12‰ in povprečno vrednostjo 0,49‰. Izotopska sestava kositra v teh jadranskih bronastih zbirkah je podobna tisti, ki jo kažejo nuraški bronasti predmeti, datirani v obdobje 1000–700 pr. n. št. To nakazuje homogenizacijo severnomediterranskega trga s kositrom, pri čemer je kovina verjetno izvirala predvsem iz zahodne Evrope. To se razlikuje od narave uvoza kositra v Caput Adriae v pozni bronasti dobi (1300–1000 pr. n. št.), ko je bil kositer povezan z višjimi vrednostmi $\sigma^{124/116}\text{Sn}$ (povprečje 0,75‰), primerljivimi s tovorom kositra z uluburunskega brodoloma (ok. 1300 pr. n. št.) na južni obali današnje Turčije. Premik k nižjim povprečnim vrednostim $\sigma^{124/116}\text{Sn}$ na severnem Jadranu v starejši železni dobi odraža propad trgov, ki so prinašali kositer iz vzhodnih virov, in novo odvisnost od kositra, pridobljenega iz evropskih nahajališč.

Glavne besede Jadran, Caput Adriae, starejša železna doba, izotopi kositra, trgovina s kositrom

Tin Imports to Osor in the Early Iron Age (900–700 BCE)

Wayne G. Powell, Ryan Mathur, Martina Blečić Kavur, and Boris Kavur

Invited Lecture

Abstract Statistical distributions of the isotopic composition of assemblages of artifacts vary both in terms of time and space. This variation identifies shifting metal markets that linked source to consumer. An initial analysis of 17 bronze artifacts from Osor dating to the interval of 900–700 BCE yield a range in $\sigma^{124/116}\text{Sn}$ (NIST 3161a) of 0.95‰ from –0.07 to 0.88‰ with a mean of 0.41‰. This is comparable to the broader character of Istrian bronze at that time: 54 samples yielding a range of –0.25 to 1.12‰ and mean of 0.49‰. Furthermore, the Sn isotopic composition of these Adriatic bronze assemblages is similar to that exhibited by Nuragic bronzetti dating to 1000–700 BCE. This suggests a homogenization of the northern Mediterranean tin market with the metal likely originating predominantly from western Europe. This is in contrast to the nature of tin import to the Caput Adriae in the preceding Late Bronze Age (1300–1000 BCE), when the tin was associated with a higher $\sigma^{124/116}\text{Sn}$ distribution (mean 0.75‰), comparable to the tin cargo of the Uluburun shipwreck (ca. 1300BCE) on the southern coast of Turkey. The shift to lower average $\sigma^{124/116}\text{Sn}$ in northern Adriatic in the Early Iron Age reflects the collapse of markets bringing tin from eastern sources, and a new reliance on tin derived from the deposits of Europe.

Keywords Adriatic, Caput Adriae, Early Iron Age, tin isotopes, tin trade

Urbane in administrativne transformacije na vzhodnem Jadranu: primer Absorusa

Feđa Milivojević

Vabljeni predavanje

Povzetek Starodavno naselje Absorus (današnji Osor na otoku Cresu) je pomemben, a pogosto spregledan primer urbanega razvoja in vključevanja lokalnih skupnosti na vzhodnem Jadranu v zgodnjem cesarskem obdobju. Zlasti vprašanje municipalnega statusa pod Tiberijem ostaja kompleksno: zanesljivi dokazi izhajajo le iz omejenega števila napisov, katerih interpretacija se med raziskovalci močno razlikuje, od solidnih trditev o zgodnji tako imenovani romanizaciji, do bolj previdnih branj. Prispevek ponuja novo interpretacijo epigrafskih virov, s poudarkom na družbeno-političnem ozadju in implikacijah za razumevanje lokalnih procesov municipalizacije. Razprava Absorus postavlja tudi v širši prostorski kontekst zgodnjega cesarskega obdobja: interakcijo med urbanim središčem in njegovim ruralnim zaledjem, dinamiko sodelovanja lokalne elite v rimskih institucijah in položaj mesta znotraj širše mreže obalnih naselij v provincah.

Ključne besede Osor, vzhodni Jadran, municipalizacija, epigrafika, tribus Claudia

Urban and Administrative Transformations on the Eastern Adriatic: The Case of Absorus

Feđa Milivojević

Invited Lecture

Abstract The ancient settlement of Absorus (today's Osor on the island of Cres) is an important but often overlooked example of urban development and the integration of local communities in the eastern Adriatic during the early Imperial Period. The question of municipal status under Tiberius remains particularly complex: reliable evidence comes only from a small number of inscriptions, the interpretation of which varies widely among scholars, ranging from strong claims of early so-called Romanisation to more cautious readings. This paper offers a new interpretation of the epigraphic evidence, focusing on the socio-political background and the implications for understanding local processes of municipalisation. The discussion also situates Absorus within the broader spatial changes of the early Imperial Period: the interaction between the urban centre and its rural hinterland, the dynamics of local elite participation in Roman institutions, and the position of the city within the wider network of coastal settlements in the province.

Keywords Osor, eastern Adriatic, municipalisation, epigraphy, tribus Claudia

Latinski napisi na kamnih iz antičnega Osorja

Anamarija Kurilić

Vabljeno predavanje

Povzetek Napisi na kamnih (epigrafi) so najneposrednejše pričevanje prebivalstva določenega prostora in časa, zlasti tistega, ki ni v fokusu zgodovinarjev ali drugih kronistov. Prenašajo misli posameznikov, o katerih sicer ne bi nikoli izvedeli; kajti napise niso postavljali le premožni in ugledni, ne le elite, temveč tudi obrtniki, vojaki, sužnji in nekdanji sužnji, ženske in celo otroci. Rimski napisi iz Osorja so že dolgo predmet zanimanja tako laikov kot strokovnjakov, prvi podatki in zapisi o njih pa segajo več stoletij nazaj. Danes so večinoma ohranjeni v Arheološki zbirki v Osorju, nekateri, pa so danes izgubljeni. V raziskavah, ki potekajo v okviru znanstveno-raziskovalnega projekta Hrvaške zaklade za znanost »Sit tibi terra levis: formule in fraze z nagrobnih spomenikov antične Liburnije in Japodije«, je bila nedavno izvedena revizija spomenikov in njihovih besedil, tako, da sedaj razpolagamo s precej jasnejšimi podatki o osorskih epigrafih. V predavanju bo predstavljeno stanje osorskega epigrafskega korpusa, njegova analiza ter podatki, ki nam jih ti napisi dajejo o prebivalstvu Osorja in njihovih življenjskih praksah.

Ključne besede Osor (Apsorus), latinska epigrafija, antična zgodovina, socialna zgodovina

Latin Inscriptions in Stone from Ancient Osor

Anamarija Kurilić

Invited Lecture

Abstract Stone inscriptions (epigraphs) offer the most direct evidence of the population of a specific place and time, particularly those groups often overlooked by historians or other chroniclers. They convey the thoughts of individuals we would otherwise never know; inscriptions were set up not only by the wealthy and prestigious, nor solely by the elite, but also by artisans, soldiers, slaves and freedmen, women, and even children. Roman inscriptions from Osor have long attracted the interest of both scholars and the general public, with the earliest records and studies dating back several centuries. Today, most of these inscriptions are preserved in the Archaeological Collection in Osor, although some have disappeared entirely. As part of research conducted within the Croatian Science Foundation project 'Sit tibi terra levis: Formulas and Phrases from the Funerary Monuments of Ancient Liburnia and Iapodia,' a revision of the monuments and their texts has recently been completed, providing much clearer data on the Osor epigraphic corpus. This lecture will present the current state of the Osor epigraphic corpus, its analysis, and the information it provides about the population of Osor and their everyday practices.

Keywords Osor (Apsorus), Latin epigraphy, ancient history, social history

Stare najdbe v novi luči: ponovna obravnava kiparskih del Apsora

Katarina Šmid

Vabljeno predavanje

Povzetek O pomenu municipija Apsorus v zgodnjem cesarskem obdobju pričajo tudi kiparski spomeniki, pri čemer so pozornost običajno pritegnile zlasti marmorne glave članov julijsko-klavdijske dinastije. Nasprotno so bila druga kiparska dela, ki bodo predstavljena v pričujočem prispevku, deležna precej manj pozornosti. Relief Spinaria predstavlja edini znani kamniti reliefni prikaz tega slavnega zgodnje helenističnega motiva, ki ga je v Apsoru reinterpretila neka lokalna delavnica. Prilagoditev grškega prototipa nikakor ni bila izjemna, saj so umetnine, ki koreninijo v grškem klasičnem kiparstvu, v provinci Dalmaciji znane že v desetletju po utrditvi rimske oblasti. Nagrobna stela pomorskega centuriona Likeja je še posebej enigmatična zaradi okroglega predmeta, ki ga ta drži v rokah. V primerjavi z zgodnje cesarskimi stelami pomorskih centurionov iz Ravenne je mogoče, da je ta predmet vsaj v tistem obdobju simboliziral vitis, splošno priznani statusni simbol avtoritete centurionov. T. i. muza-kariatida je bila med kiparskimi najdbami iz Osorja omenjena le sporadično, saj je že v 16. stoletju postala del Grimanijeve zbirke v Benetkah. Kip odraža tip kariatid Tralles/Cherchell in velja za eno izmed njegovih derivacij. Glede na variacije v položaju rok med ohranjenimi primeri se zdi verjetno, da so bile te figure zasnovane kot komplementarni pari ter so služile kot dekorativni oporniki arhitekturnih objektov.

Ključne besede Apsorus, kiparstvo, kariatida, Likej, Spinario

Old Discoveries, New Insights: Reconsidering the Sculpture of Apsorus

Katarina Šmid

Invited Lecture

Abstract The significance of the municipium of Apsorus during the Early Imperial period is also evidenced by its sculptural material, particularly the marble portrait heads of members of the Julio-Claudian dynasty, which have frequently been the focus of scholarly attention. By contrast, other sculptural finds have received considerably less notice and will be re-examined in this contribution. The Spinario relief presents the only known stone relief representation of this celebrated Early Hellenistic motif, here reinterpreted by a local workshop. Such adaptation of a Greek prototype was hardly incidental, as artworks derived from Classical statuary—especially in the province of Dalmatia—appeared within a decade of the establishment of Roman authority. The funerary stele of the naval centurion Liccaeus is particularly enigmatic because of the circular object held in his hands. In comparison with Early Imperial stelae of naval centurions from Ravenna, it is possible that, at least in that period, it symbolised the vitis, the widely recognised emblem of centurions' authority. The so-called Muse-Caryatid has been only sporadically mentioned among the sculptural discoveries from Osor, as it entered the Grimani collection in Venice as early as the 16th century. The statue reflects the Tralles/Cherchell type of Caryatids and is regarded as one of its derivations. Given the variations in arm position among extant examples, it seems likely that such figures were originally conceived as complementary counterparts, serving as decorative supports for a single architectural structure.

Key words Apsorus, sculpture, Caryatid, Liccaeus, Spinario

Steklene najdbe kot pokazatelj bogastva in prestiža v Osorju

Irena Lazar

Vabljeno predavanje

Povzetek V 2. in 1. stoletju pr.n.št. so bile helenistične države Sredozemlja osvojene s strani rimske države in kot province vključene v imperij. Ta vključitev je pomenila za rimsko državo kulturne in družbene vplive in premike; do številnih novosti je prišlo tudi na področju različnih obrti, kar velja tudi za steklarstvo. To se je v rimski državi razvilo na osnovi znanja iz helenističnih središč in je pomenilo elan za oblikovanje in razvoj samostojne rimske steklarske industrije, ki je cvetela od avgustejske dobe do konca rimskega imperija. Nobeno obdobje ne ilustrira bolje izjemne raznolikosti tehnoloških praks kot prav avgustejski čas. Steklene najdbe arheoloških kontekstov tega obdobja kažejo bistveno večjo širino in razpon v oblikah, barvi, okrasih ter proizvodnih tehnikah. V vse večjem obsegu so začeli izdelovati enobarvne posode iz prosojnega stekla, ki so jih izdelali z oblikovanjem s pomočjo kalupov, ko so steklen disk segreti in oblikovali po ogretem kalupu. Importi teh izdelkov v novo nastalih mestih odražajo ekonomsko moč prebivalcev. Prisotnost steklenega gradiva izdelanega s različnimi steklarskimi tehnikami, kot lahko prepoznamo med gradivom iz Osorja, kaže da je imela naselbina v tem času široko razvejano trgovino in prebivalce z ustrežno kupno močjo. Pretežni del v kalupu izdelanega gradiva je bil uvožen iz na novo osnovanih steklarskih delavnic osrednje Italije, posamični kosi po so morda prišli tudi iz sredozemskih delavnic vzhodnega dela imperija.

Ključne besede rimsko steklo, steklo izdelano v kalupu, steklo pihano v kalupu, dekolorirano steklo, poslikano steklo

Glass Finds as an Indicator of Wealth and Prestige in Osor

Irena Lazar

Invited Lecture

Abstract In the 2nd and 1st centuries BCE, the Hellenistic states of the Mediterranean were conquered and incorporated into the Roman empire as provinces. This brought cultural and social influences, as well as intense development and many innovations in various crafts, including glassmaking. Glassworking developed in the Roman state based on knowledge from the Hellenistic centres and provided the impetus for the creation and development of an independent Roman glass industry, which flourished from the Augustan era until the end of the Roman Empire. No period better illustrates the remarkable diversity of technological practices than the Augustan period. Glass finds from archaeological contexts of this period show great variety and range in form, colour, decoration, and production techniques. Monochrome transparent glass vessels, made in moulds, and later also decolourised vessels, were increasingly produced. Imports of these products into newly created cities along the Adriatic reflect the economic strength of the population. The presence of glass objects made using various glassmaking techniques, as evident in the material from Osor, suggests that the settlement had a wide trade network and a population with corresponding economic power at that time. Most early glass vessels were imported from the newly established glass workshops of central Italy, but individual pieces may also have originated from workshops in the Eastern Mediterranean.

Keywords Roman glass, mould-made glass, mould-blown glass, decolourised glass, painted glass

Arheološke raziskave osorske nekropole na območju Kavanele in Preko mosta

Josip Burmaz, Dženi Los in Dinko Tresić Pavičić

Vabljeno predavanje

Povzetek Arheološka izkopavanja, izvedena v okviru projekta rekonstrukcije državne ceste DC 100, odseka Osor-Nerezine na otoku Lošinju, so razkrila izjemno pomembno najdišče, ki zajema ostanke iz prazgodovinskega, antičnega in novoveškega obdobja. Najdišče z dolžino približno 350 metrov je bilo predmet raziskav, izvedenih v dveh fazah: zaščitne raziskave v letih 2018 in 2019 ter sondažna izkopavanja leta 2021. Zaščitne arheološke raziskave, zaključene v začetku leta 2019, so obsegale površino 300 m² na območju Kavanele in Preko mosta, nedaleč od mostu na lošinjski strani Osorja. Med raziskavami so bili odkriti trije železnodobni skeletni grobovi (8.–2. stol. pr. n. št.) in 18 rimskodobnih žarnih grobov. Sondažna izkopavanja leta 2021 so zajemala pet sond (464 m²) z ostanki antične nekropole, med katerimi je bilo dokumentiranih 120 jamskih struktur, večinoma grobov. Poleg tipičnih keramičnih in steklenih posod, svetilk ter kovinskih predmetov so bili najdeni tudi redki karbonizirani ostanki hrane, sadežev, polževih in školjčnih lupin ter železni žebli. Raziskave potrjujejo, da gre za nekropolo, ki ponuja dragocene vpogledne ne le v pogrebne običaje, temveč tudi v širše družbene, gospodarske in kulturne vidike življenja antičnega Osorja.

Ključne besede Osor, nekropola, železnodobni grobovi, antično obdobje, pogrebne prakse

Archaeological Investigations of the Osor Necropolis in the Area of Kavela and Preko mosta

Josip Burmaz, Dženi Los, and Dinko Tresić Pavičić

Invited Lecture

Abstract Archaeological excavations conducted as part of the reconstruction project for the state road DC 100: Osor-Nerezine on the island of Lošinj, revealed a highly significant site containing remains from prehistoric, Roman, and modern periods. The site, measuring approximately 350 metres in length, was examined in two phases: rescue excavations in 2018 and 2019, and a trial trenching in 2021. The rescue excavations, completed in early 2019, covered an area of 300 m² in the zones of Kavela and Preko mosta, near the bridge on the Lošinj side of Osor. These investigations uncovered three Iron Age inhumation graves (8th–2nd century BCE) and 18 Roman cremation burials. The 2021 investigations involved five trenches (464 m²) containing remains of the Roman necropolis, within which 120 pit features were documented, the majority being graves. In addition to the typical ceramic and glass vessels, lamps, and metal artefacts, rare carbonised remains of food, fruit, snail and shell fragments, and iron nails were also recovered. The findings confirm that this necropolis offers valuable insights not only into funerary practices but also into the wider social, economic, and cultural aspects of life in ancient Osor.

Keywords Osor, necropolis, Iron Age graves, Roman period, funerary practices

Zahodna nekropola antičnega Osorja

Andrej Janeš, Kristina Turkalj in Marin Matković

Vabljeno predavanje

Povzetek Na severovzhodni obali otoka Lošinja, ob ožini Kavanela, ki ga ločuje od otoka Cresa, je že od 19. stoletja poznan obstoj nekropole, v katero so bili pokopani prebivalci prazgodovinskega in rimskodobnega Osorja. Zaradi potreb obnove glavne ceste so bila v letih 2019 in 2021 izvedena zaščitna arheološka izkopavanja, s katerimi je bilo ugotovljeno, da se nekropola razteza skoraj 400 metrov proti jugu. Služba Hrvaškega restavratorskega zavoda je leta 2022 izvedla izkopavanja na skoraj 4000 m² površine, pri čemer je bilo odkritih več kot 200 grobov, od tega 188 žganih in 14 skeletnih. Pri večini žganih grobov so bili ostanki pokojnikov položeni v preproste jame, izkopane v živo skalo. Poleg tega so bili prepoznani tudi zidani grobovi in pokopi z urnami. Pri skeletnih pokopih so bili pokojni položeni v preproste grobne jame. Raziskani grobovi so bili skoncentrirani v več skupinah v severnem, osrednjem in južnem delu nekropole. Odkrit je bil en pozno prazgodovinski grob, medtem ko večina prazgodovinskih najdb izvira izven grobnih celot. Glede na razporeditev najdb iz tega obdobja je mogoče sklepati, da se je prazgodovinska nekropola razprostirala na severnem delu najdišča, bliže Kavaneli. Rimska nekropola se razteza proti jugu, pokopi na raziskanem delu nekropole pa so se, glede na keramične, steklene in numizmatične najdbe, odvijali od zadnjih desetletij 1. stoletja pr. n. št. do sredine 2. stoletja.

Gljučne besede Osor, antika, nekropola, keramične najdbe, steklene najdbe

The Western Necropolis of Ancient Osor

Andrej Janeš, Kristina Turkalj, and Marin Matković

Invited Lecture

Abstract On the northeastern coast of the island of Lošinj, along the Kavanela isthmus that separates it from the Cres island, a necropolis where the inhabitants of prehistoric and Roman Osor were buried has been known since the 19th century. Due to the reconstruction of the main road, rescue archaeological excavations were conducted in 2019 and 2021, revealing that the necropolis extends nearly 400 metres southwards. In 2022, the Croatian Conservation Institute carried out excavations over an area of almost 4,000 m², uncovering more than 200 graves; 188 cremation and 14 inhumation burials. In most cremation graves, the remains of the deceased were placed in simple pits dug into the bedrock. Additionally, tombs and urn burials were identified. The inhumation burials consisted of simple grave pits. The graves were concentrated in several groups within the northern, central, and southern parts of the necropolis. One Late Prehistoric grave was discovered, while most prehistoric finds originated outside the grave contexts. Based on the distribution of these finds, it may be assumed that the prehistoric necropolis was located in the northern part of the site, closer to Kavanela. The Roman necropolis extends southwards, and according to ceramic, glass, and numismatic finds, the burials in the investigated part of the necropolis date from the last decades of the 1st century BCE to the mid-2nd century.

Keywords Osor, Antiquity, necropolis, ceramic finds, glass finds

Bioarheologija človeških skeletnih ostankov z zahodne rimske nekropole

Željka Bedić in Andrej Janeš

Vabljeno predavanje

Povzetek Med zaščitnimi arheološkimi izkopavanji leta 2022 na otoku Lošinjju je bilo odkritih 188 žganih in 14 skeletnih grobov. Raznoliki pridatki v grobovih datirajo nekropolo v čas od zadnjih desetletij 1. stoletja pr. n. št. do sredine 2. stoletja. Antropološka analiza je z uporabo standardnih metodoloških kriterijev omogočila oceno biološkega spola, starosti in patoloških sprememb posameznikov. Možnost določitve teh parametrov je bila odvisna od ohranjenosti kostnih elementov v grobovih, ki so bili pri žganih pokopih pogosto fragmentirani zaradi procesa sežiganja. Medtem, ko je bilo pri skeletnih grobovih mogoče določiti pogostost nekaterih patologij, to pri žganih grobovih ni bilo izvedljivo. Kljub temu so bili dokumentirani kazalniki fizičnega stresa, kot so Schmorlove vozličke in osteoartritis na sklepkih in vretencih, pa tudi znaki stresa v otroštvu, kot sta cribra orbitalia in linearna hipoplazija sklenine. Ti podatki ponujajo tako vpogled v različne vidike vsakdanjega življenja v antičnem Apsorusu. Razen človeških ostankov iz žganih grobov nekropole Relja v Zadru, do zdaj še niso bili objavljeni rezultati analiz kostnih vzorcev iz 1. in 2. stoletja na prostoru vzhodnega Jadrana, kar daje vzorcu iz Osorja poseben pomen.

Ključne besede Apsorus, nekropola, žganih grobovi, skeletni grobovi, antropološka analiza

The Bioarchaeology of Human Skeletal Remains from the Western Roman Necropolis

Željka Bedić and Andrej Janeš

Invited Lecture

Abstract The 2022 rescue excavations on the island of Lošinj uncovered 188 cremation graves and 14 inhumation burials. A range of grave goods dates the necropolis from the last decades of the 1st century BCE to the mid-2nd century. Anthropological analysis used standard methodological criteria to estimate the biological sex, age, and pathological changes of the individuals. The ability to estimate these parameters depended on the preservation of bone elements in the grave, which was affected by the degree of fragmentation caused by the burning process in the cremation graves. While it was possible to calculate the frequency of certain pathologies in the inhumation sample, this was not feasible for the cremated material. Nevertheless, the presence of certain indicators of physical stress, such as Schmorl's nodes and osteoarthritis in the joints and vertebrae, as well as indicators of subadult stress, such as cribra orbitalia and linear enamel hypoplasia, was documented. These findings also provide insight into aspects of daily life in Apsorus. Apart from the human remains from the cremation graves of the Relja necropolis in Zadar, no results of analyses of 1st- and 2nd-century bone samples from the eastern Adriatic have yet been published. This makes the Osor sample particularly significant.

Keywords Apsorus, necropolis, cremation graves, inhumation graves, anthropological analysis

Vpliv morskega okolja na propadanje malte v arheoloških ostalinah: primer otoka Cresa

Andreja Sironić in Nives Doneus

Vabljeno predavanje

Povzetek Hrvaška obala skriva številne arheološke ostaline, med njimi tudi sledi nekdanjih naselbin. Fizični dokazi o času gradnje stavb iz rimskega obdobja in pozneje so pogosto ohranjeni v gradbeni malti, ki jo je mogoče datirati z metodo radiokarbonskega datiranja. Vendar pa uporaba te metode vključuje številne omejitve in izzive, med katerimi je tudi vpliv mediteranskega podnebja. Malta v teh območjih propada zaradi mehanskih poškodb, ki jih povzročajo močni vetrovi, visoka vlaga, izpostavljenost vodi ter prisotnost morske soli. Kristalizacija morske soli povzroča dodatno vpijanje vode in poškodbe strukture malte, hkrati pa spodbuja rekristalizacijo kalcita. V okviru dvoletnega hrvaško-avstrijskega projekta so ti procesi podrobneje raziskani na arheoloških ostalinah na otoku Cresu, predvsem v in okoli Osorja. Trenutni rezultati projekta kažejo, da vpliv morske soli na datiranje zgodovinskih malt ni tako izrazit, kot je bilo sprva pričakovano. Namesto tega ima znatnejši vpliv uporaba morskih sedimentov pri pripravi malte.

Ključne besede Osor, zgodovinska malta, radiokarbonsko datiranje, vpliv morske soli, morski sedimenti

The Influence of the Marine Environment on Mortar Degradation in Archaeological Remains: A Case Study of the Island of Cres

Andreja Sironić and Nives Doneus

Invited Lecture

Abstract The Croatian coastline contains a variety of archaeological remains, including traces of past settlements. Physical evidence for the construction dates of buildings from Roman times onwards can be found in their stonework mortars, which can be dated using the radiocarbon method. However, the application of radiocarbon dating faces various constraints and challenges, including the effects of the Mediterranean climate. Mortar in these regions is degraded by factors such as mechanical damage from strong winds, high humidity, exposure to water, and the presence of sea salt. Sea salt crystallises, drawing in more water and damaging the mortar structure, while also promoting calcite recrystallisation. A two-year Croatian-Austrian project was conducted to investigate this process in more detail, focusing on archaeological remains on the island of Cres, primarily in and around Osor. The current project results show that the influence of sea salt on the dating of historical mortars is less significant than expected. Rather, the use of marine sediments in mortar production has a considerable impact on their ^{14}C dating.

Keywords Osor, historical mortar, radiocarbon dating, influence of sea salt, marine sediments

Sveti Peter v Osorju: pogloblitni rezultati dvanajstih let arheoloških raziskav

Morana Čaušević-Bully in Sébastien Bully

Vabljeno predavanje

Povzetek Po izročilu je bil benediktinski samostan sv. Petra v Osorju ustanovljen v začetku 11. stoletja. Skromni ostanki nekdanje velike samostanske cerkve še danes zaznamujejo krajino »ruraliziranega« mesta Osor, vendar o samostanu, njegovi topografiji, arhitekturnem razvoju in okoliščinah njegove ustanovitve do nedavnih raziskav skorajda ni bilo znanega. Arheološka izkopavanja, ki sta jih med letoma 2006 in 2017 vodila Sébastien Bully in Morana Čaušević-Bully v okviru Mednarodnega raziskovalnega središča za pozno antiko in zgodnji srednji vek Univerze v Zagrebu (IRCLAMA), francoskega Nacionalnega centra za znanstvene raziskave (CNRS) in Francoske šole v Rimu (EFR), so prinesla pomembne nove vpoglede v dolgo zgodovino tega območja, ki sega daleč preko samostanskega obdobja. Prispevek predstavlja bistvene rezultate teh raziskav in oriše ključne faze poselitve in človekove dejavnosti na tem delu Osorja – od pozne bronaste dobe do novega veka. Posebna pozornost je namenjena arhitekturnim ostankom sakralnih stavb, ki so stale na mestu poznejšega samostana, ter topografiji srednjeveškega samostana sv. Petra.

Ključne besede pozna antika, zgodnji srednji vek, samostanska arhitektura, cerkev, mavzolej

Saint Peter of Osor: The Main Results of Twelve Years of Archaeological Investigations

Morana Čaušević-Bully and Sébastien Bully

Invited Lecture

Abstract According to tradition, the Benedictine Monastery of Saint Peter in Osor was founded at the beginning of the 11th century. While the modest remains of the former large monastic church still mark the landscape of the ‘ruralised’ city of Osor, almost nothing was known about the monastery, its topography, architectural development, or the circumstances surrounding its foundation until our recent research. Archaeological excavations conducted from 2006 to 2017 by Sébastien Bully and Morana Čaušević-Bully on behalf of the International Research Centre for Late Antiquity and the Early Middle Ages at the University of Zagreb (IRCLAMA), the National Centre for Scientific Research (CNRS) in France, and the French School of Rome (EFR), have provided important new insights into the site’s long history, extending beyond its monastic period. This paper will present the main results of this research, outlining the principal phases of human occupation and activity in this part of Osor, from the Late Bronze Age to the Modern Period. Particular attention will be given to the architectural remains of the religious buildings at the origin of the monastic site and to the topography of the medieval monastery of Saint Peter.

Keywords Late Antiquity, Early Middle Ages, monastic architecture, church, mausoleum

Najdbe, odkrite med izkopavanjem opatije svetega Petra v Osorju

Georgie Baudry

Vabljeno predavanje

Povzetek Arheološke raziskave na območju samostana sv. Petra v Osorju so odkrile več kot 1400 predmetov. Ti pričajo o različnih dejavnostih, ki so se na tem mestu odvijale od pozne antike do novega veka. Za rimsko obdobje še posebej izpostavljajo funkcije naselbine in prisotnost delavnic, med katerimi so nekateri predmeti povezani z metalurgijo. Osebni predmeti in železne spones kažejo na prisotnost bivalnih dejavnosti. Srednjeveški in noveveški artefakti jasno odražajo spremembe v funkciji območja po izgradnji prve cerkve v začetku 9. stoletja. Čeprav zgodnji srednji vek ostaja večinoma slabo dokumentiran, saj je najdenih le nekaj predmetov, se od 12. stoletja naprej predmeti začnejo polagati v grobove. Najdeni so v plasteh iz teh faz in so skoraj izključno povezani z redovniškimi in župnijskimi pokopališči. Analizirani so bili na različnih nivojih: na ravni posameznih predmetov, njihovih skupin in celotnega najdišča. V smislu grobnega konteksta je njihova primerjava z antropološkimi raziskavami omogočila rekonstrukcijo pogrebnih praks in oblačil. Med poznim srednjim in novim vekom je mogoče zaznati jasne spremembe v pogrebnih običajih. Pri nekaterih pokojnikih najdeni predmeti razkrivajo tudi njihov družbeni status. V tem smislu je posebej pomembno odkritje groba z zlatim prstanom in fragmentom opatske oziroma škofovske palice. Takšni predmeti, kot je palica, omogočajo umestitev materialne kulture prebivalcev Osorja v širši regionalni in evropski kontekst.

Ključne besede Sv. Peter, samostanska arheologija, pogrebne prakse, materialna kultura, metalurgija

The Small Finds Discovered during the Excavation of the Abbey of Saint Peter in Osor

Georgie Baudry

Invited Lecture

Abstract Archaeological research at the Abbey of Saint Peter in Osor yielded more than 1,400 small finds. These artefacts attest to the various activities that took place on the site between Late Antiquity and the Modern periods. For the Roman period in particular, they highlight the functions of the settlement and the presence of workshops, with some items related to metallurgy. Personal objects and iron fittings indicate domestic activities. Medieval and modern artefacts specifically demonstrate changes in the area's function following the construction of the first church at the beginning of the 9th century. While the Early Middle Ages remain largely undocumented, with only a few items found, from the 12th century onwards, artefacts began to be deposited in graves. The artefacts from these phases are almost exclusively linked to the monastic and parish cemeteries, and have been studied at different scales: at the level of the objects, their assemblages, and the site as a whole. In the grave context, in conjunction with anthropological research, has enabled the reconstruction of funerary practices and attire. A change in practices is evident between the Late Medieval and Modern periods. For some of the deceased, the items provide clues to their social status. In this regard, the discovery of a tomb containing a gold ring and a fragment of an abbatial or episcopal crozier is particularly significant. These objects allow us to situate the material culture of Osor's population within a regional and European context.

Keywords St Peter, monastic archaeology, funerary practices, material culture, metallurgy

Dva pogrebna prostora pri svetem Petru v Osorju: arheološko-antropološka perspektiva

Anaïs Delliste

Vabljeno predavanje

Povzetek Študija predstavlja primerjalno arheološko-antropološko analizo dveh pogrebnih prostorov znotraj cerkve sv. Petra v Osorju. Izkopavanja, izvedena med letoma 2006 in 2017, so odkrila več kot 540 posameznikov, katerih starost sega od pozne antike do zgodnjega novega veka. Analizirana sta bila dva konteksta z različnim kronološkim in socialnim profilom: mavzolej (11.–13. stoletje) in predprostor romanske cerkve, katere pogrebna raba pripada poznejši fazi (15.–17. stoletje). Mavzolej (104 posamezniki), pogrebna stavba s formae (zidani grobovi, izdelani vnaprej), je vseboval izključno odrasle, pri čemer je moška populacija jasno prevladovala. To nakazuje selektivno izbiranje, povezano z redovniško skupnostjo. Nekaj žensk je bilo pokopanih le v najzgodnejših fazah, kar odpira vprašanja o njihovi identiteti in statusu. Nasprotno pa predprostor (37 posameznikov) kaže večjo raznolikost: prisotne so vse starostne skupine, z večino mlajših oseb, najdeni pa so bili različni tipi pokopov, vključno z zidani grobovi, krstami in jamami. Analiza razkriva dve različni pogrebni logiki: mavzolej odraža omejeno, moško usmerjeno redovniško skupino, medtem, ko predprostor prikazuje župnijsko rabo z bolj raznolikimi praksami. Analize stabilnih izotopov že ponujajo vpogled v prehranske navade, medtem ko raziskave starodavne DNK obetajo nove informacije o izvoru, sorodstvenih povezavah in bodo pomagale natančneje interpretirati ugotovljene vzorce.

Ključne besede srednjeveški Osor, samostanske in župnijske skupnosti, pogrebna arheologija, bioarheologija, socialne identitete

Two Funerary Spaces at Saint Peter of Osor: An Archaeo-Anthropological Perspective

Anaïs Delliste

Invited Lecture

Abstract This study presents a comparative archaeo-anthropological analysis of two funerary sectors within the church of Saint Peter of Osor. Excavations conducted between 2006 and 2017 uncovered more than 540 individuals dating from Late Antiquity to the Early Modern period. Two contexts with different chronological and social profiles are considered: the mausoleum (11th–13th centuries) and the vestibule of the Romanesque church, whose funerary use belongs to a later phase (15th–17th centuries). The mausoleum (104 individuals), a funerary building with formae (masonry graves built in advance), contained only adults, with a clear majority of males. This suggests selective recruitment linked to the monastic community. A few females were also buried there, but only in the earliest phases, raising questions about their identity and status. In contrast, the vestibule (37 individuals) exhibits greater diversity: all age categories are represented, with a majority of immatures, and several burial types were found, including masonry tombs, coffins, and earthen pits. Our analysis highlights two distinct funerary logics: the mausoleum reflects a restricted, male-dominated monastic group, while the vestibule illustrates a parish-type recruitment with more diverse practices. Stable isotope analyses already provide insights into dietary habits, while ongoing aDNA research is expected to yield new information on ancestry and kinship, and help refine current interpretations.

Keywords Medieval Osor, monastic and parish communities, funerary archaeology, bioarchaeology, social identities

Ponovno oživimo Osor: dostopnost arheološke dediščine Osorja – od otoka do oblaka

Zrinka Mileusnić

Vabljeno predavanje

Povzetek Predstavitev obravnava paradoks Osorja: njegovo bogato arheološko dediščino od prazgodovine do srednjega veka ter hkrati omejeno fizično dostopnost, ki omejuje promocijo rezultatov obsežnih sodobnih raziskav. Osor je idealen laboratorij za preizkušanje dostopnih in trajnostnih načinov interpretacije arheološke in naravne dediščine. Predstavitev temelji na rezultatih raziskovalnega projekta in odgovarja na vprašanje: kako lahko rezultati obsežnih terenskih in laboratorijskih analiz dosežejo čim širše občinstvo, kadar so fizični obiski oteženi? Predlagamo koncept »Ponovno oživimo Osor« kot igriv, a resen pristop k odklepanju dostopa: ne prek množičnega turizma, temveč prek digitalnih interpretacij, ki upoštevajo fizično nosilnost prostora. Predstavili bomo analizo izzivov (inzularnost, prometna izoliranost, sezonska omejitev obiskov in nosilnost prostora) ter predlagali niz digitalnih rešitev, ki lahko »odklenejo« oddaljeno dediščino: razširjeno in virtualno resničnost, resne igre ter platformo Minecraft Education. Na podlagi pregleda dobrih praks na primerljivih lokacijah in našega razvojnega načrta za Osor predlagamo modularni »digitalni dvojnik« arheološke pokrajine, ki povezuje arheološke podatke, plasti varstva narave in izobraževalne poti. Cilj je promovirati lokacijo, obveščati javnost o rezultatih raziskav in razviti učna orodja za šole, ki poudarjajo pomen severnega Jadrana ter vključujejo elemente naravne dediščine in načela trajnostnega razvoja. »Ponovno oživimo Osor« je tako poziv k pametni prisotnosti: od otoka do oblaka, od podatkov do razumevanja, od fizične izoliranosti do načrtovane digitalne prisotnosti – v korist dediščine, skupnosti in učenja.

Gljučne besede Osor, arheološka dediščina, interpretacija dediščine, dostopnost, trajnostni razvoj

Make Osor Great Again: Accessibility of Osor's Archaeological Heritage – Between the Island and the Cloud

Zrinka Mileusnić

Invited Lecture

Abstract This presentation addresses the paradox of Osor: its wealth of archaeological heritage, contrasted with its limited physical accessibility, which restricts the dissemination of extensive contemporary research findings. Osor serves as an ideal laboratory for testing accessible and sustainable interpretations of archaeological inheritance. The presentation is based on the results of a research project and answers the question: how can the results of comprehensive field and laboratory analyses reach the widest possible audience when physical visits are challenging? We propose the concept of 'Make Osor Great Again' as a playful yet serious approach to unlocking access – not through mass tourism, but through digital interpretations that respect the space's carrying capacity. We present an analysis of the challenges (insularity, transport isolation, seasonality of visits, and carrying capacity) and propose a set of digital solutions to 'unlock' remote heritage: augmented and virtual reality, serious gaming, and the Minecraft Education platform. Based on a review of good practices at comparable sites and our own development plan for Osor, we propose a modular 'digital twin' of the cultural landscape that connects archaeological data, nature conservation layers, and educational trails. The aim is to promote the site, inform the public, and develop teaching tools for schools that emphasise the importance of the northern Adriatic region. 'Make Osor Great Again' is thus a call for smart presence: from island to cloud, from data to understanding, and a transition from physical isolation to planned digital presence for the benefit of heritage, community, and learning.

Keywords Osor, archaeological heritage, heritage interpretation, accessibility, sustainable development



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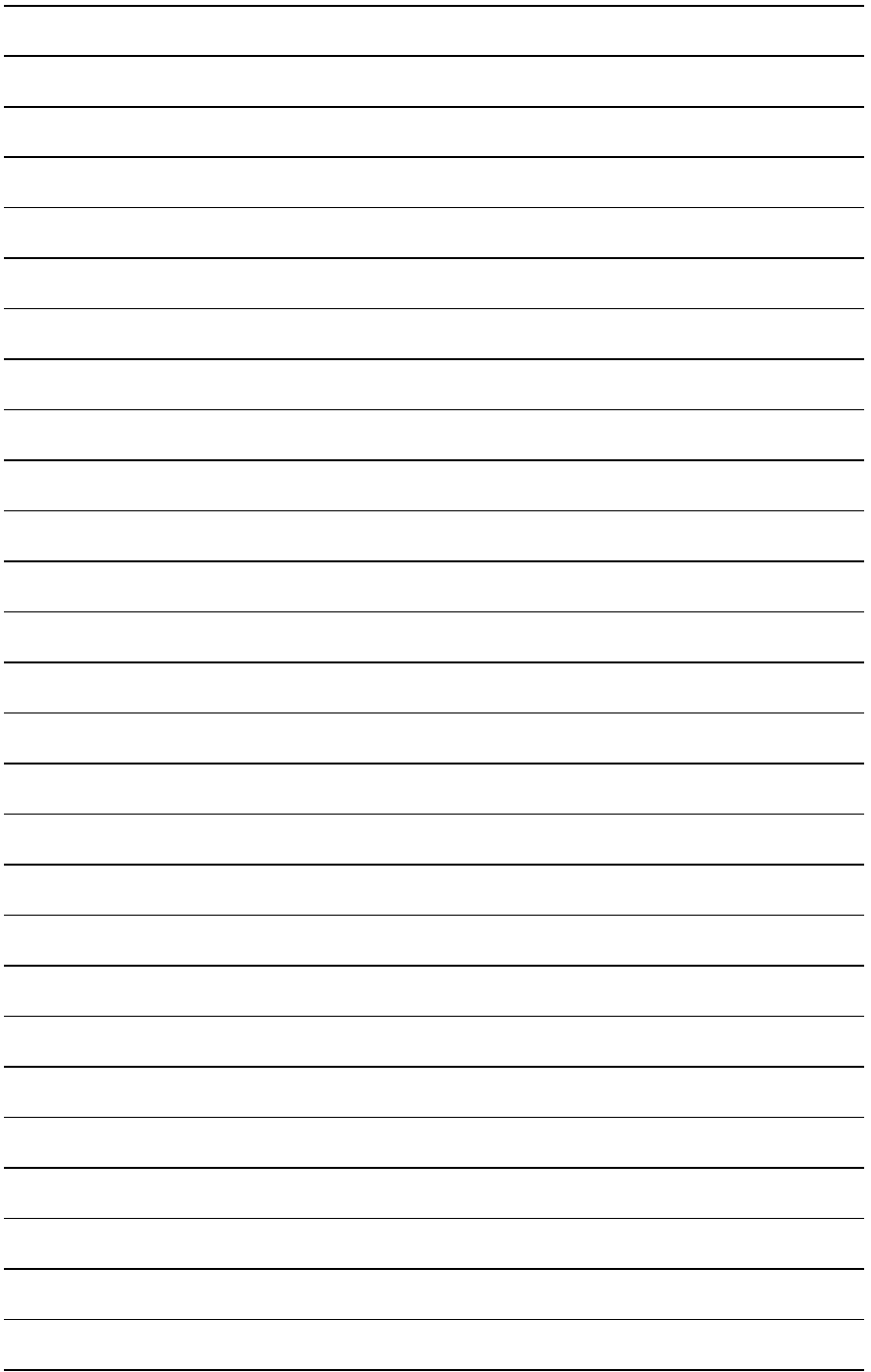
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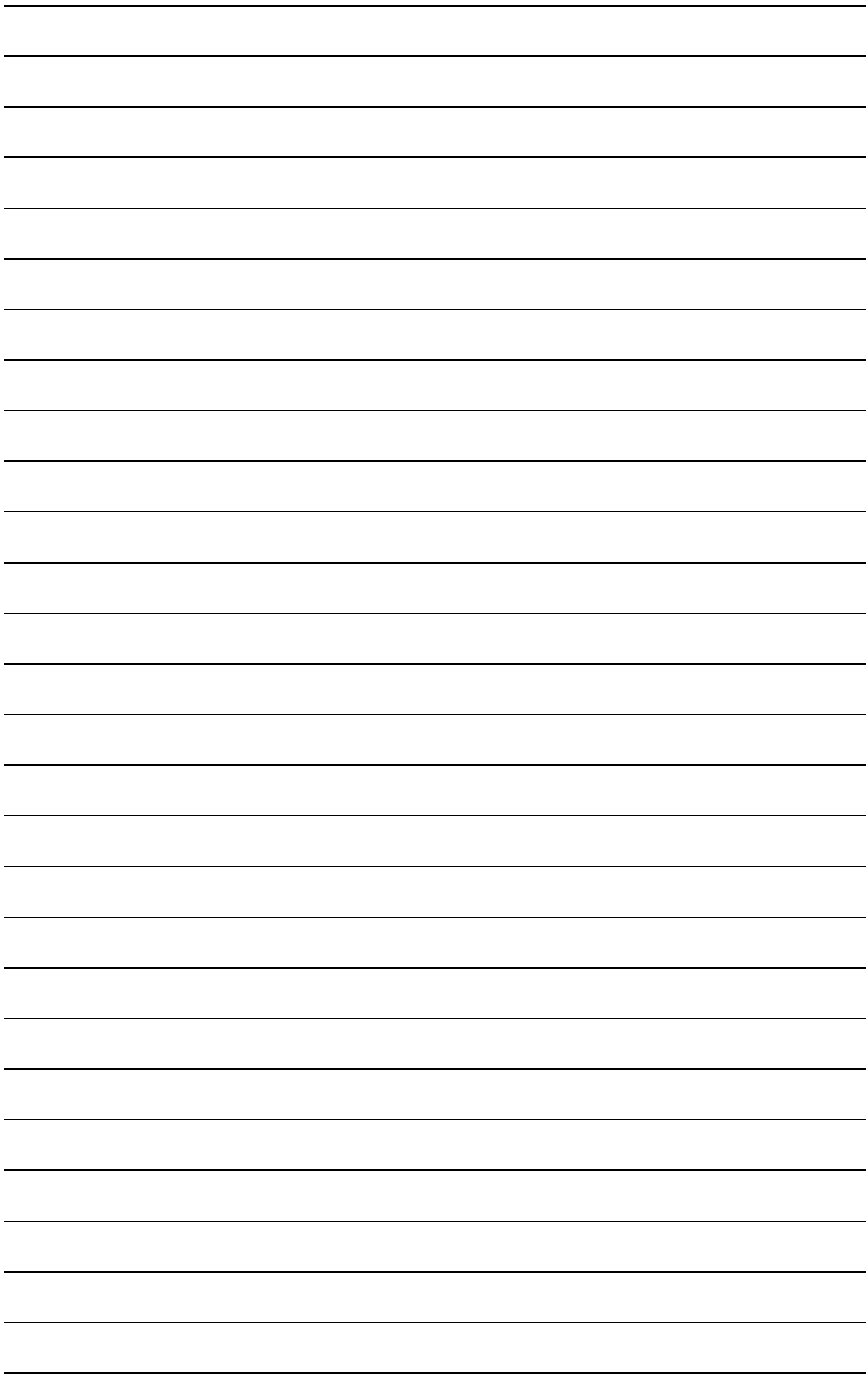
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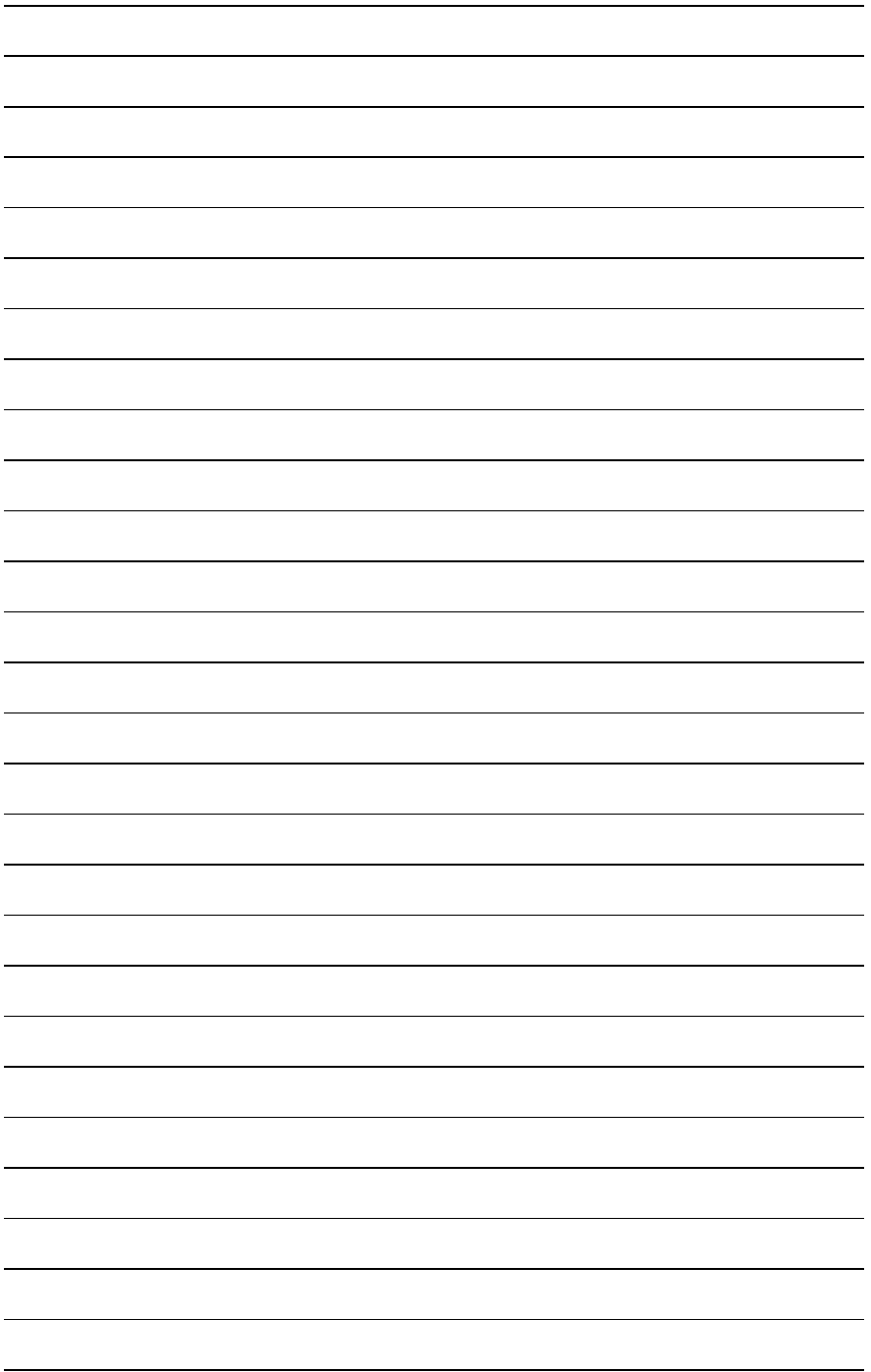
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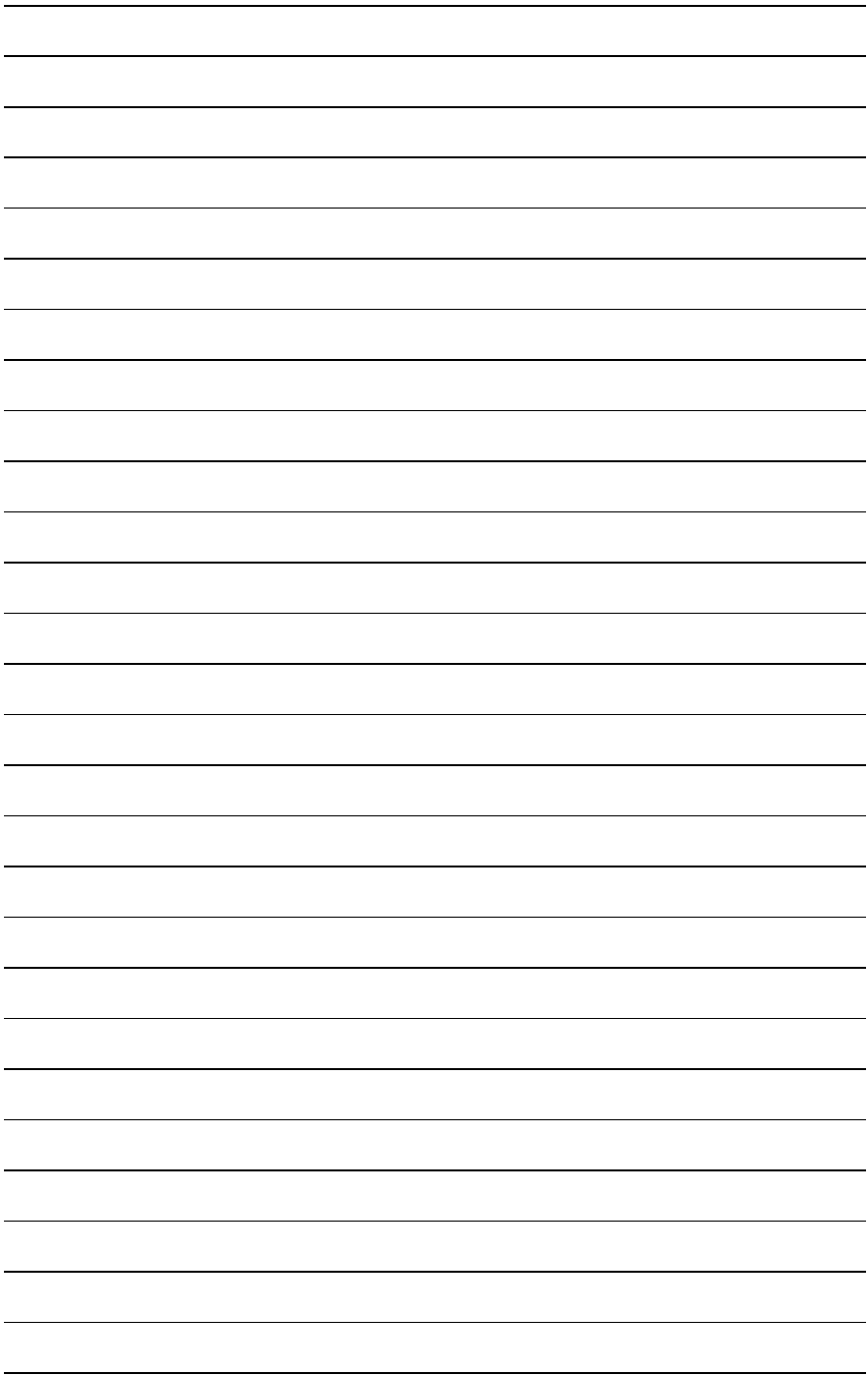
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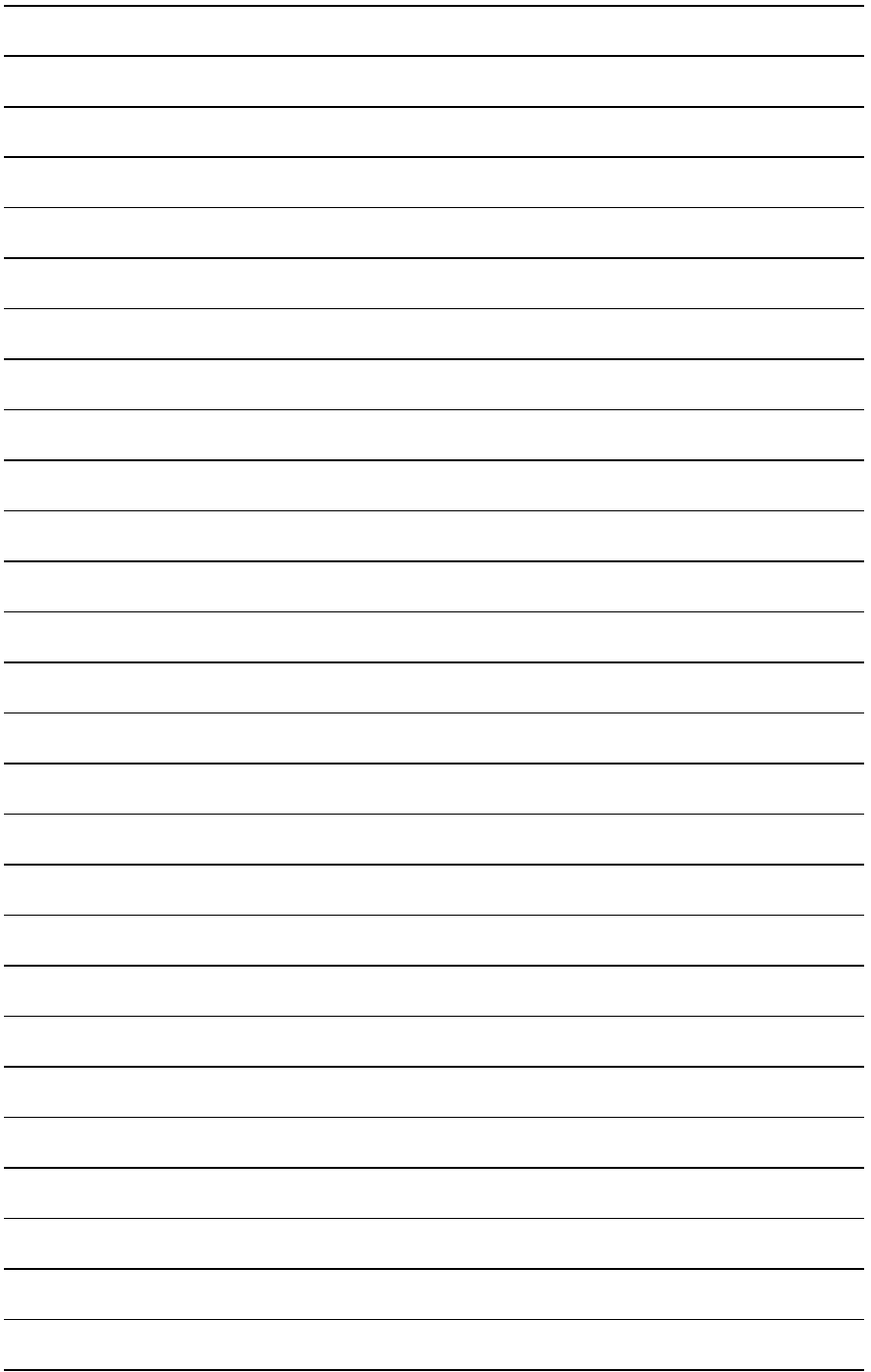


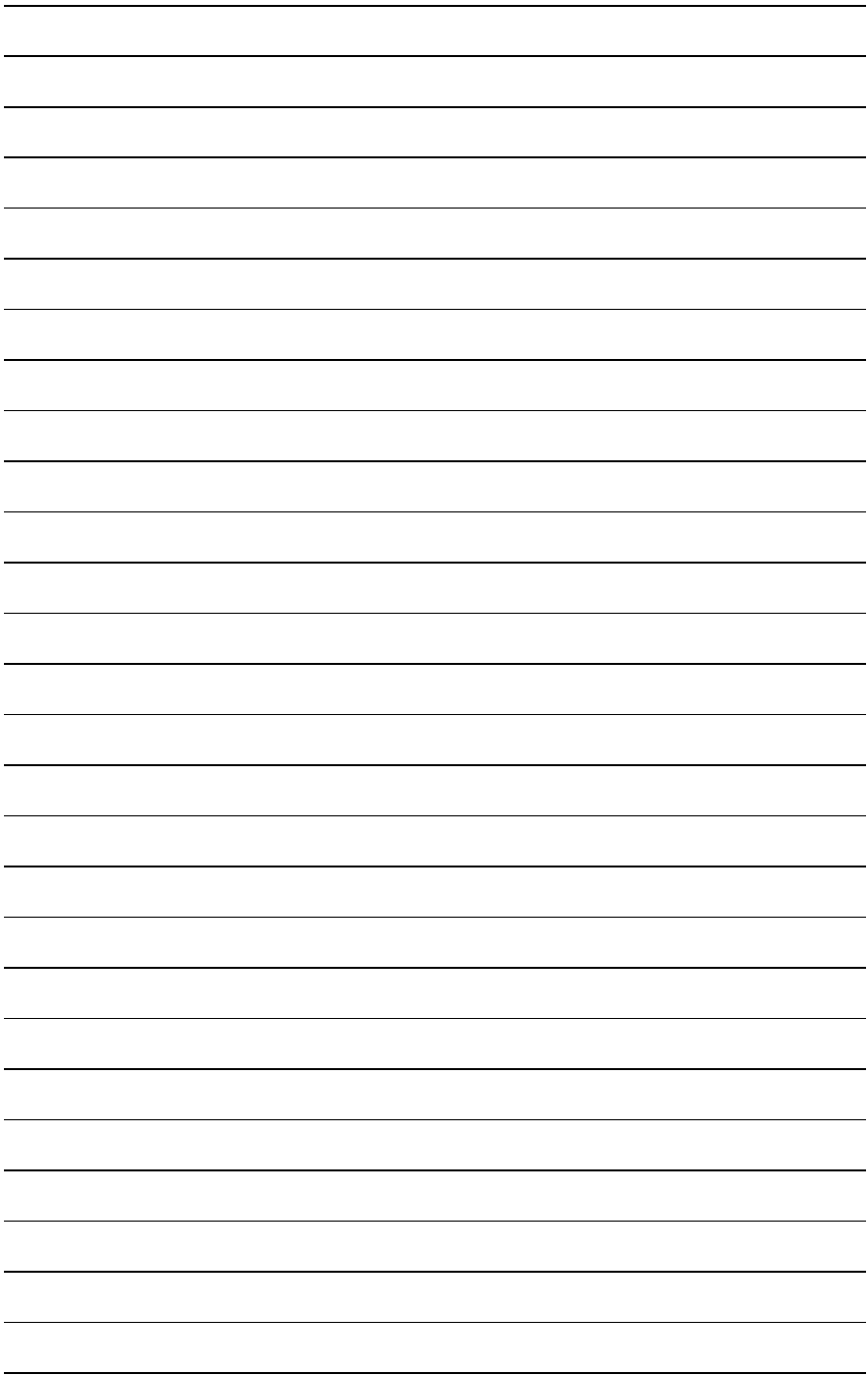














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