EXARC Extracts 2025/1

Hello and welcome to this episode of EXARC Extracts with me, Dr. Matilda Siebrecht, as we have a look through the latest articles from the first edition of the EXARC Journal of 2025. Now, you're probably wondering, wait, what do you mean, first edition of 2025? We're already a quarter of the way through. Well, we had to delay a little bit the first edition because our amazing team of volunteers was working tirelessly behind the scenes to set up our brand new journal website. And I just wanna say before I start, a huge 'well done' to the journal team, especially to Magdalena Zelensky, who is the sort of head digital expert, I guess, of the team. She was the one who has created this fantastic journal website, which you can now visit at exarc.net. It is a website completely dedicated to the EXARC Journal. So do make sure to head over there. Congratulations, Magdalena, it looks amazing. So let's dive right into it. Now, you might remember, I've started to do things slightly differently, so you're getting a live reaction from me, as I look through this edition of the EXARC journal. This edition was published on March 25th, and it has 17 articles, so it's a big one this time.

Let's start straight away with the first one, which is, **As Dear as Salt - Indications for an Ancient Plant Ash Tradition Preserved in Old World Folktale** authored by Lutz Zwiebel. First of all, I can say that the illustrations of this one are absolutely gorgeous. Mainly the article is focusing on the question of whether folk tale heroines tell of a prehistoric plant ash use. So looking for evidence of plant ash use within folklore itself, because the culinary use of plant ash is an ancient technology, but it's not really used anymore today. And actually if we look at European cultural history or Eurasian cultural history, we don't really find any evidence for it. But in folklore you find a very, very rich history of the use of plant ash for culinary use. The article goes through and it looks at specific kinds of plants, specific kinds of plant ash as well, talks about its use in terms of kind of chemical and scientific uses, and also discusses indigenous understanding, which is very interesting. So it goes into a lot of background of the use of plant ash, what kinds of plants are used and what they're used for. The actual method used within the paper is to look through 44 tales, folk tales from Europe and Asia in order to identify sort of typical aspects of the theme of ash, but also salt, because salt is also very important… part of medicine, but also a very important part in terms of culinary development of Eurasian culture. And it has all of these different aspects such as sort of cleaning, curing, it expels evil. It serves as a ritual gift in some places. And it is also very heavily referred to within folklore. So we're looking at ash and salt within folklore. 44 tales are analyzed. The article goes into detail of which tales these are, and the results show that there is some pattern in terms of how ash and salt is mentioned, so they go into the different themes. For example, with salt, there are three dominant themes that are identified. One is about sowing salt instead of grain. One is about the origin of salt, and in a third group you can even distinguish between different salt types. They also talk about motifs that are associated with different heroines within Eurasian folklore. They go into quite a lot of detail with that. They give examples from different folkloric tales. Really nice and detailed discussion here of the actual interpretation of these folk tales and what they could mean. So really interesting as well. It's from a real wide range. You have folk tales from Persia. You have folk tales from Hungary, you have folk tales from all kinds of places here. I'm just flicking through quickly to see what kinds of places, founder of the state of Babylon… Feng

Huang, in Chinese folklore. So you have a real range of different texts being used and being looked at here. The paper then goes on to look at the biological and the social equivalents.

So for example, looking at wild chimpanzees, looking at those sort of early pre-Neolithic linguistic routes as well, and trying to determine how these things developed. And also looking at other concepts that develop in folklore that are related to ash. For example, the concept of Cinder Boy, which goes into detail about the historic background of that. Also the violation of the Enchanted Garden. That is quite a common theme. It's a very specific theme that is talked about in Russia, the Caucasus and Persia specifically, but not restricted to these regions. It's a really, really detailed paper. It goes into a lot of interesting backgrounds from a wide range of different countries and cultures. So if you're interested in finding out more about Eurasian culture, Eurasian folklore in general, but also specifically about ash, then yeah, I would definitely recommend checking that out.

And we were lucky because Lutz Zwiebel actually authored a second paper for this issue, which is entitled **Black Ash - a Forgotten Domestication Trait in Garden Orach**. In this paper, the author conducts a more typical, I guess you would say, scientific, experimental archaeology approach, as opposed to a collaborative approach with folklore investigation. The aim of the paper is to conduct experiments to determine whether salt can be obtained from the Garden Orach (Atriplex Hortensis), which is a vegetable plant that's discovered throughout the old world and beyond. The author goes into detail on the background of how you can get salt from the ash of this particular plant. How salt in general is obtained in different cultures around the world, or how we have historic evidence of the way that salt has been obtained from plants, but also from other areas such as sea brine. The methods are quite simple to cultivate different types of this particular plant, the Garden Orach, and then to attempt to extract salt from it using standardized methods, which the author goes into detail of in the methods section. The results then show the concentrations of different salts, and different elements within the ash that is obtained from these plants. The author compares the different range of salts and the different range of potassium and sodium contents in different species as well. Again, this paper shows that the author definitely has a very strong background in research into this particular topic of sort of ash and salt, because they go into a lot of detail about the biological and the social historical ethnobotanical data from various places around the world related to salt use. And not just for the plant that was used, but also for different plants, for example, Coltsfoot they mention and they go into a bit of detail with. So again, if you are interested in salt and ash, this is the issue for you. The first two articles are very strong in that respect.

The third article goes in a very different direction. It is from Lauren Muney, and it looks at **The Itinerant Artist: Portraiting Early America Using Scissors, Soot and Beer**. So, I mean, soot, you know, similar to ash. We've got a linked theme, I feel, in this issue. This is a really interesting article actually. It looks at the concept of silhouettes, which were created in the new United States since the sort of first decade of 1800, at least. The author talks about how hundreds of thousands of these portraits were created in the first decade alone. Since the 1990s museum Conservative have then wondered how to best care for the materials of these objects in their collections. Although there has been a lot of different history written about the art and the artists, there's actually been very few published experimental studies

about the material used in the silhouette manufacture. The author goes into detail about the primary ingredients, that is also mentioned in the title, so soot and beer, and why these things might necessarily have been used in the material. The author, by the way, was the 2024 EXARC Fellow to the Colonial Williamsburg foundation. So was lucky enough to work at the Colonial Williamsburg open-air museum and be able to conduct the experiments required for this particular article there. So, congratulations, Lauren, again, on getting the fellowship, and it's really interesting to read your results of what happened. She goes into a little bit of detail on the background of silhouette portraiture, different cultural notes, different definitions that are used because of course this is something that we have to make sure is always present in experimental archaeological projects. We have to make sure that the data is well-defined. So she looks at things like inks of the period, which are black or not black, at the use of artists outside of the apprentice system. She goes into more detail on that as well. Specifically the use of beer as an art ingredient, which I didn't realize was a thing, but apparently it is, talks about gum Arabic as a material, paper of course, and then goes into detail on the materials and the methods. What I find really interesting in this one is talking about the environmental conditions as well. So, the experiments were conducted on the East Coast of the United States, the Mid-Atlantic seaboard, as she mentions, can vary between dry and humid, cold or warm, sometimes daily, hourly, or a fraction of an hour. So it was very interesting to read about the fact that the environmental conditions also played a huge part in this project and affected the experiments quite a lot as well. There are a lot of source notes, provided as well on the different ingredients used, the different tools used, and why she used them. The methods in this one are extremely well laid out. So looking at, for example, in the first experiment conducted is to look at handmade Lampblack. Talking about the fact that one theory is that itinerant artists would've made Lampblack pigment themselves. So she talks from all of the steps from making this tallow candle through to harvesting the Lampblack through to mixing it into the ink, coating the paper with soot, beer and egg, and sharing the results. So it's a very, very detailed methodology. Let me say, if you are someone who wants to try this yourself, this is definitely a replicable experiment because she lays out the methods extremely well here. There are some very interesting results and I won't give too much away, but, there are definitely some remaining questions that are shared within it. The original hypothesis of the author is definitely tested and some interesting conclusions are therefore reached along with alternative theories and further discussions on the different possibilities and the different hypotheses that could instead be related to the materials used for this silhouetting.

The next paper also looks at dyes, but in a different way. It is called **Searching for Dubh:** (I guess, I apologize if I have pronounced incorrectly) **Experiments in Black Dyes Pre 15th Century in Ireland and Scotland**, authored by Ashley Stillwell-Hasan. The experiments within this paper are to try to understand the sources of different black dyes in Ireland and Scotland prior to 1500. The author attempted to obtain true black using only natural dyeing techniques. There were a lot of different ingredients made, used, it seems. And yes, this is another long-ish article, so I think a lot more detail will be gone into as well. First of all, the author talks about the background of black dye and how black dye was commonly obtained. She talks about linguistic understanding of colour because of course, colour is something that you have to be able to perceive with the eye, but in describing it, and over time, colours will change. So it's difficult to know what a colour would've been intended to be, how it

would've been perceived in the past, et cetera. So that concept is discussed a little bit. The author then goes on to discuss the evidence for early dye practices in Ireland and Scotland, so things like primary sources for black dyes. She goes into the ancient laws, household inventories, manuscripts of books, extant remains, so historical textiles that we have. Also looks at more secondary sources for black dye. So traditional dye recipes, traditional dyeing techniques, and then she goes into detail of the different natural resources that would've been available prior to 1500. So mordants and dye stuffs and discusses the different ways that dyeing black could have occurred. Indeed the methods and materials are extremely detailed. The author provides recipes and very detailed methodology of how these different dye materials that she uses were worked with and were manipulated in an attempt to create a black dye. The author also discusses how to prepare and dye the fleece specifically. So not just talking about the dye itself, but also talking about how it can be applied to the fleece and also how it reacts in terms of washing, which is quite interesting. The author had to test the washed fastness of the different dyes as well and that has also gone into a lot of detail. Light fastness is also checked, so how well the dye responds to light. And for people who want a lot more interesting information, there is an appendix as well. So you can go into a lot of detail about dying if you want to learn that with this particular article.

Now to something completely different. Our next article is entitled **Expanding Horizons: Contemporary Dynamics and Challenges in Public Archaeology in Nigeria** authored by Terngu Sylvanus Nomishan, Dimas Solomon Gubam, J. Kelechi Ugwuanyi. And I apologize again to anyone if I mispronounce names incorrectly during this recording. This is a really fascinating article because the aim of it is to assess the situation of public archaeology in Nigeria. I found this in particular a really interesting read because I know very little about the current state of experimental archaeology in Nigeria, but it appears that archaeology as a discipline really only began in Nigeria around the sort of early 20th century. So it's still considered relatively recent. There's all kinds of different aspects of archaeological research that really only started in the mid to late 19 hundreds as well. The authors go into detail about the history of the study of archaeology, how departments have grown, have closed, have collapsed over time, and the reasons why. This goes on to then the topic of public archaeology. So public archaeology of course, is that branch of archaeology which works to preserve and protect cultural resources by educating the public about the importance of their cultural heritage, which is an extremely important job and is very tied up with a lot of the pillars of EXARC in terms of open-air museums, historic and cultural interpretation. Especially when discussing the importance of education within archaeology, it is important to let people know why archaeology should be taught and why people should still engage with archaeological methodology, and archaeological topics and research. The authors go into detail about the background of public archaeology, where it comes from, how that itself has developed over time, which is a very interesting read. Then a very detailed introduction to public archaeology in Nigeria, how it relates to the theft in antiquities, for example, and the creation of the National Commission for Museums and Monuments, which was an attempt to sort of publicize archaeological work and research in Nigeria. The authors then discussed the challenges of public archaeology, specifically looking at public ignorance, looking at limited funding and resources, political instability and insecurity, corruption, insufficient training and education, insufficient community engagement, globalization and modernization, and job racketeering. So a lot of really interesting points and really interesting

issues raised, which would be fascinating to know how many of these issues are found in other parts of the world as well. And when there are common issues that then we can work together with, in EXARC or in other larger communities to try and help.

The discussion also goes into a little bit more detail about how these issues can be dealt with, how they can be further engaged with. The article ends with recommendations and a conclusion. So a really fascinating read. Thank you so much to our authors for submitting that. It's always great to have articles in the issues of the EXARC Journal from a range of different places.

Our next article is written by Ina Berg and is entitled **Shaping Minoan Clay Tablets and Hanging Nodules: Contributions from Experimental Research and X-radiography**. The topic of this article is the manufacture and use of two different categories of prehistoric Cretan administrative clay objects, so clay tablets and hanging nodules. And the aim of the paper is to investigate the potential for experimental archaeology and X-radiography to improve our understanding of this sort of process of manufacture and use. So far in terms of the kind of palatial bureaucracy of Middle and Late Bronze Age Crete, there have been Minoan administrative objects that have been studied and have been researched. However, the focus of these investigations has mainly been on the text or on the imagery. There hasn't really been much work on how these objects are actually created, specifically the sort of clay objects. There's been some very limited macroscopic and experimental work, but it's more related to the Late Bronze Age tablets rather than anything conducted on investigating the artefacts as actual archaeological objects or trying to understand their chaîne opératoire. So these objects are now going to be looked at through this article, not necessarily, in light of the content that is inscribed upon them, but in terms of the actual objects themselves, which I think is really interesting. The author goes into detail about what exactly is X-radiography talks about some case studies that X-radiography is used for, for example, in identifying forming techniques, how that is done. The paper then goes on to describe the methods used, so specifically the experimental archaeology, how that is conducted. What specific steps of the chaîne opératoire are used. There are a couple of different experiments made to create a range of different object types. The X-ray methodology is then also outlined in a lot of detail, talking about the different dimensions of the objects, the different ways that they are used and the different ways that they are studied. Then the results of this experimentation and x-ray sort of combination are discussed, looking specifically at things like tablet shaping techniques, the orientation of inclusions, whether it is possible to detect tablet descriptions, and the shaping techniques and the string arrangements of the hanging nodules. So a really interesting paper using a really nice combination of different methods to answer the experimental questions.

Next up we have Charles A. Speer's paper on **Simulating Organic Projectile Point Damage to Bison Pelves**. This is a really fascinating project. It was created almost sort of by luck really, because the experiments in this particular article are based on a bison pelvis, which was discovered eroding out of shoreline sediment at American Falls Reservoir in Bingham County, Idaho in 1953, which had a very unique groove and perforation on its side. And there's been lots of research done into this perforation, but no one can identify what would've caused it, particularly. One of the hypotheses is that potentially a dart, fitted with an organic

projectile point might have been used to shoot the bison. So this experiment looks at doing that, and sees whether it could recreate the same damage and perforation morphology as observed in the bison pelvis. The article first, of course, goes into detail about the background of the original find of this bison pelvis back in the early 19 hundreds into how much it was researched, how the perforation looked, and what has been done on that and the questions that were raised because of it. They talk about the background of the bison themselves. They look at previous studies, which used methods of projectile point damage into bisons to determine what kind of objects would've been used for hunting these huge beasts. They looked at it from a techonomic perspective as well, which I think is very interesting. And then they go into detail about the experimental methodology and the framework used. So the primary question for the experiment is: Could damage from organic projectiles such as antler, bone, ivory, or wood create similar patterns to carnivore damage? Because one of the most common theories is that this bison pelvis that was found had been perforated in some way by a carnivore. The method used was, yeah, very interesting. They used fresh bison hides, which were encased in ballistics gelatin, and then oriented in such a manner that a simulated atlatl dart would impact at the correct location as seen on the fossil. A very interesting experiment. They go into detail about exactly how the gelatin is created, how exactly the bison are prepared. Then they talk a lot about the different kinds of darts that are created. So they have darts made from wood, made from antler, made from bone, and made from teeth. They then go into detail about how exactly the darts were shot and what kinds of technology was used to shoot the darts. Then of course the results, looking at what kind of perforation, if any was made, what kind of damage was made and how then this relates to the original finding. The discussions go into the detail of how exactly the results relate to the main research question. A very interesting conclusion, which I will not give away the details of. You'll just have to read it yourself. It is very interesting and yeah, it's good fun to see and to hypothesize the different possibilities associated with this particular project.

Next up we have the **The Monoxylon Expeditions: The starting Points of a Nautical Archaeological Experiment** written by Radomír Tichý. This article is the kind of preliminary pilot study for an archaeological experiment known as Expedition Monoxylon four, which took place in 2023, and it used a replica of a dugout boat in the Aegean Sea. The aim of these particular replications and experimentations is that there have recently been boats which are dug from single tree trunks found in Lake Bracciano near Rome, which have been classified as boats suitable for sea navigation. But then they wanted to do a test to determine whether this sort of sea navigation with such a boat was actually possible. The experiment is described in detail, talking about the actual expedition itself. So what kinds of navigation equipment was used, what kinds of boat morphology was actually found. The main aim is basically to evaluate the seafaring capabilities of this boat replica. The article then goes into detail about the design of the boat, looks again at the voyage route as well, talking about things like power and steering, discusses the crew, which I think is really fascinating. The first line of the crew section is “The modern experimenter is the weak link in any archaeological experiment.”, which I find really fascinating. Talking about that, they discuss the vessel cargo, the stability, and the speed and resistance in waves. That goes into a lot of detail. And then they conclude with some sort of initial preliminary thoughts on this, and discussions of where the experiment will develop and continue into the future.

The next article is entitled **Wooden Matrices in Bracteate Production: An Experimental Approach** written by Magnus R. Aunevik-Berntsen. For those of you who are wondering what bracteates are, if you have a look at this article, you will see some beautiful pictures of bracteates, which look like almost coins with a little loop on them. So yes, definitely have a look at the article if you want to see what they are and to get further information on that. So far all discussions and experimentations on the migration period production of gold bracteates has suggested that wood might have been a possible material to be used for the matrix on which these bracteates are made. However, the assumption so far is only in the production of a single or very few bracteates. So this particular study, this article, aims to investigate how such a matrix could have been made, what part of the wood could have been used, and how it might affect the sort of serial production of these bracteates. Whether you could make more than one on a single matrix. The article first goes into a background of bracteates. So indeed they are a type of jewelry born around the neck as a pendant. Thank you, first line it already describes what these objects are. It talks about different research that has been conducted on these items already, and then discusses the goals and the scope of the research. So asks, how would one work the surface of the wood to achieve a result of acceptable quality? Is there a difference in using the end of the wood versus the side of the wood? Is it possible to achieve the production of bracteates with acceptable quality using this matrix? And is a wooden matrix capable of producing multiple bracteates or does it suffer a drop in quality that makes it unsuitable for serial production? Very clear questions. The research design is also very detailed, sets out exactly what it aims to do. The results also go into a lot of detail about the different parts of the experiment as well. From the initial experience of actually producing the matrices looking at the end wood versus the side wood. The quality assessment, looking at the serial production side. And then it looks at things such as surface analysis, the perceived quality, which they go into a bit of a discussion on because, of course, it is difficult to identify perceived quality. Then indeed the conclusions show that there are certain aspects that can be used, certain methods that can be used which do indeed make it possible to produce these high quality bracteates.

Our next article is written by Ivan Calandra, Guido Heinz, Allard Mees, Florian Thiery, João Marreiros - I apologize again sincerely if I pronounce people's names wrong - and is entitled **A Workflow Tool for Archaeological Experiments and Analytics**. Those of you who have listened to the latest episode of the EXARC show will probably already know a little bit about this because, this is a tool that has been implemented by NFDI4Objects Experimental Archaeology Community Cluster. The article goes into a little bit more detail about the NFDI4Objects consortium, talking about why the workflow tool was first implemented, the background of the community cluster specifically, relating, for example, to criticism of experimental archaeology by the wider archaeological community. And also how we as experimental archaeologists share our work. They discuss the idea of it being a sort of reflexive process, and they talk about what they are actually doing with this workflow tool. So discussing the objectives, the features, the current state of the user interface, persons and institutions used, activities that can be used on it. Resources, tasks, flow chart and sharing. It goes into a lot of detail about the current interface and how it is currently set up. However, if you've listened to the podcast episode, you'll know that we are still actually at NFDI4Objects…. I am currently assisting with this community cluster in a temporary working

group that is trying to develop this working tool further. So if this is something that you find interesting, please do get in contact with the authors because yes, we definitely need as many experimental archaeologists as possible to help us to create this workflow tool and develop it further.

Next we have **Resurrecting a Bog Dress: A Comparative approach to Medieval Textile Construction**, written by Jake Morton, Ruby Becker and Helen Banta. Again, there's some gorgeous pictures in here. If I were a seamstress, I would definitely be delighted because there's some amazing patterns being drawn out, some different stages of the stitching being shown. So if you are into textiles analysis or textiles reproduction, definitely this is an article for you. In this article, the authors recreated garment 38 from the 14th century garments preserved in a graveyard in Herjolfsnes, Greenland in order to explore the reasons behind the different stitching techniques used. And this was a really amazing find because natural fibers do not usually survive well in Northern European environments, especially if they're not sort of far enough north to be frozen. So there's very little archaeological examples of medieval textiles. But this particular example, which was found preserved in a bog, near a Norse village in Greenland, is then especially interesting and gives a really great insight into the different manufacturing methods of these garments, at this time. The authors go into a lot of detail about the different steps involved in the experiment. So the first step, of course, is patterning. Then you have assembling materials, cutting out the garment as well. Singling, which - let me check, there we go: Singling is a technique wherein one sows a wavy line of stitches along the edge of a piece of fabric to attempt to secure the individual threads together to keep the fabric from unraveling over time. I'm learning so much new vocabulary from this issue, it's great! So that's singling, so they talk about singling and they go into detail with that in terms of period seams versus modern seams, for example. The insertions of gussets, which, let me check again: Gussets give volume to an otherwise rectangular garment. There you go, another new thing we've learned. They then look at the comparison of stitching techniques. They look at a modern hem, for example as well, and they discuss that aspect of the experiment. They talk about tablet weaving and how that relates to the reconstruction. They do discuss the sleeves, which were apparently particularly challenging. The pockets, which are apparently also very different from modern pockets. They discuss the neckline. And finally they conclude with some final thoughts and a discussion on the experience. And again, like I say, there's some really great pictures. You can see it all the way from the initial patterning through to a model who is modeling the finalized dress.

Our penultimate paper is called **Neanderthals in the Rain: Assessing Neanderthals' Strategies to Survive Wet and Cold Environments through an Experimental Analysis** written by Eleonora Scandola and Penny Spikins. Those of you who have read our first post of the EXARC blog over on the new website will already be aware of the kind of limited research that currently exists around Neanderthal's ability to adapt to cold climates in regards to having clothing and having complex clothing. So, Phoebe Baker, who was winner of the EXARC Award in a previous year, wrote our very first blog post, talking about different sewing techniques used to replicate Neanderthal footwear. This paper also covers a similar topic, but looking at the different challenges posed specifically by cold and wet environments, which may have potentially constrained the Neanderthals' development and territorial expansion because it might have restricted Neanderthals' ability to cope with these wet and

cold conditions. This article aims to have a look at a more deeper understanding of environmental adaptations and how you can see relationships between the environment, behaviours and technology. It is an experimental project. The authors first go into detail about the historical backgrounds, the environmental background in relation to Neanderthals, looking at archaeological evidence. So for example, cultural insulation of Neanderthal populations. They discuss the lack of knowledge in regards to wet environments, because so far biological and cultural adaptations research into those have really only focused on survival in cold climates. But there's been very little discussion about wet clothing. In order to try and further develop and add to this pool of existing knowledge, the authors intend to focus specifically on the kind of waterproofing aspect of Neanderthal seams. The methods are also discussed in detail, the methodological framework, ethnographic sources, and then going into detail on the experiments and the rationale for materials used, as well as the experimental design and procedure. So various different stitching types were tested and various different waterproofing materials were applied, as an adhesive almost onto the seam. Photos that are included along with this article are also very interesting to look at in terms of that. Adhesives or additives such as birch bark tar, pine resin and beeswax were tested. And the results are very interesting. They discuss which ones failed, which ones were able to maintain their waterproofness, which ones were able to maintain a seam as well. And then the authors discuss, of course, their results. So discuss it in terms of, okay, was it indeed possible to devise a waterproofing strategy for complex clothing, considering the technological toolkit of Neanderthals at this time? The authors then also discussed the results of their experiments in light of the Neanderthal occupation of Eurasia and how that developed and how a sort of complex society could have developed. Of course, they discussed the limitations of the project, which is always very important to include in these kinds of projects and conclude with some further research, ideas and theories.

Our last peer reviewed paper also looks at a **Reconstruction**, this time **of some String Instruments from the Ceiling Paintings of the Palatine Chapel of Palermo and the Cathedral of Cefalù, 12th Century**, written by Giuseppe Antonio Severini. First of all, the pictures in this one are again gorgeous. There are a lot of pictures of the instruments themselves as depicted in ceiling paintings, and they're gorgeous ceiling paintings. Even just if you want to look at pretty pictures of the paintings, this would be in a good article to look at. The article itself explores two hypotheses related to the use of date palm wood for the manufacture of plucked string instruments, in this particular case, focusing on the lute and ceramics for bowed instruments, also known as rabāb. Drawing inspiration from the iconographic sources aka the ceiling paintings of the Palatine Chapel of Palermo, and the Cathedral of Cefalù in the 12th century. The author first goes into detail about the paintings themselves, both at the Chapel of Palermo and at the Cathedral of Cefalù. He discusses additional sources of information and different sort of comparison. And that goes into detail on the instruments themselves. For example, the lutes come in two different sizes. So you have four-course lutes and five-course lutes. And then he also discusses that you have smaller three-course lutes and various other forms of lutes and discusses the reasoning for choosing the particular lute type. Also goes into detail about the rabāb, what it is, how it is made in general, and its history. The article then outlines the reconstruction of lutes in terms of the materials and the techniques. So the working process, how to make the difference

soundboard, the transverse band, the keyboard, the bridge, and the strings, and the plectrum, which again, these words that I'm not sure about, but it's all detailed in this particular article. They then discuss the reconstruction of a rabāb. Again, the materials and the techniques used. The fact that it's a one piece wooden body, it needs a glazed ceramic residence box, the working process, the transverse band, the keyboard bridge, strings, tuning and bow. And then there is a brief discussion about the conclusions reached, based on the results. For example, an evaluation of the acoustic performance of the reconstructed instruments, and of course some ideas on how to continue this research further into the future.

I thought that there would be a sort of linked theme at the beginning of this issue. But then it seems that there's a really wide range of different articles within it. You then have several Unreviewed Mixed Matters articles. For example, an event review on **Vounous 2024** written by Giovanna Fregni. You also have another event review, **Experimental archaeology in Denmark 2024**, written by Gustav Hejlesen Solberg. You have **an interview: A Journey Through Time - Rickard Åkesson, the CEO of Hands on History, a Cultural Heritage Enthusiast** written by Rickard Åkesson and Vicky Mikalsen. And you finally have a really fascinating article entitled **Disability, Living history and Experiential Archaeology**, authored by Jonathan Dymond.

So that's about it for this episode of EXARC Extracts. We had a lot of articles to work through, but hopefully you stayed with me and you managed to get some interesting insights into the kinds of articles and the kinds of research that are published in the EXARC Journal.

Just a quick reminder that our Experimental Archaeology Conference is coming up soon, EAC14 in Brazil. Our next podcast episode we'll go into more detail on that as there will be some of the organizers involved. But you can register up until the day before the conference registration is open. You can follow our new website as well as our new Journal website. We have a brand new EXARC website, EXARC.org. So do go and check us out there. We are still working on it. We're still uploading information and all our members' profiles, so bear with us while we work on that and otherwise you can join, as always, our Discord server, follow us on social media and subscribe to our newsletter.