MEDIEVAL “CRISIS” POPULATIONS
ADULT OSTEOLGY WORKSHOP

TRANSYLVANIA, ROMANIA
June 2 - June 29, 2019

As the 15th century ends, the battle for Europe begins! The heroes (and their legend) that held back the Ottoman East have died: Vlad Dracula the Impaler in 1476; Saint Stephan the Great in 1504; Iskander Bey in 1468. The fall of Constantinople in 1453 and the European defeat at the Battle of Mohacs in 1526 opened the way for the Ottoman expansion into Europe. By 1529, Suleiman the Magnificent has conquered southeastern Europe, and the Ottoman troops were battering the walls of Vienna.

The aim of this project is to evaluate how major global political events physically impact local populations. For that purpose, we will analyze the human remains from our medieval Lost Churches cemeteries from central Transylvania, around the city of Odorheiu Secuiesc.

Our exceptional collection is housed at the “Haaz Rezso” Museum in Odorheiu Secuiesc, in the heart of Transylvania. This summer’s workshop is designed to conduct an exhaustive osteological survey as well as to select bones to be brought back for further analysis.

Participants will receive intensive daily lectures on theory and method in osteology before conducting direct research on the bones. The aim of the workshop is for the participants to acquire the necessary skills to conduct a full osteological research project, culminating in presentations at the 2019 Seventh International Student Osteology and Bioarchaeology Colloquium in Odorheiu Secuiesc.

Academic credits are available through the University of South Florida.

Duration: 4 weeks (mandatory)
Team size: 15-20 (introductory/intermediary level)
Costs: US$2495 for 4 weeks. It includes:
• museum registration, taxes, fees and most lab gear
• security clearance and access to the study collection
• housing in a hotel near the “Haaz Rezso” Museum
• breakfast and dinner, Monday to Friday
• lectures and labs

TO APPLY: www.archaeotek-archaeology.org
CONTACT US: archaeology@archaeotek.org
ADULT OSTEOLGY RESEARCH LABORATORY WORKSHOP

Medieval Crisis Populations

June 2 – June 29, 2019
Odorheiu Secuiesc, Transylvania, Romania

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Expert Archaeologist
Haaz Reszo Muzeum (RO)

Project Web Site: https://www.archaeotek-archaeology.org/adult-osteology-laboratory

Project Application Form: https://www.archaeotek-archaeology.org/application-bioarchaeology

Academic Credits (3-6 credits) available through University of South Florida - Not Mandatory
(additional USF credit tuition applies) - USF Program Brochure – Credit Application Page:

Workshop description:

The aim of this project is to evaluate how major political events physically impact local Transylvanian populations. For that purpose, we have been studying human remains excavated from numerous cemeteries in eastern Transylvania. During the summer of 2019, we will concentrate our efforts on analyzing skeletons excavated from the collapsed medieval „Lost Church” located in the community of Patakfalva.

The osteology workshop will train students to conduct osteological analyses and frame bioarchaeological research questions. The collection that we will study is housed at the “Haaz Rezso” Museum in Odorheiu Secuiesc (known as Székelyudvarhely in Hungarian), Harghita County, in the heart of Transylvania. Students will receive daily lectures on topics related to human skeletal biology and spend the first two weeks intensively reviewing human osteology. Other lecture topics will include a discussion of sex and age estimation, osteometrics, and an introduction to skeletal and dental pathologies. In addition, some lecture topics will discuss related applied areas of human osteology and various specialties within the discipline such as skeletal trauma analysis and stable isotope analysis.
Upon completion of this workshop:

1. Students will have in-depth knowledge of all bones in the human body, including landmarks, muscles attachments and articulations.
2. Students will understand fundamental concepts related to the human dentition.
3. Students will understand how to obtain basic demographic data from archaeological skeletal populations.
4. Students will understand how systematic data collection and peer review facilitates bioarchaeological research.

Our participants are taught to conduct proper research under field conditions. This process entails the intensive acquisition of the skills and knowledge required to fulfill the expectations of a genuine research project. As students become more familiar with the questions that the osteological collection allows to address, they will choose a research topic they will address in small groups, leading to formal podium presentations at the Seventh International Student Colloquium on Osteology and Bioarchaeology, in Odorheiu Secuiesc.

The Adult Osteology Research Laboratory Workshop or equivalent is required for both our Juvenile Osteology Research Laboratory Workshop, and Commingled Remains Ossuary Excavation and Laboratory Workshop.

Historical Background:

As the 15th century ends, the southeastern European frontier collapses in front of the Ottoman Turks. The heroes (and their legend) that held back the Eastern invaders have died: Vlad Dracula the Impaler, prince of Wallachia in 1476; Holy Stephan the Great, prince of Moldavia in 1504; Skanderberg (Iskender Bey), lord of Albania in 1468. The fall of Constantinople in 1453 and the united European defeat at the great Battle of Mohacs in 1526 opened the way for the Ottoman expansion into Europe. By 1529, Suleiman the Magnificent has conquered southeastern Europe, the Kingdom of Hungary collapsed and the Ottoman troops were battering the walls of Vienna. The Ottoman expansions was finally checked in 1683, when the arrival of King Jan III Sobieski of Poland’s heavy cavalry charge under the walls of besieged Vienna broke the Ottoman army and won a crucial victory.

The Saxon fortresses and the Szekely armies held the Ottomans armies at bay successfully. With the collapse of the Kingdom of Hungary in 1526, its Transylvanian territories became a political battlefield between European and the Ottoman backed princes until the Principality of Transylvania was born as an autonomous political entity in 1570. In 1600, Michael the Brave, with the support of the Transylvanian Szekely armies, beat the Ottoman and their supporters and realized the first union of the three Romania principalities into one kingdom.

The lost church of Patakfalva (RO: Valeni), our current excavation site, is the sister church of the one explored in Telekfalva (RO: Teleac), which was filled with juvenile remains. Our excavation has demonstrated that it is significantly older, built around the 10-11th c. AD, on top of a migration period tumulus. Our ongoing excavation has yielded the well preserved skeletal remains of over 500 individuals, ranging from pre-natal to advanced elderly. It also served the Telefkála community until they built their own church around 16-17th c.
Nature of Instructional Activities:

Course material will be presented in lectures, discussions and hands-on exercises in the laboratory located in Odorheiu Secuiesc. The workshop will run from approximatley 8:30AM – 4:30PM Monday to Friday. Typically, mornings will be reserved for lecture and hands-on instruction while afternoons will be dedicated to study time and skeletal analysis. A lunch break will be scheduled each day, along with breaks in the morning and afternoon.

Objectives:

**Paleodemography**

1. To create a comparative base line for late medieval populations in order to evaluate changes through time and adaptive responses to socio-political and economic historical events.

2. To establish the skeletal biology of individuals and populations from medieval Transylvania:

   - **Estimation of:**
     - Sex
     - Age
     - Stature
     - Ancestry

   - **Identification of discrete and idiosyncratic traits:**
     - Dental nonmetric variation
     - Cranial nonmetric variation
     - Postcranial nonmetric variation

3. To establish the skeletal health of individuals and populations from medieval Transylvania:

   - **Paleopathology:**
     - Congenital disease
     - Dental disease
     - Joint disease
     - Infectious disease
     - Metabolic and endocrine disease
     - Neoplastic disease
     - Trauma

   - **Paleonutrition:**
     - Isotopic reconstruction of diet
     - Malnutrition related disease
     - Nutritional deficiency related bone alterations
**Taphonomy**

4. Identification of post-mortem alterations on bones  
   a. Identification of funeral practices: post-mortem treatment of bodies  
   b. Identification of animal and/or vegetal alterations

5. Evaluation of conservation state and bone quality for analysis

**Required Text:** *Human Osteology, 3rd Edition* (2011) – Tim White, Michael Black, and Pieter Folkens

- Electronic or hard copies are acceptable.

**Required Readings:**

Readings will be available electronically. All required readings should be completed before class lecture sessions or discussions. In addition, an electronic library of references will be available for those wishing to expand their personal library.

**Student Evaluation:**

- **Bone Quizzes (30%)**: 6 bone quizzes will be administered during the first two weeks of the workshop and will include whole bones and/or fragments. Students will be responsible for learning anatomical features as well as correct siding techniques.
- **Annotated Bibliography (10%)**: Students will compile an annotated bibliography of 10 sources on a topic related to human osteology or bioarchaeology.
- **Laboratory Projects (20%)**: Three projects will be assigned that give students practice in taking osteometrics, estimating age and sex, and describing skeletal pathology.
- **Research Project (30%)**: During the last half of the workshop, students will work in groups to complete a research project developed in consultation with the Project Director and Project Assistant. Each group will present their findings on the last day of the workshop.
- **Participation (10%)**: Participation is calculated from overall performance in both laboratory and lecture contexts. Students are encouraged to actively contribute to lecture discussions and to demonstrate that they keeping up with the course material.

**Workshop Conduct:**

Human remains represent a non-renewable resource and will be treated with respect and dignity at all times. Students will not bring food and/or drinks into the laboratory space. In addition, workshop participants will not utilize photographs of human remains for social media purposes without consent of the project director. In addition, workshop participants are to engage with each other in a professional and courteous manner at all times. Likewise, the field school environment should be considered a safe space for people of different backgrounds and belief systems.
Additional Weekend FieldTrips:

Public transportation within Eastern Europe does not allow usually to optimize travel and sightseeing for visitors with limited time available. Furthermore, except for the main tourist attractions, getting to various sites can be very challenging due to the complete lack of public trasportation to and from those sites. As a result, we are organizing transportation for several day/weekend trips to allow our participants to contextualize their work within the historical and cultural framwork of Transylvania:

- Szekely Land Day Trip (mandatory - free): visit of the Lost Churches sites, including our active site of Patakfalva (Valeni), the Jesus Chapel (the oldest medieval monument around Odorheiu Secuiesc), and the ethnographic museum in Cristuru Secuiesc.
- Medieval Saxon Heritage Day Trip (optional – additional $100): visit of some beautiful Saxon fortified churches (Cata, Homorod, Visci) and the Rupea Fortress.
- Brasov Weekend Trip (optional – additional $60): visit of Brasov. From there, students can, if interested, arrange to explore Bram Stocker’s Bran Castle, Rasnov Fortress, and the amazing Peles Castle, the summer residence of the Romanian kings.

Bibliography


Workshop Tentative Schedule

Week 1

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<th>Date</th>
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<th>Readings</th>
<th>Assignment and/or Assessment</th>
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<td>Welcome and Orientation</td>
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<td>Pre-Test</td>
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<td>Introduction to Skeletal Biology</td>
<td>White et al. (2012): Chapters 1–3</td>
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<td>Pelvic Girdle</td>
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<td>Skull</td>
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<td>White et al. (2012): Chapter 12-13</td>
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<td>Archaeology of Historic Transylvania</td>
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<td>Day 6</td>
<td>Szekler Land Day Trip (mandatory)</td>
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<td>Day 7</td>
<td>Medieval Fortified Saxon Churches Day Trip (optional)</td>
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<td>Day 6-7</td>
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<td>Bethard (2013)</td>
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<td>Ambrose et al. (2003)</td>
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<td>DeWitte and Stojanowski (2015)</td>
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<td>Skeletal Trauma Analysis</td>
<td>Osterholtz (2012)</td>
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<td>Kroman and Symes (2013)</td>
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<td>Day 4</td>
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<td>Applications of Hard Tissue Histology</td>
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**Project Podium Presentations at the 2019 Seventh International Student Colloquium on Osteology and Bioarchaeology**