

*Summer school Environmental History and Historical Ecology of  
the Dinaric Karst, Slovenia, for master's and PhD students,  
13/14–18/19 July 2020*

**organized by:**

*University of Ljubljana, Faculty of Arts, Department of History (current seat of the European Society for Environmental History region Croatia–Serbia–Slovenia)*

contact: [ziga.zwitter@ff.uni-lj.si](mailto:ziga.zwitter@ff.uni-lj.si)

**in cooperation with:**

*Archives of the Republic of Slovenia*

*Jožef Stefan Institute, Department of Environmental Sciences*

*Notranjska Regional Park*

*Research Centre of the Slovenian Academy of Sciences and Arts, Anton Melik Geographical Institute*

*Research Centre of the Slovenian Academy of Sciences and Arts, Institute of Archaeology*

*Slovenian Forestry Institute*

*University of Ljubljana, Faculty of Arts, Department of Geography*

*University of Maribor, Faculty of Natural Sciences and Mathematics, Department of Biology*

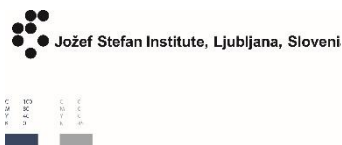
*University of Primorska, Faculty of Humanities, Department of History*

*University of Zadar, Department of Geography*

*University of Zagreb, Faculty of Humanities and Social Sciences, Department of History & Centre for Comparative Historical and Intercultural Studies, Environmental History Laboratory*

*University of Zagreb, Faculty of Science, Department of Geography*

*independent scholar Dr. Ivo Lučić*



Faculty of Natural Sciences  
and Mathematics



University of Zagreb



## **Sunday, 12 July/Monday, 13 July 2020:**

arrival of participants

**Note: day 1 & day 2: planned duration of every lecture/roundtable includes also time for discussion in the end.**

## **Monday, 13 July or Tuesday, 14 July 2020:**

**8.00–8.30: registration** (University of Ljubljana, Faculty of Arts, Aškerčeva 2, <https://goo.gl/q4y6r7>)

**8.30–8.40: opening of the school**

**8.40–9.40: The Dinaric Karst – Physical Overview**, Dr. Uroš Stepišnik (University of Ljubljana, Faculty of Arts, Department of Geography)

9.40–9.50: break

### **9.50–11.25: Roundtable 1:**

Geochemical and Isotopic Proxies of Environmental Change: Examples of Recent Terrestrial Authigenic Carbonates, Dr. Sonja Lojen (Jožef Stefan Institute, Department of Environmental Sciences)

Reconstruction of Palaeoenvironmental Conditions along the Eastern Adriatic Based on Isotopes from Speleothems, Dr. Nina Lončar (University of Zadar, Department of Geography)

Reconstruction of Late Holocene Relative Sea-Level Change and Climate Change Using *Lithophyllum* Rims – Example of the Northeastern Adriatic, Dr. Sanja Faivre (University of Zagreb, Faculty of Science, Department of Geography)

discussion

11.25–11.40: coffee break

### **11.40–13.15: Roundtable 2:**

Reconstruction of Palaeohydrological Settings in Karstic Landscapes: Examples from Slovenia and Australia, Dr. Mateja Ferk (Anton Melik Geographical Institute, Research Centre of the Slovenian Academy of Sciences and Arts)

Quaternary Environments of the Dinaric Karst, Uroš Stepišnik

Comparative Methodological Perspectives: Land-Use Changes and Erosion in the Last Two Centuries in the Karstic Julian Alps, Slovenia, Dr. Mauro Hrvatin, Dr. Matija Zorn, Dr. Blaž Komac, Dr. Mateja Breg Valjavec, Dr. Matej Gabrovec (Anton Melik Geographical Institute, Research Centre of the Slovenian Academy of Sciences and Arts)

discussion

13.15–14.30: lunch

**14.30–15.30: Dendroclimatology, with an Emphasis on the Dinaric Karst and Its Surroundings**, Dr. Tom Levanič (Slovenian Forestry Institute)

15.30–15.40: break

**15.40–16.40: Palynological Investigations**, Dr. Maja Andrič (Institute of Archaeology, Research Centre of the Slovenian Academy of Sciences and Arts)

16.40–16.50: break

**16.50–17.50: Archaeobotanical Investigations**, Dr. Tjaša Tolar (Institute of Archaeology, Research Centre of the Slovenian Academy of Sciences and Arts)

17.50–18.00: break

**18.00–19.00: Archaeozoology: Methods & Results**, Dr. Borut Toškan (Institute of Archaeology, Research Centre of the Slovenian Academy of Sciences and Arts)

## **Tuesday, 14 July 2020/Wednesday, 15 July:**

**8.30–9.30: The Commons as an Asset in the Integrated Peasant Economy. Slovenia, Italy and Sweden Compared**, Dr. Aleksander Panjek (University of Primorska, Faculty of Humanities, Department of History)

9.30–9.45: break

**9.45–10.45: Some Methodological Approaches to Environmental Change (Land Use, Land Cover) Research in Croatian Dinaric Karst**, Dr. Borna Fürst Bjeliš (University of Zagreb, Faculty of Science, Department of Geography)

10.45–11.00: coffee break

**11.00–12.00: Deforestation on the Eastern Coast of the Adriatic Sea During the Early Modern Period**, Dr. Hrvoje Petrić (University of Zagreb, Faculty of Humanities and Social Sciences, Department of History)

12.00–12.08: break

12.08–12.20: walk to the Archives of the Republic of Slovenia

### **12.20–13.20: Visit to the Archives of the Republic of Slovenia:**

guided tour of the Archives, including the visit to the depots, Dr. Gregor Jenuš (historian and archivist (Archives of the Republic of Slovenia))

explanation, how a researcher shall identify promising archival records for environmental history analyses & examples of archival records from the last centuries, relevant for the issues dealt with in the frame of excursions on the next days, Dr. Žiga Zwitter (University of Ljubljana, Faculty of Arts, Department of History)

13.20–14.50: lunch

**14.50–15.15: Practicing the Historical Critical Method**, Žiga Zwitter

**15.15–15.25: Presentation of the *European Society for Environmental History*, Žiga Zwitter**

15.25–15.30: break

**15.30–16.25: State of Historical Researches into 16<sup>th</sup>- and 17<sup>th</sup>-Century Environmental History and Historical Ecology of the Dinaric Karst of the Southern Slovenia, Žiga Zwitter**

16.25–16.35: break

**16.35–17.35: Recent Vegetation History of the Classical Karst or a Changing Landscape Identity, Dr. Mitja Kaligarič, Dr. Danijel Ivajnsič (University of Maribor, Faculty of Natural Sciences and Mathematics, Department of Biology)**

17.35–17.45: break

**17.45–18.45: History of Ignorance of Dinaric Karst: The Example of the Popovo Polje, Dr. Ivo Lučić (independent scholar)**

### **Wednesday, 15 July/Thursday, 16 July:**

**Every participant presents one of her/his works dealing with environmental history and/or with historical ecology and/or with palaeoecology and/or with economic history and/or with any of the disciplines dealing with present-day environment.** It can be a finalized work or a work in progress, it can also be a research plan. You can present your master's thesis (in progress/finalized), your PhD (in progress), your finalized seminar, graduation thesis or an individual research (in progress/finalized). If you do not have any such work, think of possibilities to write such a seminar in the summer semester. Every participant will have **10 minutes** for her/his presentation + a discussion will follow at the end of each session. Focus on methods, research questions and, if possible, on results. If the presentation is only a synthesis, not an analysis (many seminars & graduation theses), summarize also the methodology of work used in the literature you refer to. Due to the fact that participants come from various parts of Europe, do not forget to explain the basic context (e.g., historical, environmental conditions) of your study area at the beginning. Please prepare short Power-Point presentations.

#### **The aims of this day are:**

1. to stimulate networking between participants, which can be helpful for your future projects,
2. to provide interdisciplinary and international feedback by organizers of the school & by co-participants.

**Please send the titles and short abstracts (about 800 characters, including spaces) of your presentations to [ziga.zwitter@ff.uni-lj.si](mailto:ziga.zwitter@ff.uni-lj.si) by 1 July 2020.** Based on your inputs the order of presentations will be developed by the time of registration.

**8.00–8.55: Session 1: four presentations + discussion**

8.55–9.05: break

**9.05–10.00: Session 2: four presentations + discussion**

10.00–10.10: break

**10.10–11.05: Session 3: four presentations + discussion**

11.05–11.15: break

**11.15–12.10: Session 4: four presentations + discussion**

12.10–13.40: lunch

**13.40–14.35: Session 5: four presentations + discussion**

14.35–14.45: break

**14.45–15.40: Session 6: four presentations + discussion**

15.40–15.55: coffee break

**15.55–16.50: Session 7: four presentations + discussion**

16.50–17.00: break

**17.00–17.55: Session 8: four presentations + discussion**

17.55–18.05: break

**18.05–19.00: session 9: four presentations + discussion**

**Thursday, 16 July/Friday, 17 July: Dinaric Karst in the S Slovenia: the Lake Cerknica (Cerčniško jezero), one of the largest preserved intermittent lakes in Europe & the Rakov Škocjan basin**



Photo by Tajan Trobec.

8.30–9.30: travel Ljubljana–Dolenje Jezero

9.30–11.15: visit to the museum Jezerski hram:

- explanation how the hydrology of the polje functions (Vekoslav Kebe with his model explaining, how the lake fills and drains)
- the history of researches into the hydrology of this intermittent lake (Žiga Zwitter)

11.15–12.30: lunch





Photo by Žiga Zwitter.

12.30–17.00: visit to several interesting parts of the Lake Cerknica, selection based on the hydrological situation on the day of the excursion (Dr. Tajan Trobec, University of Ljubljana, Faculty of Arts, Department of Geography), transdisciplinary renaturalization of a part of the bed of the Stržen brook in the bottom of the lake (guide from the Notranjska Regional Park).

17.00–17.20: travel Lake Cerknica–Rakov Škocjan



Photo by Žiga Zwitter.

17.20–18.40: Rakov Škocjan: morphological history of the basin (based on morphological, speleological and laboratory analyses of loam sediments) (Tajan Trobec)

ca. 20.00: return to Ljubljana

## Friday, 17 July or Saturday, 18 July: Dinaric Karst in the SW Slovenia: The Classical Karst



Photo by Žiga Zwitter.

8.40–10.10 travel Ljubljana–Krajna vas

10.10–11.10: land-use changes on the Karst plateau at Krajna vas, including also prominent examples of influences of land-use changes on plant species (Žiga Zwitter)

11.10–11.30: travel Krajna vas–Kregolišče

11.30–12.00: preserved artificial waterhole at Kregolišče as cultural & natural heritage: hundreds of waterholes on the Karst plateau as artificially co-created ecosystems, their ecological functions, uses & traditional



Photo by Žiga Zwitter.

waterhole management (Žiga Zwitter)

12.00–12.45: travel Kregolišče–Lipica stud farm

12.45–13.00: wooded meadows at the Lipica stud farm (with a 4.5-centuries-long tradition)

13.00–13.10: travel

13.10–14.40: lunch

14.30–14.40: travel to the Škocjan Caves



Photo by Borut Lozej; © arhiv PŠJ.

15.00–17.30: guided tour through the Škocjan Caves (on UNESCO's list of natural world heritage sites; in Ramsar Directory of Wetlands of International Importance) (guide from the Škocjan caves regional park), basics of the history of cave researches (Žiga Zwitter)

17.30–18.45: travel to Ljubljana

## Saturday, 18 July/Sunday, 19 July: Dinaric Karst in the SE Slovenia



Photo by Žiga Zwitter.

9.00–10.15: Ljubljana–Dvor pri Žužemberku: tufa barriers in the Krka river as result of interactions between natural and human-induced processes (Žiga Zwitter)

10.15–11.30: Dvor pri Žužemberku–Krupa: karstic spring of the Krupa river: major chemical pollution with polychlorinated biphenyls in the 20<sup>th</sup> century as a consequence of interaction between karstic hydrology & industrial pollution of the broader surroundings (Žiga Zwitter)





Plut D. et al., 2014. Regionalni viri Slovenije: Vodni viri Bele krajine (Water resources of Bela krajina), 15.



Photo by Žiga Zwitter.

11.30–13.30: Krupa–Marindol: long-term impacts of litter extraction, lasting several centuries long, on soil characteristics, and, consequently, on species composition – and the question of recent vegetation changes in such light forests due to abandonment of litter-harvesting (Žiga Zwitter)

13.30–15.00: lunch

15.00–16.15: Marindol – surroundings of Bojanci: Impacts of landscape features on land use in Karst Areas of Bela krajina (Dr. Daniela Alexandra Teixeira da Costa Ribeiro, Anton Melik Geographical Institute, Research Centre of the Slovenian Academy of Sciences and Arts)

16.00–20.00: cultural landscapes of German villages in the karstic Gottschee/Kočevje region, abandoned during the World War II & return to Ljubljana (Žiga Zwitter)

20.00: return to Ljubljana, end of the school

## **CEEPUS students:**

### **Application:**

Due to the fact that it was possible to provide 9 more grants for participants using the CEEPUS network GeoRegNet than previously planned, the deadline for applications is extended by **24 January 2020**. Please register to the CEEPUS e-system: [www.ceepus.info](http://www.ceepus.info). Then login to [www.ceepus.info](http://www.ceepus.info) and create a mobility application within the CEEPUS network CIII-CZ-0111-14-1920. Guidelines, how to use CEEPUS e-system, are attached to this document.

### **Selection of candidates:**

Selection of candidates will be based on your **letters of motivation** (so, write convincing letters of motivation, including also your **average study grade**) & on **gender equality**. Candidates will be notified of the final selection by 5 February 2020.



**Accommodation:**

Slovenian **CEEPUS will book your accommodation**, so do not book your accommodation yourself!

**Costs:**

Your accommodation will be paid by CEEPUS

+ you will also receive a grant (150 EUR). Please plan to invest this grant into your field work and subsistence costs (buses during field work, entrance fees, meals). Depending on the costs of your meals, you might need a bit more than the grant, but definitely not much more!

You will be expected to organize your travel to Slovenia and back & to pay for it.

**The dates of the beginning & end of the school:**

programme will last from 13 July (morning > arrival of participants on 12 July) to 18 July (evening) **OR** from 14 July (morning > arrival of participants on 13 July) to 19 July (evening)). The first and the last date will be fixed as soon as we receive the response by the dorms, where you will be accommodated, which might take until February.

**ECTS points:**

Our activities to get the right of awarding **3 ECTS** points to participants of the school started. We expect a favourable answer. It might happen that ECTS points will be awarded either only to doctoral or only to master's students and not to students at both levels.