



10th Meeting of the ICAZ Bird Working Group

5-6 June 2021

Conference Program and Abstract Book

UNIVERSITY OF BERGEN
University Museum of Bergen



Velkommen!

It is our great pleasure to welcome you to the 10th Meeting of the International Council for Archaeozoology Bird Working Group, hosted virtually for the first time in its history. It has been an unprecedented year of change and challenge for all of us, and we are delighted to have this opportunity to come together to support one another as scholars and friends.

We are pleased to present a two-day program of 32 oral presentations and 11 poster presentations representing the breadth of research into the special relation between birds and humans. More than 120 of you have registered for this meeting, including many students who are experiencing the science and collegiality of our meeting for the first time.

A virtual conference can be a learning curve for everyone - we understand if there are unforeseen technical difficulties, glitches, or guest appearances from family, pets, or other members of your household on screen.

Nevertheless, we hope you enjoy this meeting, and we look forward to an exciting and informative event!

- The Organizing Committee

Hanneke J.M. Meijer
Samuel J. Walker
Liselotte Takken-Beijersbergen
Ramona Harrison

This meeting was made possible through financial support from the Bergen University Fund.

Getting around the virtual conference

Please note that the program is set in Central European Summer Time (CEST). A [time zone calculator](#) can help you find the correct time for your location to sign on to conference presentations and events.

This year's conference can be accessed in two ways. One way to participate is through a **ZOOM** account. All talks can be followed via the Zoom links below. Those of you with existing accounts or educational licenses through your home institutions can log on through those accounts. Those of you without can sign up for a free account [here](#). Use your full name so that meeting hosts can identify you as registered conference attendees and admit you to and from waiting rooms. Please ensure your version of the Zoom software is the latest available.

Zoom link for Saturday June 5th

<https://uib.zoom.us/j/66378465286?pwd=WjBPbkptanJ4TGF2QjdqYVhWVlhKZz09>

Zoom link for Sunday June 6th

<https://uib.zoom.us/j/63730604819?pwd=ZDYxbFZvU0U1UThmWkU0a0FINDRuZz09>

If you haven't participated in a Zoom meeting before, some basic best practices for meeting participants include:

- Please join meetings 5-10 minutes early to give hosts time to admit you from waiting rooms.
- Keep yourself on mute, and un-mute yourself only when you are speaking.
- Enable video during discussions to help give a 'face to face' interaction, though you may wish to turn your video off if you need to step away from your computer.
- Familiarize yourself with Zoom features such as the Chat, Polling, Thumbs Up, Raise Hand, and Lower Hand options.

Another way to participate in the conference is by using **GATHER**. Gather is a video chat platform that has avatars move around a map and mimics the social atmosphere of a physical conference. As you get close to other avatars, your videos will pop up and you will be able to chat. [Here](#) is a demo video. All talks can be accessed from within the Presentation room in Gather using the Zoom links on the site. The posters can be viewed for the whole duration of the conference, but only within the Gather poster space. Gather works best within Chrome but is currently not supported within Safari (sorry Mac users).

Link to the conference's customized Gather space:

<https://gather.town/app/BaBZa9dQmSRYQ0Fy/BWG2021>

The password to enter the space is "P.impennis".

The Gather space opens Friday the 4th of June (the day before the meeting) so please feel free to explore and familiarize yourself with it. Some pointers for using Gather:

- Use your full name so that other conference-goers can identify you and choose your favorite avatar.
- Move around the space using the arrow keys on your keyboard.

- By moving your avatar around you can have spontaneous conversations with those around you. These can be either one-on-one or small groups depending on how many people are around your avatar.
- When your avatar moves closer to an interactable object, it will glow yellow and there will be a notification that shows up saying 'Press x to interact with -object-'. This can range from integrated Zoom meetings to playable arcade games.

Troubleshooting

If you are in need of technical support for conference functions, the organizing committee is available from 9:00 am to 5:00 pm Central European Time. Some trouble-shooting advice:

- If you experience sudden interruptions or termination of a Zoom meeting, simply login again using the same link.
- Contact one of the meeting Co-hosts listed in the conference program using the Chat function on Zoom.
- If you are lost or stuck within the Gather space, click 'X' to respawn.
- To access technical support with Gather functions, contact support@gather.town.
- For other questions or concerns, you can contact bwgmeeting2021@gmail.com at any time during the conference.

For presenters

Oral presentations - Please refer to the program schedule below to find your time slot. To give as many people as possible the opportunity to present their research, and to prevent "Zoom fatigue", we have limited the time slots for oral talks to 15 minutes. This includes 12 minutes for the presentation and 3 minutes for questions. Please plan your presentation accordingly and make sure you have your files ready to go before your session begins.

Poster presentations - Poster sessions are scheduled for the coffee breaks both days, but posters will be viewable throughout the conference days in the Gather poster session room. You will need to submit a .jpg or .png file of your poster (maximum size: 3MB, minimum width: 1000px, minimum height: 600px) **before Friday June 4th** to bwgmeeting2021@gmail.com, and it will then be set up in Gather for you. During the poster sessions, you can stand in the shaded square in front of your poster. This shaded square is known as a "private space" and your audio/video will be shared with everyone else in this square, but not neighbouring spaces.

Privacy, intellectual property and online safety

Please be aware that online meeting software such as Zoom uses participants' cameras and therefore may disclose personal information about the user's home environment. Please be conscious of this and take measures such as disabling your video and microphone functions prior to entering the meeting.

Since the intellectual property of conference participants is shared in this space, the conference Gather space and Zoom links are for registered attendees only. Please do not

share login and passwords with people who are not registered attendees. This protects conference meeting hosts and participants from unwanted intrusions or disruptions.

Please treat online interactions with the same courtesy you would an in-person interaction. It is expected that meeting attendees behave in a courteous, collegial, and respectful fashion to each other. Attendees should respect common sense rules for professional and personal interactions, public behaviour (including behaviour in public electronic communications), common courtesy, and respect for intellectual property of presenters. Demeaning, abusive, discriminatory, harassing or threatening behaviour towards other attendees or towards meeting participants will not be tolerated, either in personal or electronic interactions.

If you are the subject of unacceptable behaviour or have witnessed any such behaviour, you can report it (anonymously if you choose to) via the [online reporting form](#).

About the Osteological Collections at the University Museum of Bergen



The University Museum in Bergen. The museum was reopened in 2019 after substantial renovations to the building and the exhibits.

The Bergen University Museum is one of the oldest museums in Norway. It was founded in 1825 as Bergens Museum by Wilhelm Frimann Koren Christie, a county court judge and a former President of the Norwegian Parliament. The museum became the foundation of academic research and education in Bergen. As a result of the increasing activity, the University of Bergen was established in 1946. Today, the University Museum of Bergen forms an integral part of the University of Bergen with a focus on research, collection, and public outreach. It consists of the Department of Natural History and the Department of Cultural History.



An impression of our mammal lab.

The Osteological Collections are part of the Department of Natural History and include both modern and archaeological skeletal material from Norway and abroad. Our archaeological skeleton collections preserve bone material from archaeological and geological excavations across Norway, ranging in age from the Late Pleistocene to recent times. With material from ca 1700 localities, it is the largest archaeological bone collection in Norway, and one of the largest in Europe. The collections form the basis for our research on Northern European faunal history, paleozoology, paleobotany, archaeology and Quaternary geology. Our database for the archaeological skeleton collection can be searched [here](#).

Our modern skeleton collection is one of the largest in Scandinavia. It contains over 15.000 skeletal specimens including fish (ca 2000 specimens), birds (ca 4000 specimens) and mammals (over 9000 specimens), and we have an in-house skeleton preparation lab. With a focus on Northern European taxa, our collections are particularly strong in Northern European birds, North Atlantic deep-sea fishes and marine mammals, reindeer, and horses. These collections are not only a fundamental part of the museum's efforts in documenting Scandinavian biodiversity, but also form an excellent comparative collection for zooarchaeological research. Our Zooarchaeology lab rooms contains comparative material of most Scandinavian mammals, birds, and fishes. The modern skeleton database can be searched [here](#).



Details of our bird synoptic and comparative collection.

Conference program

SATURDAY JUNE 5			
10:00-10:10	Welcome		
10:10-10:45	Keynote	The Great Auk in Norway: from success to decline	Anne Karin Hufthammer
10:45-11:00	Birds in Pre-agriculture societies	The exploitation of avian fauna by Anatomically Modern Humans at Klasies River Mouth Cave 1B during the Middle Stone Age	Rialivhuwa Ratshinanga, Shaw Badenhorst, and Sarah Wurz
11:00-11:15		Taphonomic story of the bird remains from the Middle Palaeolithic of Grotte Vaufrey (layer VIII)	Anna Rufà and Véronique Laroulandie
11:15-11:45	Coffeebreak & Poster session		
11:45-12:00	Birds in Pre-agriculture societies	A handful of duck radiuses - Peculiarities of the avifaunal exploitation at the Gravettian site of Maisières 'Canal' (Belgium)	Quentin Gofette, Christian Lepers, and Veerle Rots
12:00-12:15		An elusive ghost: searching for the Eagle Owl (<i>Bubo bubo</i>) in the past of Britain	Umberto Albarella, Tom Higham, and Alistair McLean
12:15-12:30		Breeding Anatidae and bird habitat preference: Reconstructing the environment of the Qa' Shubayqa in northeast Jordan in the Late Pleistocene	Lisa Yeomans and Beatrice Demarchi
12:30-12:45		Chukar Partridge Remains as Expressions of Identity in the Prehistoric Southern Levant	Ben Greet
12:45-13:00		Winging Away Time: changing uses of birds in the Scottish islands	Julia Best
13:00-14:00	Lunch		
14:00-14:15	Symbolism	Birds for Isis: the evidence from Pompeii	Chiara A. Corbino and Beatrice Demarchi
14:15-14:30		Overrepresentation of Seabird Wings from Viking Age Domestic Sites in North Iceland	Grace Cesario and John Steinberg
14:30-14:45		Identification of avian claws: toward an in-depth archaeological interpretation of human habits, rituals and beliefs	Zbigniew M. Bochenski, Teresa Tomek, and Krzysztof Wertz
14:45-15:00		Chalcolithic 'Sky Burial': Excarnation via Vulture in the Mortuary Rituals of the Southern Levant	Ben Greet
15:00-15:30	Coffeebreak & Poster session		
15:30-15:45	Birds in the New World	Seabirds as seafood: bird remains in sambaquis of southern Brazil	Augusto Mendes, Klaus Hilbert, and Taissa Rodrigues
15:45-16:00		Birds among the Moche of Northern Peru: Examining Spatial Distributions of Avian Taxa from Huaca Colorada (600-900 CE)	Aleksa Alaica
16:00-16:15		Exploitation of sea birds at late Holocene in southern Brazil: a case of study at Galheta IV archaeological site	Jessica Cardoso
16:15-16:30		Small Bird Capture in Northwest Greenland	Erika Ebel, Christyann Darwent, John Darwent, and Genevieve LeMoine

SUNDAY JUNE 6

10:00-10:30	Keynote	Range shifts and body size changes in response to environmental change. Evidence from archaeological and modern birds in Norway and Scandinavia	Samuel Walker and Hanneke Meijer
10:30-10:45	Medieval	Birds for the dinner table, birds for the hunt: recent evidence for the role of birds during the medieval period at Lincoln Cathedral, England	Hannah Russ, Mark Allen, and Lilianna Serrano
10:45-11:00		Bird remains from ecclesiastic sites in the Carpathian Basin	Erika Gál
11:00-11:15		The peacock (<i>Pavo cristatus</i> Linnaeus, 1758) in Medieval Catalonia (North-eastern Iberia). New data from Archaeology, Iconography and cookery books	Marina Fernández, Maria Nadal, Lluís Lloveras, and Jordi Nadal
11:15-11:30		Bird remains from Vilnius Lower Castle, Lithuania (13th-19th centuries)	Freydis Ehrlich, Povilas Blaževičius, Giedrė Piličiauskienė, and Eve Rannamäe
11:30-12:00	Coffeebreak & Poster session		
12:00-12:15	Domesticated fowl	The introduction of turkeys in early modern Sweden - how and why?	Emma Maltin and Håkan Jakobsson
12:15-12:30		Chickens in Argentina: Zooarchaeological and biomolecular results from selected postcolonial sites	Ophelie Lebrasseur, Gustavo Neme, Adolfo Gil, Matilde Lanza, Pablo Fernandez, and Ludovic Orlando
12:30-12:45		Monastic meals: The role of birds in the diet of the Poor Clares at the Monastery of Santa Maria de Pedralbes (Barcelona, Spain) from Medieval to Modern periods (14th-18th c. AD)	Lluís Lloveras, Josep Cruells, Anna Castellano-Tresserra, Santiago Riera, and Jordi Nadal
12:45-13:00		Estimating the age of domestic fowl (<i>Gallus gallus domesticus</i> L. 1758) cockerels through spur development	Sean Doherty and Alison Foster
13:00-14:00	Lunch		
14:00-14:15	Approaches & Methods	Sexing <i>Anas</i> : Traditional morphometric criteria for assigning sex to osteological duck remains	Ged Poland
14:15-14:30		Modeling avian eggshell microstructure to predict ontogenetic age and reveal patterns of human-avifauna interaction	Kristina Douglass, Priyangi Bulathsinhala, Teresa Feo, Tim Tighe, Scott Whittaker, and Helen James
14:30-14:45		Tracing the materiality of feathers in prehistoric Northeastern Europe	Tuija Kirkinen and Kristiina Mannermaa
14:45-15:00		An experimental taphonomic study of root etching on bird bone	Frank Dirrigl Jr.
15:00-15:30	Coffeebreak & Poster session		
15:30-15:45	Historical ecology	The Historical Ecology of Short-Tailed Albatross in British Columbia, Canada: Insights from Ancient DNA and Stable Isotope Analysis	Thomas Royle, Eric Guiry, Hua Zhang, Lauren Clarke, Shalegh Missal, and Dongya Yang
15:45-16:00		Factors that could have influenced the change in body size of some birds from the Yucatán Peninsula since Late Pleistocene	Ana Frida Silva-Martínez, José Jaime Zúñiga-Vega, Joaquín Arroyo-Cabrales, and Luis Antonio Sánchez-González
16:00-16:15		A feathered river across the sky? Preliminary considerations of passenger pigeon abundance and distribution in the late Holocene zooarchaeological record of southern Ontario, Canada	Trevor Orchard, Suzanne Needs-Howarth, Alicia Hawkins, Louis Lesage, Eric Guiry, and Thomas Royle
16:15-17:15		BWG Business Meeting	

Bird bone artefact from the Late Eneolithic / Early Bronze Age site of Zók (Hungary)

Selena Vitezović, Institute of Archaeology, Belgrade, Serbia, s.vitezovic@ai.ac.rs

Jelena Bulatović, Laboratory for Bioarchaeology, Faculty of Philosophy, University of Belgrade, Belgrade, Serbia, jelena.bulatovic@f.bg.ac.rs

Jovan Mitrović, National Museum, Belgrade, Serbia, j.mitrovic@narodnimuzej.rs

Bird bones were rarely used for production of artefacts, due to various reasons - they were much smaller and thinner than mammal bones; they also have specific shapes and fine structure, inadequate for majority of common artefact types. However, they were occasionally used for some specific objects, such as flutes, pipes, needle cases, amulets, etc. When it concerns Eneolithic and Early Bronze Age periods in the south-eastern Europe, bird bone artefacts are rare; only few were discovered thus far. The multi-layer prehistoric site of Zók is situated in present-day Hungary, in vicinity of Pécs. Major parts of its stratigraphic sequence belong to the Late Eneolithic / Early Bronze Age Vučedol culture, but there are also certain remains that may be attributed to the Early and Middle Eneolithic. The site was extensively excavated in 1920 by National museum in Belgrade. These excavations also unearthed large quantities of worked bone, mainly from Late Vučedol layers, including one artefact produced from bird bone that will be presented here. The item in question was produced from right radius from swan (*Cygnus* sp.). The object in question is in the shape of an elongated tube; carefully cut at both ends. The function of this item is uncertain - it may have served as some sound-producing instrument (flute), or it was some sort of handle or needle case. It is interesting to note that bird representations, in particular ornitomorphic vessels, are one of the specific traits of the Vučedol culture; therefore, the choice of bird bone for production of this artefact may have had a certain symbolic significance as well."

List of participants

Alaica	Aleksa	aleksa.k.alaica@gmail.com
Albarella	Umberto	u.albarella@sheffield.ac.uk
Amos	Linda	archaeoamos@gmail.com
Aniceti	Veronica	veronica.aniceti@gmail.com
Antonites	Annie	annie.antonites@gmail.com
Askeyev	Arthur	art.regulus@mail.ru
Askeyev	Igor	archaeozoologist@yandex.ru
Askeyev	Oleg	parus.cyanus@rambler.ru
Badenhorst	Shaw	shaw.badenhorst@wits.ac.za
Baker	Polydora	polydora.baker@historicengland.org.uk
Best	Julia	bestj3@cardiff.ac.uk
Bochenski	Zbigniew M.	bochenski@isez.pan.krakow.pl
Bond	Alex	a.bond@nhm.ac.uk
Borg	John J.	john.j.borg@gov.mt
Bratbak	Olaug Flatnes	olaug.bratbak@uib.no
Burke	Chrissina	chrissina.burke@nau.edu
Carden	Ruth	ruthfcarden@gmail.com
Cardoso	Jessica	jessicamcardoso@usp.br
Caverly	Juliette	j.l.t.caverly@pgr.reading.ac.uk
Cesario	Grace	grace.cesario@gmail.com
Chavez	Angela	cavepaleo@yahoo.com
Clark	Lauren	ltclark@sfu.ca
Cooke	Siobhan	Siobhan.Cooke@uhi.ac.uk
Corbino	Chiara	chiara.corbino@gmail.com
Corona-M	Eduardo	ecorama09@gmail.com
Dack	William	willdack@yahoo.com
Demarchi	Beatrice	beatrice.demarchi@unito.it
Dirrigl Jr	Frank	frank.dirrigl@utrgv.edu
Doherty	Sean	s.doherty@exeter.ac.uk
Douglass	Kristina	kdouglass@psu.edu
Ebel	Erika	ejebel@ucdavis.edu
Ehrlich	Freydis	freydis.ehrlich@ut.ee
Everett	Sarah	severett17@yahoo.co.uk
Fernández Liarte	Marina	marinafernandez@ub.edu
Fiorillo	Angelica	angelica.fiorillo@uniroma2.it
Forsyth-Magee	Hayley	hayleyforsyth@hotmail.com
Gabriel	Catarina	catarinagabriel.c@hotmail.com
Gál	Erika	gal.erika@btk.mta.hu
Galloo	Matthias	matthias_galloo@hotmail.com
Gee	Suzanne	suzannekgee@hotmail.com
Giardina	Miguel	mgiardina@mendoza-conicet.gob.ar
Gilbert	Otis	O.gilbert@wessexarch.co.uk
Gill	Lucy	lucy_gill@berkeley.edu
Goffette	Quentin	qgoffette@naturalsciences.be
Grau Sologestoa	Idoia	idoia.grau@unibas.ch
Greet	Ben	ben.greet@uzh.ch

Gruwier	Ben	ben.gruwier@hotmail.com
Guiry	Eric	eguiry@lakeheadu.ca
Guiserix	Danaé	danae.guiserix@gmail.com
Hamilton-Dyer	Sheila	shd@shdbones.plus.com
Harland	Jen	jen.harland@uhi.ac.uk
Harley	Vicki	vicki.harley@care4free.net
Harrison	Ramona	Ramona.Harrison@uib.no
Heikkila	Raija	raija.heikkila@student.uni-tuebingen.de
Holmes	Matilda	matty@archaeozoology.co.uk
Houde	Peter	phoude@nmsu.edu
Hufthammer	Anne Karin	Anne.Hufthammer@uib.no
Huguet	Rosa	rhuguet@iphes.cat
Kirkinen	Tuija	tuija.kirkinen@helsinki.fi
Koski	Laura	ljoreenl@gmail.com
Laroulandie	Véronique	veronique.laroulandie@u-bordeaux.fr
Lebrasseur	Ophélie	ophelie.lebrasseur@univ-tlse3.fr
Lesage	Louis	louis.lesage@wendake.ca
Lloveras	Lluís	lluislloveras@ub.edu
Louette	Michel	michel.louette@telenet.be
Makarouna	Nasia	nasia28292@hotmail.com
Maltin	Emma	emma.maltin@ark.su.se
Mannermaa	Kristiina	kristiina.mannermaa@helsinki.fi
Marqueta	Mario	mariomarqueta@hotmail.com
Maurizio	Maria	mirire@hotmail.it
McCoy	Laura	laura.mccoy@mnh.im
Meijer	Hanneke	Hanneke.Meijer@uib.no
Mendes	Augusto	augustobarrosmdes@yahoo.com.br
Metz	Madeleine	mmmetz10@gmail.com
Meyer	Christian	Chr.Meyer@email.de
Mitrović	Jovan	j.mitrovic@narodnimuzej.rs
Mostadius	Maria	maria.mostadius@biol.lu.se
Nabais	Mariana	mariananabais@gmail.com
Nadal	Maria	maria.betelgeuse@gmail.com
Nadal	Jordi	jordinadal@ub.edu
Needs-Howarth	Suzanne	suzanne.needs@gmail.com
Nic Cnaimhin	Roisin	115301701@umail.ucc.ie
Orchard	Trevor	trevor.orchard@utoronto.ca
Oueslati	Tarek	tarek.oueslati@gmail.com
Poland	Ged	gedpoland@googlemail.com
Poole	Kristopher	kris.poole@hotmail.co.uk
Rabinow	Sophie	sar95@cam.ac.uk
Rannamäe	Eve	everannamae@gmail.com
Ratshinanga	Rialivhuwa	riadonald6@gmail.com
Reidarsdatter	Flo A.	bobaflo@gmail.com
Ribeiro	Murilo	murilodamianr@gmail.com
Ritchie	Kenneth	kcritchie@hotmail.com
Rodrigo	Kalangi	kalangi.16190@uhss.ruh.ac.lk
Rodrigues	Taissa	taissa.rodrigues@ufes.br

Royle	Thomas	troyle@sfu.ca
Rufà	Anna	arufabonache@gmail.com
Russ	Hannah	px@archaeology.biz
Seigle	Michaël	michaelseigle@orange.fr
Shaymuratova	Dilyara	galimovad@gmail.com
Shev	Gene	e.t.shev@arch.leidenuniv.nl
Silva-Martínez	Ana Frida	ana_frida46@hotmail.com
Smiarowski	Konrad	konrad.smiarowski@gmail.com
Smirnov	Pavel	dryocopus@rambler.ru
Smith	Stefanie	ssmith@newsouthassoc.com
Takken-Beijersbergen	Liselotte	liselotte.takken@uib.no
Tsoulos	Diana	diana.tsoulos@mq.edu.au
Urquiza	Silvana	silvanaurquiza@csnat.unt.edu.ar
Valenti	Pietro	pietrovalenti7@gmail.com
Van de Vyver	Caroline	caroline.van-de-vyver@laposte.net
van Litsenburg	Zoë	zoevlitsenburg@gmail.com
Velardez Fresia	María Belén	belenvfresia@gmail.com
Vitezović	Selena	s.vitezovic@ai.ac.rs
Walker	Samuel	Samuel.walker@uib.no
Waterworth	Jessica	jessica_waterworth@hotmail.com
Wertz	Krzysztof	wertz@isez.pan.krakow.pl
White	Justin	justin.white@utrgv.edu
Woog	Friederike	friederike.woog@smns-bw.de
Worley	Fay	fay.worley@historicengland.org.uk
Yeomans	Lisa	zhr605@hum.ku.dk
Yrarrazaval	Sebastian	sebastian.yrarrazaval@ug.uchile.cl
Zeiler	Jørn	abone@planet.nl