ALE: Hello, everyone. My name is Annabel Lee Enriquez and I'm part of the Arches team at the Getty Conservation Institute. And today, we are very happy to present Dr. Angela Labrador, assistant director of the Cultural Heritage Management and Museum Studies Graduate Programs at Johns Hopkins university, as well as managing partner of Coherit Associates, a long time Arches service provider. Angela has worked on several Arches implementations, some of which she'll talk about today. And many have involved today's topic of community outreach and education.

Before I turn it over to Angela, a few housekeeping notes. As you'll notice, the chat interface has been disabled. But if you have any questions for Angela or even any comments, feel free to enter your questions any time to the Zoom Q&A interface. You'll be able to see everyone else’s questions and also upvote any questions that you are also interested in. I'll be moderating the Q&A at the end of the presentation, in which Angela will be taking questions about her presentation. As a note, we won't be taking any technical questions today. You probably already noticed that live captioning is available, and that is available by clicking the 'Live Transcripts and Subtitles' button on the bottom menu panel of the Zoom interface. Also, you should have already been alerted that this webinar is being recorded, and we should have that webinar recording available within the next week. Regarding our next webinar, we are working on organizing it around the topic of internationalization and localization using Arches version 7. So, for that, definitely follow us on social media, join the Arches community forum, or sign up for our announcement list to learn when that is taking place (also find out when this webinar recording is available). With that, I'm going to turn it over to Angela.

AL: Thank you so much, Annabel. I'm so happy to be here with you this morning. And welcome to all of you who joined us, especially to the West Coasters who are here so early in the morning. I'm really looking forward to our Q&A discussion at the end as well. I'm going to go ahead and turn off my video for the presentation; and I'll get started.

Numerous studies and public opinion surveys over the years have revealed that many, if not most American citizens, are unaware of the work of historic preservation commissions and professionals. At worst, some citizens may feel that historic preservation is irrelevant, impedes development or, is even elitist, and we can't really blame them. Historic preservation has long focused on sites related to white American men and their architectural heritage. A 2019 tally of the National Register of Historic places calculated that only 8% of listed properties represented people of color, women, or members of the LGBTQ community.
Luckily, a rising interest in diversity, equity, accessibility, and inclusion is leading to more dialogue. And hopefully such dialogue leads to further action in terms of preservation justice. But this work cannot be conducted by historic preservation experts behind closed doors. If we want to raise public awareness of historic preservation, diversify the sites and stories we commemorate, and attract a broader number of citizens to join in our causes, we must increase and think more creatively about our public outreach and education activities.

So, what do I even mean by public outreach or education? Well, to begin with, there is no one way to do it. Instead, it may be best to think of it on a continuum, as the International Association for Public Participation models it as illustrated on this slide. Their spectrum of public participation depicts five increasing levels of engagement, from informing to consulting, all the way up to empowering. Now note that one level is not necessarily better than another in the abstract, rather it all depends upon your desired goal and the promise you can make and uphold to the public. For historic preservation, you can imagine that as we progress through the right in the spectrum, we are empowering citizens to make ethical conservation decisions on their own accord. That is, to be full participants in the historic preservation process.

Often public outreach is engaged in as a bookend activity to historic preservation initiatives. For instance, by hosting public informational meeting at the beginning of a project and another at the end to share results. Sometimes public engagement will be undertaken during a historic resource survey to seed our inventories: helping us identify a broader range of sites, representing more diverse values and histories. But less often do we consider how our heritage inventory databases themselves can be an ongoing tool for public outreach and engagement. In this webinar, I’ll present 8 examples of how the Arches platform can help historic preservation commissions and professionals to both manage heritage inventory data and foster public awareness raising and education by: sharing information; demonstrating shared stakes; contributing to placemaking; and building a stewardship ethos.

Furthermore, weaving public education into our inventory systems can help provide a feedback loop that can contribute further information to our inventories. Originally, I delivered this presentation at the National Alliance of Preservation Commission’s annual forum, so I’m addressing professionals and volunteers working at the local level within such American commissions. However, my suggestions also can be extended to the regional state, federal, and even international levels across the public, private, and NGO sectors. And I, of course, welcome such applications. And I’m going to draw upon some examples from those contacts in this presentation.

The first example is the most basic and straightforward: Arches helps you share your heritage inventory, which can help raise awareness about your commission’s work and the historic resources in your community. Now, we can find an excellent example of this with the Historic Places LA Arches case study. Arches enables citizens to explore their heritage inventers through an intuitive Google Map-like interface that is much more engaging than a list or pamphlet. And when someone clicks on a place marker, they can access the property’s historic resource report, as well as additional documents, such as related
surveys or historic context reports, allowing citizens and other stakeholders to dig deeper into the history of these sites and how they were identified.

Now, if you're considering using Arches, I recommend that you ensure that every inventory entry has a statement of significance or some narrative explanation as to why you've included a property in your inventory. It doesn't have to be long or full of painstaking research, but you should seize this opportunity to communicate the “Why” of historic preservation. Even if a property is listed because of its architecture, I urge you to reach beyond standard architectural description or jargon and connect with the broader social history of your community, your region, the nation, and the world. In this way, your inventory will not only reflect the places you deem significant, but the stories and values as well. And it's those stories and values that your audience can connect with.

Second, Arches can help you be accountable to the public, which builds trust in governmental institutions, something we know has been in short supply of late. For instance, many commissions are involved in design review decisions. Sunshine laws and open meeting laws mandate that these reviews be carried out publicly. However, the records of these decisions are often buried in meeting minutes and archived by date rather than property address. While I'm not aware of any municipality using Arches for this purpose, it would be relatively straightforward to track design review decisions in Arches. For instance, you could add your city's design review overlay map to the Arches map interface so that property owners or developers can easily search whether their property is within the district. And when a design review decision has been made, you could add a pin on the map with a short report of what was being requested and the determination made. Again, this information is already included in public meeting minutes, but Arches helps to make it available and searchable in a more accessible way. This higher standard of transparency will help to demonstrate that design review isn't about impeding development or simply dictating paint colors, but it is about finding solutions that meet property owners’ economic and utility needs, while also enhancing property values and neighborhood character. Seeing these decisions within their geographic context on a map can help to communicate that larger context within which design review decisions consider but don't necessarily make explicit in the public record. And I'll also add that the new workflows feature in Arches would be a great way to manage design reviews internally as they move through the review process.

Now, a third way that Arches can help with your public engagement is to show your impact and thus demonstrate your value to your community. You can use Arches to track more than just properties on your inventory. As I already mentioned, you could use it to track design reviews, but you can also use it to track things like grants and conservation activities you may support or undertake. Often, commissions report these activities in the local press and meeting minutes or on the municipal website. But there’s something very compelling about visualizing these activities as dots on a map, especially as they accrue. A citizen is less likely to understand the extent of your impact if they have to read through 50 newspaper articles that are published across five years in your local paper, then they are to see a single map with 50 dots all at once.
Preservation Utah is a great example of an organization using Arches in this way. Now here you can see their Arches search interface zoomed in on Salt Lake City. Red dots represent conservation easements that they own or manage. Yellow dots represent advocacy campaigns. That is places that were or are in danger. And clicking on one of these yellow dots would take you to a report that outlines the property status, why it’s important, what preservation Utah has done to protect it, and how the public can help if the property is still in danger. Now, blue dots on the map represent loans that the organization has granted to property owners to help conserve their historic properties. Clicking on a blue dot reveals a report containing information about the property and the work that was funded include before and after photos, an effective way to demonstrate your positive impact. Finally, the black dots represent local tradespeople and businesses specializing in historic preservation and architectural services, serving as a helpful preservation directory for Utah property owners.

A fourth way that Arches can help with public engagement is by encouraging public nominations. Recognizing places that local citizens have identified as significant helps commissions demonstrate their responsiveness to public nominations and helps build local pride. An example of using Arches to encourage public nominations can be found in the country of Jamaica and their National Inventory of Historic places. Historically, the heritage inventories of Caribbean countries have been comprised primarily of colonial monuments, such as plantation great houses and European forts. Thus, the history of the Afro-Caribbean, Indo-Caribbean, and indigenous Caribbean communities has largely been left out of the officialized heritage in the region. Recently, Jamaica revised their inventory process to address this problem. They expanded the types of heritage sites that can be nominated, as well as their evaluative criteria in order to recognize a greater range of values. They also undertook engagement activities with local communities to solicit sites of local significance which could in turn be considered for listing in their national registers and on their public art sites.

On their Arches home page, which you see here, the Jamaican National Heritage Trust has included FAQs that explain the purpose of their inventories, why inventories are important, and how citizens can nominate a site. They then developed a shortened version of their nomination form that any citizen can complete. And if a nomination is successful, the public will then be able to see it included in the Arches system as the inventory continues to grow and reflect a more diverse range of heritage sites and values.

My fifth example relates to how Arches supports the ability to overlay historical maps on contemporary satellite imagery, which can reveal landscape traces and assist with mitigation decisions. For public users, exploring what their neighborhood looked like by navigating these layered maps can reveal the changes and continuities in their local landscape. From the college campus that used to be a cattle market to the businesses that have weathered over one year in the same spaces. Such an example can be seen in the Arches instance hosted by the city of Lincoln in the U.K. Their map interface contains thirteen historical map overlays covering the years of 1842 through 1990, transforming Arches into a virtual time machine These overlays allow citizens, educators, and students to spatially explore their local landscape history. Geography, social studies and history teachers can use a resource like this in their classrooms to engage students in questions about the development of their communities, settlement patterns, and changes in commerce and industry.
The Arches site, 12 Sunsets, hosted by the Getty, pushes the time travel envelope even further here. Users can virtually drive down L.A.’s Sunset Boulevard and experience the Strip through historic street views compiled by photographer Ed Ruscha’s over 12 sessions that cover 55 years of this city’s history. The result is a highly immersive time travel experience and is an excellent example of the benefit of the open-source nature of the Arches software. You aren’t constrained by the limits of open-source software. In fact, you’re free to push the envelope and develop new features and ways of using the system to serve your public engagement needs, as we can see here with 12 Sunsets.

A sixth way that Arches can help is by linking and embedding multimedia into your inventory, which can help bring the history of these places to life. Arches supports a full range of multimedia. In addition to PDFs, you can upload archival documents, historic photographs, oral histories, and videos. An example of Arches being used this way is the website my colleagues and I built called Places of Legend, which was an experiment to present inventory data in a way that would be more engaging and entertaining for a public audience. Along with the inventory, we developed a podcast of the same name, and each episode featured a historic place with some kind of legend, folktale, or mystery behind it.

We brought that story to life through the podcast and on Arches. In this slide, you can see how we gave the standard Arches resource report a facelift to convey a more mysterious, detective-like, and informal angle that we were portraying. We called these reports “case files,” and in each file there was a collection of multimedia for the audience to dig into, such as newspaper articles, historical photos, our podcast recordings, and even books. Places of Legend was an incredibly fun proof of concept. We amassed a good number of followers for the podcast, and we even heard from a schoolteacher who is going to use the podcast and website in his classroom for his unit on Hudson’s Bay.

Since then, I’ve worked with schoolteachers on incorporating historic sites in their classrooms. And I can tell you that teachers are hungry for this type of online multimedia content. Your historic inventories and their primary source documents could be absolute treasure troves for your local teachers. And Arches is a great way to enable access to this trove.

Alright, moving along… a seventh way that Arches can help is through the gamification of architectural identification, to encourage residents to approach their neighborhood with a renewed curiosity and to learn about their architectural histories. Now, this idea is akin to the architectural scavenger hunts that some commissions and organizations already do, where close-up photos of architectural elements are shared with the public and then people have to track down the buildings that are in those photos. I haven’t found anyone doing this yet with Arches, so I’ll do my best to describe what I have in mind. Alright so, I’m going to take the city of Cincinnati as an example. Their website for city planning and engagement hosts an excellent field guide to identifying their city’s architectural styles. Each style has a drawing with call outs of the architectural features to look for, a narrative description, and some photographs of examples. While this is a fabulous resource for homeowners to identify their own home’s style, one could expand the audience for this information by creating a friendly competition or game.
Now, this game would be open to anyone to go out and identify additional examples using their cell phones, kind of like birdwatching or Pokémon Go. So, you could use Arches’ responsive workflows to create a simple submission form that works on mobile phone. When someone spots an example of a particular architectural style, they can snap a photo, complete the simple form, and then submit this to your Arches database as provisional data for review. And boom, you may have a new inventory entry right there. Or if this building is already in your inventory, you now have what could be useful information about the current state of conservation of that site.

It all depends upon what information you ask for in your simple form. As users rack up more and more identifications, you could offer badges or some fun swag as prizes. Now, will there be cases where someone submits an entry and identifies a house as Second Empire [style], when you know it’s really an Italianate? Sure. But the point isn’t to make every citizen an expert on historical architecture. It’s to encourage them to get out there and start exploring their neighborhood with new eyes and connect with a sense of place. And each time they submit an entry, whether it’s correct or not, that’s a touch point that is an opportunity for you to engage with a citizen who may be new to historic preservation and the work that your department or commission does. By gamifying your inventory you can reach new audiences, provide a covert learning opportunity, and demonstrate that this historic preservation stuff can be a lot of fun.

Finally, Arches can help transform your inventory into a public engagement resource by supporting citizen monitoring of your historic sites, providing you with critical data and fostering an ethic of site stewardship among the public. An excellent example of an organization using Arches in this way is the Florida Public Archaeology Network and their Heritage Monitoring Scouts' program. Their Arches Inventory contains over 7,000 historic buildings, cemeteries, and archaeological sites across Florida. Heritage monitoring scouts are volunteers who agree to abide by certain ethical codes and monitor specific sites. Scouts visit their assigned sites periodically and log “scout reports” in Arches, providing photos, observations of the state of conservation, and potential threats that should be addressed. We all know that every historic preservation agency and planning department is understaffed, and most lack the capacity to monitor all the historic resources that they’ve inventoried. Engaging local people in citizen science projects like the Heritage Monitoring Scouts program expands your capacity. For Florida, it means boots on the ground at 7000 sites, helping to monitor the impacts of rising tides, vandalism or just the passage of time. Having their monitoring reports entered directly into Arches means that Florida’s land managers and historic preservation experts have a site’s baseline inventory data and a temporal record of its conservation status at their fingertips at all times.

So those are just 8 ways that Arches can help you to transform your inventory database into a resource that can inform a wider public, demonstrate shared stakes in our historic resources, contribute to residents’ sense of place, and help build a stewardship ethos. Each example falls somewhere on a continuum of public participation, from the straightforward level of informing and moving up to involving, collaborating, and potentially empowering. I hope this presentation has inspired you to consider how you could use Arches to help meet the ultimate goal of people-centered historic preservation. That is, to foster a deeper engagement with our local environment and to increase the quality of life for every local citizen. Thank you so much. So with that, I’m going to turn it over to Annabel to moderate our Q&A.
ALE: Hello, everyone. Thank you, Angela. And I want to remind everyone that if you have a question, please do enter that in the Q&A. Actually, Angela did mention that this presentation was originally given at the National Alliance of Preservation Commissions Conference in Cincinnati in July, which I took part in. And I invited Angela to present with me. And I saw this presentation, and I thought, “we need to share this with the rest of the community,” even though, in some ways it is kind of focused on the U.S. historic preservation community. But I think, as you said, Angela, a lot of these concepts and just the idea — the aspirational and inspirational aspect of Arches, I think that's universal. Anyone, anywhere can take some of these concepts and apply it to their own case. So thank you, Angela, for presenting this again. And yes, I'm going to answer the first question: this presentation will definitely be available online. We'll let you know within the next week when that's available via our social media and our announcement list. Actually, via our social media and our community forum.

OK, so … the second question is from Jennifer Wong. “Has there been much use of Arches with more intangible types of heritage sites?” I'm going to answer that, yes. But I'm going to also, Angela, answer that as well. If you have an answer, I can also get more into that…

AL: Yes, there have been some use of Arches with intangible types of heritage, and this was something that I was really interested in as well, even with the Places of Legend, trying to get the intangible values associated with immovable heritage. As far as intangible heritage inventories in the more classic sense, my understanding is that there is one that's been developed by, uh - is it the City University of Hong Kong? Or it's in Hong Kong, correct Annabel?

ALE: Hong Kong University, they did have an implementation of Arches where they were looking at intangible heritage within the city of Hong Kong, and in addition, I know that there are other cities that are currently having implementations in-progress where they're looking at how to incorporate intangible heritage. An interesting implementation of Arches involves the island of Socotra, where they're recording information on tangible and intangible heritage, but also, in addition to intangible heritage, they're also recording information and data on their unique biodiversity. If you are in - if you know the island of Socotra at all, you'll know that they have some really interesting, um - they're very biodiverse, and one of the reasons why they're on the World Heritage List is because of that biodiversity. And so they're using it to record – Arches is being used to record that. OK…

One thing, I'll just add on to that, with Arches being open-source and open to customization, it does open up new ways of representing data geographically. One of the big challenges with intangible heritage is that it's not fixed in place, like a building is. And so being able to represent the dynamism of intangible heritage on a map that's hard. But there are technical tools that a developer — I would really love a developer to work on — to even be able to show, for instance, festival and parade routes as it moves around a city. There are ways that we can bring maps more to life and manage those data better.

ALE: Thank you. The next question, I think it's a group of questions, I think they're related, from Maya. “For the Scout program, is there a spot check of the inventory by the Heritage Monitor being posted by
the scouts?”, and as a follow up to that: “Is there is there some checking of an inventory by the heritage manager?” So as a note here, neither Angela nor I are directly involved in that particular project. That is being worked on by another branch of service provider, but I know that I can answer some of that and hopefully that will help - so for the scout program in Florida, that is an implementation by the Florida Public Archaeology Network, and their service provider is Legion GIS. And the way that they’re working, the way that they handle that is that they do have paper entry forms and they’re also often - scouts can login to the site to manage their entries, I believe? But in regard to spot checking, I believe that there is some sort of checking there so that it isn’t necessarily…it isn’t necessarily entered into the system without some checking. But I don’t know if there’s any ground-truthing or anything like that. But, um -

AL: I can add up to that. It’s a great question. And it goes more generally to how you consider your workflows when implementing Arches and the garbage going in, garbage going out, kind of rules of data management. And it’s a good question to pose to Florida Public Archeology Network. And they have presented before to our U.S. Arches user group. So, if you are interested in hearing more details about such case studies, definitely join the users group. We meet informally and can hear from folks and ask those types of questions. And just a real shout out to Legion GIS on that instance. I was able to assist a bit in helping to update some of their user interfaces that manage both the heritage monitoring of Scouts’ but also the Florida land managers at various state and federal agencies. And it’s a really great example of how user centered design kind of meets the Arches ability to support granular permissions, controlling access of who gets access to what data, because, of course, for archaeological sites, some of this can be considered sensitive data.

ALE: Yeah, exactly. Hopefully that answers your question, Maya. Let’s see…Eric Kansa: “lots of inventory data can be pretty technical.” Yes. “Besides adding narrative descriptions of significance, are there good practices to make structured data that are more friendly for use by a wider audience or wider public?” Hm, yes, there are - so, Eric, there are good practices to do that, and there’s a lot that has been written on structured data. And - but I think your question is more about how to make it more friendly for use by the wider public. And that is a question, because I think a lot of the Arches implementations, a lot of them are built for the actual professionals working on conserving heritage. So maybe that’s – potentially, it could be a secondary, um, a secondary consideration. And the work is - the data is often structured to help support the work within a municipality to, um, to conserve heritage. And it might not necessarily read in a way to the general public that’s understandable. So, I guess that’s a question, Angela, what are your thoughts on that?

AL: Um, well, my thoughts are that: that's the type of question that needs to be asked during project planning. And that anyone who is going to be implementing Arches or any kind of heritage inventory should be taking a user centered approach and should be taking a pretty broad and holistic approach to identifying their users. And I think like Annabel said, a lot of times we go into designing our heritage inventories as though the only users or stakeholders are professionals or maybe planners. But we have a lot of diverse stakeholders and when it comes down to it, the public itself is a major stakeholder. And so we need to be asking questions about what are their needs, what are their interests, how are they going to be using the system? And so just like in planning any kind of online project, you would - you would
think through those users’ needs, what they're going to want to do when they get to your website, to your
database, and how you're going to enable the tools to allow them to do that. And I think Preservation Utah
was a good example of that. They know that citizens of Utah want to be able to access contact
information for tradespeople or get in touch with people who sell historic moldings or people who
specialize in historic windows or whatever. So, thinking through how can Arches, our heritage inventory
system, actually provide information for those people? That's a really out-of-the-box way of using Arches
to meet the contemporary needs of a public user base.

ALE: I’m going to second that Angela; that a lot of us, and I think part of what makes Arches able to
potentially - or at least the aspirational portion of your presentation, Angela, all of these possibilities with
Arches when what makes that possible is the flexibility. But that flexibility means then that absolutely
needs to be some planning at the beginning to understand everything that an Arches system is going to
be handling. And part of that is public outreach. Or potentially, doesn't have to be. All right. Next question.
Dennis Wuthrich: “Great presentation, Angela.” I second that! “How have you been able to motivate local
government officials who are often risk averse to embrace some of your suggested uses Arches to
engage with their local communities?” I guess the question is: how and have you?

AL: Right, not very successfully. Thank you so much, Dennis, for the kind words. But I, I have to admit, I
live in a town that does not have a historic preservation commission. So I haven't gotten very far here
locally. That being said, I do think that the low hanging fruit of local communities in the U.S. are those
communities that are CLGs or certified local governments. So there's already a buy-in there around
historic preservation, and there's a mandated need for a tool like Arches, because every CLG needs to
have an inventory of their significant sites, significant cultural and natural resources. So I think that those
communities are really great to start with. And furthermore, the CLG program makes those communities
eligible for grants that can then fund the implementation of Arches. The only rub there is the ongoing
maintenance costs that are required to keep Arches up and running. But if a community can demonstrate
the benefits of their inventory to their citizenry, not just to them, then I think that they have a better shot at
baking those costs into their city's annual budget. So that would be for all those lobbyists and local
agitators and advocates out there. That's - I would start with the CLGs.

ALE: I will say, I think, Dennis, one of the great things about – and Angela mentioned this, there's a U.S.
but then there's also a U.K. user group. But I think a lot of our members of the U.S. user group are part of
local governments, and I think even just the information sharing can help others and inspire others to -
when they're planning their own Arches implementation for things that might be on their wish list, of things
to budget for and things to plan for. Again, that's another plug of the user groups. And if you're in the U.S.,
the U.S. user group. All right, and the last question, I see here is by Max Underhill: “Great presentation. Is
there an example of mapping industrial heritage and its link to raw material, natural, or people-made like
agriculture?” Hi Max, at the moment, there at least – I, as part of the team, I'm not aware of one. David,
feel free to chime in and type in an answer if I'm misspeaking. But I will say here is that there might not be
a ready example of this, but Arches is flexible enough to be able to do exactly what you described. To
map industrial heritage and create linkages to records or to records of different raw materials, whether it's
iron or what, what the raw materials might be. And you can even take it further depending on what your
actual methodology is. I think, again, the point is that Arches is very extensible, both from - in regards to the code, it's very modular and extensible. But also, 2) the ability to design the database within Arches using just the user interface is extremely flexible and really, it really depends on what, especially when we're talking about the actual data and organizing your Arches system and its data, that really depends on what your methodology is. And in your own imagination and creativity to how you model your data. Angela did you want to add?

AL: Yeah, I'd love to add on to that. Max, this is such a great question. And like Annabel, I'm not aware of any implementations out there right now that happens to do this but it doesn't mean that they don't exist, we just don't know about it. But it's certainly possible, and I would also add this is something that could relate to intangible heritage inventories as well, when we're planning our inventories, and we're thinking about what it is we need to map and manage. I really want to encourage folks to think about our heritage as part of a greater heritage ecosystem. And as you've just said, the link between raw materials or the people who are processing those materials or the chain of work that gets from raw to the end and the practices, people and sites that are associated with that. That can all be mapped and managed in Arches because the database is not set in stone. You develop the database. And going back to Eric's question about standards, which I'm sure Eric can also share a lot more information about how we can handle such data standards, but, you know, the standards that underlie Arches data management is an ontology for describing our data. So instead of just getting an off the shelf database where we have to fill in certain fields, and they're set in stone, instead, we have the freedom as heritage experts to determine what data we want to track and to identify them. And we just have to use a shared language of describing those data. So you can have an Arches instance that is focused on industrial heritage, from raw to end product. You can have layers in your Arches search interface showing all of the manufacturers that use that product. You can - you can map the people who were craftspeople and master crafts people in a certain skill. So I think the openness of Arches hasn't quite yet been taking full advantage of. So I really encourage people to just start experimenting with that and putting together these more holistic heritage ecosystem, type systems. And I think that those are the types of systems that people can really get into because they're much more likely to be able to relate to the stories of people and places and the histories of those when they're more holistic.

ALE: Yeah, I agree Angela, and to add on to that, Angela is talking about our shared language in regards to cultural heritage. The CIDOC-CRM conceptional reference model is an example of that. If - using that ontology, you can use that ontology to help design your database and then that all of that information, all that metadata regarding that shared cultural heritage language is then hidden from your end users, but it's still there in the background describing your data so that the data is interoperable and can ... and it incorporates the standard. All right. OK, and I just want to let everyone know that my colleague David Myers has dropped in some links to some of these questions. And I've left those up and some links to - especially in regard to the intangible heritage question. There is an article about the MalakaNet Arches implementation and intangible heritage. So I'll leave that up for a second. And this is just a comment by Eric: "I think Angela's response to that publicly - a public friendly data sounds like a great approach." I agree. "I really tried to do that community engagement work while doing the data modeling." Yeah, I think - to me at least in the Arches implementations that I've been involved in, I did the majority of the work. I
mean, there's a lot of work afterwards, but the majority of the brain work, the hard work at that the planning stages, figuring out what you want your Arches implementation, what you want it to handle and what your methodologies are, who the stakeholders are and then trying to - if you're not - trying to plan for that over the course of implementation. Angela, did you have anything to add or-

AL: No, I think you said it perfectly.

ALE: All right. I don't think there are any other questions. But again, we will know via social media and the community forum when we will be posting this video and the transcripts for this webinar. And again, I want to thank our speaker, Angela. Thank you again for agreeing to present this to our audience. And definitely to everyone here: thank you for attending and have a good rest of your day wherever you are. Thank you, everyone.