AV INSIDER

Play, Pause and Press Forward

The Next Generation
Training for AV Archiving, Preservation and Presentation

Keeping AV Content Alive
Presto Please!

Tony Ageh
Man of Vision on the Transforming BBC Archive

Smithsonian's Digital Future
with Anne Van Camp

Film Scanning of the Future

In this Issue

Welcome to AV Insider

Ever wondered who the people are behind those big name organisations? Ever wondered where are the people with the same questions you're asking? Or with similar challenges you come across and what decisions they've made? Ever wanted to read about crazy passions and obsessions of others inside your domain? Welcome to AV Insider.

With AV Insider, you'll get to know the people behind AV archiving and production — the people (and their organisations) who make up the community invested in the digitisation and digital preservation of our audiovisual cultural heritage. AV Insider is not just another magazine on AV preservation technology. It introduces you, first-hand, to the faces within these organisations. You'll get the inside scoop, hearing from the people doing the work and making the decisions (the movers and shakers), from key strategists and developers to CTOs and head archivists.

What to expect? Besides returning topics including R&D highlights, policy issues, recent publications, and upcoming events, each new issue of AV Insider will take a specific theme, present key players and explore their main visions, questions, experiences and the challenges in relationship to the theme at hand. Expect a journey inside technological mazes, crazy project ideas, pretty pictures, and witty insights. AV Insider offers a variety of voices from interviews to articles, and short bites that paint a picture of the people, organisations and projects that populate the AV community.

For this inaugural edition, we're taking a moment to look at what our future holds — for key archives and how their digital collections are being shaped; for budgeting digitisation projects and the challenges involved; and for opportunities and possibilities of the currently fomenting young work force. You'll get a taste of how current shifts in the domain are influencing the possibilities for tomorrow.

We believe that every new issue should be our best issue, so stay tuned!

Marius Snyders
Editor-in-Chief

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The ultimate aim has to be to create an environment where archives are seen to be a continuum, so you move from one to another seamlessly through narratives that start and end in different places and different archives."

Cover Story:
Archives on My Mind

In conversation with Tony Ageh
Controller of Archive Development at the BBC

When the BBC decided to ask Roly Keating and Tony Ageh what to do with its archive, few could have imagined how far and wide their remit would range.

Keating, a BBC high-flier and former controller of both BBC1 and BBC2, took up the newly created role as Director of Archive Content in 2008, and Ageh joined him shortly afterwards as Controller of Archive Development — "controller" is one of those BBC-specific job titles that embody its broadcast heritage, and in this case marks him out as one of the top few hundred senior managers (out of 22 thousand staff).

Tony leads the archive development team, which is, as he puts it "incredibly small — there are five or six of us, primarily focused on developing a creative strategy for the archive and exploring its potential role in the future."

After almost four years in the role, Ageh is leading the BBC's high-profile partnership with the English arts funding body Arts Council England to deliver a cloud-based digital arts service called "The Space", which will run through summer 2012. He came to the Space having spent the closing months of 2011 as a key advisor to Director-General Mark Thompson throughout the Delivering Quality First process, the tortuous strategic rethink of the BBC's services, and he continues to push his colleagues on issues like online identity, privacy and digital engagement.

Fortunately, he still has time to push forward on the Archive Development team's remit — to get the most out of the things the BBC has kept

since it was formed in 1922. Yet despite his job title, he doesn't actually "control" any aspect of the archive. That task falls to Sarah Hayes, who runs the much larger Information and Archives group (I&A), maintaining a network of over two dozen archive centres around the UK.

"I&A is a much bigger working department. It looks after the archive and makes it available to programme makers and from time to time to members of the public," says Ageh, evidently relieved that responsibility for preserving old digibeta tapes lies elsewhere.

The two groups work closely together, and he has benefitted greatly from the expertise in I&A, as he is the first to admit, "in Archive Development we spent the first couple of years being very much nurtured and looked after by I&A and they taught us many things we didn't know."

"Like other people, we made a huge number of assumptions about archives — the BBC's archive in particular — and through working with our colleagues we've come to know a lot more about the BBC's archive, and other people's archives around the rest of the UK and increasingly around the rest of the world."

One of the assumptions, still common outside the BBC, is that the BBC's archive is something like the world's biggest video rental store, packed full of much-loved TV and radio programmes — the reality is very different.

"As anyone working in the field knows, archives and libraries are fundamentally very different >

things. Most people, when they think about the BBC archive, are actually imagining a library with rows and rows of completed works that are laid out for reference or for lending. An archive like ours is something completely different," he emphasises.

In fact the archive is the BBC's corporate memory, a record of historic business practices dating back to 1922 when the British Broadcasting Company was formed, and then turned into the British Broadcasting Corporation in 1927. It is dominated by the AV archive of television and radio programmes because the BBC is a broadcaster, but in addition to television and radio there are millions of photographs, an extensive collection of classical and specialist music on vinyl and CD, the world's largest sheet music collection and a vast written archive covering programme documentation like scripts, programme files and contracts.

To the Beeb

The path to the archive has been a long one for Tony Ageh. "For the first three quarters of my professional life I was a publisher," he says. He was a founder of the publishing co-operative Brass Tacks, helped establish the football fanzine *When Saturday Comes* and was publisher of *City Limits magazine*, the now-closed rival to London listings magazine *Time Out*.

He is best-known for his work at *The Guardian* newspaper in the early 1990's where he was head of product development, launching *G2* and *The Guide* listings supplement, negotiating the short-lived tie-up with *Wired* magazine to copublish a UK edition and instigating *The Guardian's* online activities.

After *The Guardian* and a brief stint as creative director at virgin.net, an early UK ISP, he moved to UpMyStreet and then the BBC. "UpMyStreet was a local information service which aggregated as much publicly available information as it

About

Who: Tony Ageh

Where: BBC

What: Controller of Archive Development

If Tony was to tell someone to watch one video online: "It would be the Francis Bacon 'lost' interview with Julian Jebb from 1965. Julie Rowbotham, and Executive Producer of BBC, and her team were working together with The Tate on possibly the very first archive 'partnership'. The thinking was that at some point practically every artist alive during the 20th century had been either recorded or had a film or a programme made by them or about them, that were languishing in an archive somewhere. We decided to have a look in the BBC's archives to see what we could find and Julie and the teams came up with a never previously broadcast interview. It was a real find. And, I think illustrates quite well the unknown value of the nation's archives — we may have retained things for any number of reasons originally but with the passage of time entirely new value — public as well as commercial — will accrue and entirely new insights into the past will emerge." You can find it at http://www.bbc.co.uk/archive/bacon/5400.shtml.

could find against any geographic starting point, usually your post code," he recalls.

"It was started up by two very bright people, Stefan Magdalinski and Tom Loosemore, and Tom at a later point became controller of the BBC's online activities, BBCi. When I left UpMyStreet I went to the BBC to work with him on the website, looking at things like search and listings. I suppose I could have been called a **>**

kissing cousin of an information architect but I definitely am not an information architect!"

Within the BBC he is feted for the creation and delivery of the iPlayer, the BBC's online catch-up service, but he was also behind the move to give every radio and TV programme its own auto-matically generated page on the BBC website, and many would consider programmes to be more important to the long-term future of the BBC than iPlayer, since it makes structured data about every broadcast available both internally and externally.

Archives On My Mind

Ageh claims he has spent many years think-ing about archives, and that his current role is predicated on that history.

"In the early 90s I happened across a thing they now call the internet," he says, "and I introduced the idea of a sort of paperless publishing prin-ciple to *The Guardian* newspaper so we could explain to them that there was a difference between *news* and *paper*."

"We also looked very seriously at *the Guard-ian's* archives because it mattered to me that we had a system where material was published in the newspaper and then disappeared, only to be rediscovered in the future by specific researchers looking for very specific types of evidence. It struck me that there was no reason why that material should disappear forever, and I've spent a lot of time finding ways to keep it around."

He is now doing this with the full support of the BBC, and especially his colleagues in I&A. "We have a very strong positive relationship with everyone in I&A" he says. "Apart from their day job, which is to use those archives to the best advantage of the UK and programme mak-ers, the people there would love to see those archives in a much broader environment. They'd

like to see them looked after and preserved for the longest possible period of time and they'd like to see them united and joined with other archives around the UK and across the world to create much better stories and much greater links."

The BBC has not retained much of the material that was ever recorded, and it would not have even recorded much of what it has broadcast in the first place.

There is also an unexpected, and generally un-acknowledged, connection between the devel-opment of the iPlayer and Ageh's current role: "To be honest the iPlayer was the interim step towards the archives. I had a conversation with the then director of what was *new* media and is now *future* media at the BBC and it was a continuation of the themes I'd been working on since I discovered the impact — or the potential impact — of the internet."

"I'd realised that the BBC was sitting on these huge repositories of British culture and history that were unique in the sense that the sort of things contained in the BBC archives were very different from the sort of things that are typi-cally captured by large memory institutions like museums."

"We had ordinary people talking about ordinary stuff in ordinary settings, and I thought there was a growing expectation of us to unpack and redeliver that material back to the people that had not only funded it, but in many, many cases actually created it in the first place."

"The iPlayer was to be the second stage of a strategy called 'Find, Play, Share' that we had put forward in the BBC, but we started with the play part because we thought that would get greater engagement from business and from the

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audience. Now I'm working to deliver 'find' — and then we'll have a proper look at how to make the stuff sharable."

Not all AV

The first issue facing anyone wanting to preserve the BBC's holdings is figuring out what it actually has. Under his direction a team has been collating a guide to the entirety of the archive collections, including information on collection policies, storage facilities and rights issues that might arise for anyone wanting to reuse the material.

The archive is far from complete, as Ageh readily admits: "The BBC has not retained much of the material that was ever recorded, and it would not have even recorded much of what it has broadcast in the first place. Most of the things recorded were kept either because they were being held for posterity, like the 1953 Coronation, or so that it could be used as what I like to call spare parts, used to make new programmes by other programme makers later on."

Television and radio aren't considered to be as essential and as important an art form as music, literature, dance or painting. I do think it needs to be brought up to the same level of understanding and respect as other archives of creativity and culture.

"You also have to remember that for most of the years of the BBC's existence it broadcast live radio and television which is not recordable, or rather, which does not come with its own recording equipment. You have to bolt recording equipment on to the system in the first place to capture it intentionally."

He also argues, somewhat surprisingly, that the audiovisual archive is not valued as highly as it should be by others.

"I actually think AV has been treated as unspecial. Almost any other creative material or media is actually treated with a higher level of importance and value than AV archives. For example no one would ever imagine storing oil paintings in conditions that would allow them to deteriorate, and people really do appreciate the value of photographic collections."

"AV material appears to be the poor relation from my perspective, mainly because television and radio aren't considered to be as essential and as important an art form as music, literature, dance or painting. I do think it needs to be brought up to the same level of understanding and respect as other archives of creativity and culture."

Tapeless

Although most of the BBC's AV archive is still on tapes, from old D3 to digibeta, the massive Digital Media Initiative is about to deliver tapeless production within the corporation, while the outcome of the Digital Production Partnership activity should mean seamless exchange of files between production companies and broadcasters. This is an enormous opportunity for those who wish to make AV archives more available, assuming that the old material can be brought under the new digital dispensation, but it is one that worries Ageh.

"I think you do have a completely different sensibility to bring to bear when it comes to looking at the stuff that was born digital. The risk in moving to tapeless production is always that digital 'stuff' is much harder to preserve than most people imagine. At least with the tapes and papers in our archive there's a chance that, **>**

as long as nobody throws them away, you have some chance of coming back to them in thirty years and finding them still there.”

He is also worried about paying for it. “Unfortunately most people think the BBC archive is full of endless amounts of *Only Fools and Horses,* or Tony Hancock comedies, or children's programming like *Bagpuss*, or *Match of the Day*, and little else, but in fact it's almost entirely the other way around — there's hardly any of the stuff people remember, but there are lots of other things that have value in different ways.”

“Trying to communicate the value of the other stuff is the hard thing, especially if the cost of digitising it has to be offset by material where there's a short-term commercial return — of which, of course, there's hardly any.” Funding for digitisation may come from Project Barcelona [no one in the BBC can remember why it's called that – ed.], the BBC's proposed service to offer paid downloads of selected programmes, but this is some way off.

For Ageh the key to securing the future availability of the BBC's Archive lies in partnership, and most of the work of his team is focused on projects that involve working with other cultural institutions.

One reason for doing this is making it all affordable, he says. “For us to find the resources to do things at the scale we want to achieve will require us to work creatively with other organisations who have resources to do some of the things we want. We can work together to create efficiencies of scale, and we can collaborate better to make things cheaper and more doable.”

To illustrate this he points to the BBC's close partnership with the British Film Institute over the creation of a national television archive. “The BBC and the BFI both want to keep a record of British television, and we are starting to share some of our technology with the BFI so that, in principle, we could keep all the programmes in one place and share access to them.”

This doesn't mean ignoring commercial opportunities, he stresses. It just has to be done properly. “I think the opportunity to create commercial returns from archive development will have to be thought out along a number of different dimensions,” he argues. “Once you have enough material digitised you start to see opportunities for commercial exploitation and they won't all be purely for entertainment. I hope some of them will be for products and services that **>**

make a real contribution back to people's lives and broader aspirations."

The bigger goal, and one that has been endorsed at the most senior levels within the BBC, is to create a Digital Public Space where material from all public institutions can be found and used by people. As Ageh puts it, "the ultimate aim has to be to create an environment where archives are seen to be a continuum, so you move from one to another seamlessly through narratives that start and end in different places and different archives."

For Ageh the key to securing the future availability of the BBC's Archive lies in partnership.

"The British Library and the National Archives, the BBC and the National Library of Wales or Europeana (an online access point to millions of digitised objects, AV materials and records from within a growing group of European cultural and scientific institutions), may all contribute to a particular story and only by drawing them all together do you get to tell that story. And that also generates economies of scale and new commercial opportunities that wouldn't previously have existed when you look at any one institution in isolation."

It isn't just the institutions that will participate in this digital public space. Individuals have a key role in Ageh's vision of a connected world, and the BBC will help show them how.

"An organisation like the BBC is perfectly placed to take the lead in helping people to make their stuff more discoverable in the future, giving them a sense of permanence, encouraging them to think not just about putting a photograph that they've taken at the weekend up on a server or into a place where they can share it with a

friend, but thinking about how in thirty years time they might come back and wish to revisit that image. It's similar to the way that when you were a child and put your school reports away in a cardboard box, there was a sense that if ever you wanted to go back you could."

"There's a need to explain that there will be a number of things that might stop that being the case, including the fact that the software or the format you've used may be obsolete or suffer from bit rot and that you're ultimately taking responsibility yourself as an archive."

> "We're all becoming archivists now and we need to understand what it means to take responsibility for the preservation of our own material, not in isolation, but actually as part of a much broader public sphere, just as the BBC is trying to do with its archive."

It is typical of the BBC that a project to decide what to do with its accumulated archive should end up with a radical manifesto for a world in which each digital citizen looks after their personal and family archives and where the principles of digital preservation are a core part of media literacy. But the BBC has a track record for thinking big, and Ageh has delivered this sort of significant shift in the past. He clearly stands a very good chance of doing so again.

And who should be interviewed next? "I'd like to pass the baton to the absolutely wonderful, insightful and modest Marion Hewitt at the North West Film Archive" Tony says. "She continues to do pioneering work as both an archivist and a tutor at Manchester University. An unsung hero." ■ **BT**

Looking to a Digital Future

In conversation with Anne Van Camp
Director of the Archives, Smithsonian Institution

The Smithsonian is a giant institution. It's not actually a museum in the conventional sense — it is, in fact, the largest museum and research complex in the world. Affectionately known across the U.S. as "the nation's attic," the Smithsonian is comprised of 19 museums and galleries which altogether hold more than 137 million items in its vast collections. Many are well-known destinations on the National Mall in Washington DC, such as the Air and Space Museum, the Museum of American History, and the National Museum of the American Indian, each attracting thousands of visitors daily.

A quasi-governmental entity, the Smithsonian also runs Washington DC's highly popular National Zoo, and operates nine scientific research centres in several countries studying astrophysics, marine conservation, tropical research, and the environment. In addition, it works with 168 affiliate museums throughout the United States and abroad.

Ready for the Challenge

Anne Van Camp joined this massive enterprise in 2007 as the Director of the Smithsonian Institution Archives. Was she intimidated? Not at all. During a period when archives and museums were being rapidly transformed, Anne was exceptionally prepared for tackling the huge challenges waiting for her at the Smithsonian. "I had a long, strong background with many different kinds of archives, but coming to the Smithsonian was a Mecca for me," she said. "It brought together all my interests — museums, libraries and archives, because it was all of these things." She hasn't been disappointed, either. "It's such a huge institution with so many hidden treasures, I learn something new every day."

With Bachelors and Masters degrees in Library Science from the University of Cincinnati, Anne's first professional position was working for David Rockefeller at the Chase Manhattan Corporate Archives in New York City. It was there she was first exposed to the imminent impact of technology on archive records, and readily saw and embraced the implications. "Over time, I was managing the Chase library and technological data purchasing, and being in a business environment, it was a lot further advanced than if I had been in academia. This was the first time I understood what it meant to work with lots of different kinds of technology, back when you needed a dedicated computer terminal for every different task you were doing," she chuckled, remembering the workstations.

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"We've built up quite a community across the institution now of 'digi-savvy' staffers who understand the whole process and are focused on standards for managing data so it can work and play well with other data. It's beginning to be a real support group working together."

From the corporate world, she moved to academia as Director of Archives at the Hoover Institution on War, Revolution, and Peace, a think tank dedicated to research in domestic policy and international affairs on the campus of Stanford University in California. At the Hoover Institute, Anne encountered another technology issue as an archivist: trying to record history as it was happening. "Technology was playing a big role in many of the revolutionary events unfolding around the world, and I was there at the very first burgeoning of uncontrolled online communication." She recalled, that one day shortly after she arrived, she got a call from someone who said she had to turn the video on and to get the video rolling immediately because the Berlin Wall was coming down. "I thought it was a joke, but it wasn't, it was the first time we could watch this amazing historical event in real time, and capture the scene ourselves." After that the Soviet Union collapsed, and it was a real frenzy, as Anne recalled, to capture it all so it could become part of the ongoing collection.

But that was not the only technology-based new challenge Anne had to solve as she watched current events become history. Another story she tells relates to the unprecedented protests in Tiananmen Square in 1989. "During the protests, it was the first time we really saw 'viral information,' as volumes of email, electronic messaging were coming out of China from local people trying to let outsiders know what was going on. There was someone at Hoover who was fascinated by this, and she was printing out everything coming across the internet in order to save it."

"I realised this is something we had to think about — how are we going to deal with this kind of electronic information? But there were no tools in place at the time to effectively save or organise emails like that. My vision was to make that extraordinary collection more known and accessible to scholars because it was so rich. It was a real eye-opener, because I began to see we had to figure out an effective way to deal with this massive amount of information being generated digitally so we could make sense of it over time. Experiencing those momentous events while I was at the Hoover Institute still haunts me today, and seeing that history put in context by the power of technology that created, captured and disseminated information was a real nexus."

Anne left the Hoover Institute to work for the Research Libraries Group (RLG), a consortium of 150 research libraries and similar institutions organised to share advanced research and development in technology, cataloguing systems, metadata management and related services. At RLG she worked with libraries, museums and archives all over the world helping them develop systems to make their collections accessible, such as creating online catalogues.

It was another effort to fit new technology into the archives environment, she explained. "We were at the point where people were starting to demand help for planning how to digitise their collections to put them on the internet, and I could see the whole landscape of cultural institutions, big and little, here and overseas, grappling with the very same issues. Problems relating to digitising media collections were especially on the rise, such as functional asset management tools and appropriate metadata standards. Our job was to help them come up with solutions that would work for diverse users through collaborations and by sharing their experiences."

It was this accumulation of leading-edge experience in the field that made her ready for the Smithsonian. "I thought, maybe this is another leap for me, to help this organisation come to grips with providing access to these amazing collections, tying them together, helping to preserve all this digital information that is becoming such a huge issue for the cultural heritage sector everywhere."

Directing the Smithsonian Institution Archives

Not part of any individual museum or other Smithsonian unit, the Smithsonian Institution Archives are an entity unto themselves. In the earliest organising documents of the Institution, the importance of maintaining archival records was explicitly mentioned, and the Archives' mission is to document the activities of the entire Smithsonian, all museums, galleries, research facilities and the National Zoological Park, to benefit the institutional pursuit of increasing knowledge and learning, and making it available to everyone.

The Archives is involved with appraising, acquiring and preserving the records of the Institution; >

About

Who: Anne Van Camp

Where: Smithsonian Institution

What: Director of the Archives

What video do you think readers should definitely check out? "The exhibit Art of Video Games currently on display at the American Art Museum on the National Mall in Washington DC, was controversial from the start because it recognised video games as an art form. But then they did a bold thing by inviting the public to vote on a list of games posted online, and included the 40 most popular selections. The exhibit has just been huge and has brought people into the museum who never, ever would have gone into an art museum. It shows how much the museum experience can change to reach new audiences and new learners — and it's also been really fun." You can check out videos from the exhibition here: http://americanart.si.edu/exhibitions/archive/2012/games/artists/.

providing research and reference services to the public; offering guidance on record-keeping best practices; promoting services that broaden understanding the history and culture of the Smithsonian; and providing professional archival and conservation expertise to the Institution as a whole.

It holds approximately 46,800 feet of paper records and nearly 3 million photographic images, and the collections include official records of the Smithsonian; personal papers of individuals associated with the Smithsonian; oral and video histories; and other special materials as well as materials documenting the history of American museums, science, technol-

ogy, art and cultural development. Anne supervises two-dozen staff, and has found one of her key responsibilities to be providing leadership across the Institution to promote greater public involvement with the Smithsonian through access to the collections. "We are the official archive for the whole institution, but we also provide advice on various kinds of preservation to the units across the board. There is a lot of expertise on my staff, particularly with audio and visual materials, and in addition to advice we offer equipment, guidance, and training on how to preserve digital materials as well as paper and other materials. We cover the gamut."

But the advice was not always welcome, and it wasn't long before she realised that collaboration was not part of the institutional culture. "Because I'd been working at RLG, my focus was on collaboration and getting people working together across institutional divisions. When I got here, I found many of the units were working in silos and had no interaction with each other." Fortunately, over the last several years, new leadership has come to the Institution with needed changes. Now Anne notes "you can see a much stronger willingness to try to collaborate on all kinds of things, like collections, digitisation, and exhibitions. It's a marked improvement."

Stabilisation is a big issue, so we're trying to get a better sense of how quickly can we digitise our video collections and at least get them into stable storage conditions.

Right away, she was drawn into most of the planning activities designed for the Institution system-wide, such as the *Strategic Plan to Create the Digital Smithsonian,* released a year ago. This ambitious document outlines a five-year framework for digitising the Smithsonian's **>**

vast collections, rooted in the goals of *Broadening Access, Preserving Collections, Supporting Education*, and *Enriching Content*.

According to Anne, Secretary Wayne Clough (current head of the Institution) is very focused on making sure the collections become more accessible to the public. "He's been talking about the 'digital Smithsonian' since he's been here, and he makes a lot of statements about wanting to digitise everything. Although we know that that won't happen, it is still an important aspiration."

"This isn't one of those plans that just lands on people's desk, they're using it as a way to talk in a more common language. And from the plan we've created a new digital programme office, which is shaping plans for digitisation, such as assessing how much of an object collection can be digitised given our current resources, and creating useable guidelines and policies when people begin thinking about digitisation." "We've built up quite a community across the institution now of 'digi-savvy' staffers who understand the whole process and are focused on

standards for managing data so it can work and play well with other data. It's beginning to be a real support group working together."

As for actual digitising, Anne thinks progress at the institution has been slow. "The vastly different materials we have throughout the museums and collections live all over the place, and there's been very little measuring or baseline surveying to locate them in preparation for preservation. However, we do know that there are large volumes of videotape in all the museums and collections, and also audio in every format that exists. These are becoming endangered themselves, and we are very concerned about how quickly the video might disappear. Stabilisation is a big issue, so we're trying to get a better sense of how quickly can we digitise our video collections and at least get them into stable storage conditions."

"Needless to say, it's a really big job. Even with our expertise and equipment, it's a pretty small scale when you think about the thousands and thousands of videotapes out there." **>**

Smithsonian Institution Archives

"At least we are creating some workflows and guidelines on how this should be done" she says, "so if staff at any individual unit of the Institution gets some money for digitising, we can give them guidance on how to do it. But preserving the media held by the Smithsonian is a huge project that's going to be with us for a long time."

Big Success with Social Media

While these steps are building momentum inside the Institution for coordinated digitising efforts, Anne is very enthusiastic about using social media. "Our ability to measure public satisfaction with an online exhibition is still pretty nascent, but our leap to social media has been really successful. What we're seeing now is that people really want interaction with the information and objects in the museum, and with the people here."

"For example, when I first came in, the Smithsonian Archives didn't have a very good website and we weren't doing anything that was engaging our public in any way. Now we have the most active blog here, and people across the Institution are jumping on the bandwagon. I think we have over five hundred social media sites coming out of the Smithsonian — blogs, games, Twitter accounts, online interactions, it's astonishing."

"And we were very early on Flickr Commons. The first collection we put out was a set of old photographic portraits of scientists. The response was amazing — we got thousands of people swarming on the site right away, and within days somebody had taken the photos and tried to link them with their biographies on Wikipedia. That was something we would never have paid anyone to do, but the public did it for us! It was very exciting and we have gotten a tremendous amount of public good will. For me, it's also a really rewarding thing to do."

"When we first went on Flickr, there was a lot of anxiety among the staff to protect our brand. But we said 'let's just start small and see what happens' and now, it's been so successful most of that fear has been overcome."

"On an entirely different level, our CIO has done something quite remarkable. Each museum here has its own data management system, so there were twenty different collection and catalogue systems in place. Our CIO figured out a way to network all of them, so you can do a central query against all the databases and produce a unified search. Anyone can do a query from the Collections Search Center on the main SI site, and it will draw results from all catalogues across the entire Institution plus deliver images if there are any associated with that search. It's brilliant, and I think it's going to be a real model."

The Smithsonian Looks to the Digital Future

Having her career move along the crest of the ever-advancing digital wave, Anne is ready for more of the same. From her current view, she is convinced that cultural heritage institutions can finally find some appropriate tools to manage and control their digital collections, in part because large institutions like SI have been testing the waters to make them safe.

"The ability to create more digital stuff is not slowing down, not at all. I want to find better ways to make our collections more interactive and more accessible to people so they will make an impact. I truly think we are on the verge of igniting this whole notion of the 'Digital Smithsonian,' which is just beginning to blossom. We are definitely on the right track, and there's a sense of excitement around here. I'm very hopeful in our ability to take our message out to the public, who really want to help us on this journey. And at the Smithsonian, it will never end." ■ **NR**

Training for the Future of Audiovisual Preservation I

Preservation and Presentation of the Moving Image at the University of Amsterdam
By Julia Noordegraaf

Twenty-five years ago the archiving of film, broadcast materials and other time-based media objects was taught on the job, by media producers-turned-archivists or historians, archivists and librarians with an interest in audiovisual media. Since then, a lot has changed: a rough survey from 2008 yielded a list of ten fulltime BA and MA degree programmes in audiovisual archiving, at least seven specialised courses, and at least thirteen institutions offering professional or postgraduate training. During the same period, the emergence of digital technology deeply impacted both the production and archiving of audiovisual media. How has that affected the practice of training future AV professionals?

The Preservation and Presentation of the Moving Image programme (P&P)[i] at the University of Amsterdam is a one and a half year intensive professional MA programme focused on the combination of theory and practice. Taught in English, the programme provides a diverse international student body with the knowledge and skills to archive audiovisual material (film, video, digital media) in an institutional context and to present such work to an audience. Students spend the first year acquiring critical knowledge and skills which are put into practice during a preliminary internship, and then a longer project-based internship running 4 months in the second year.

At its core, the programme highlights the role of preserving and presenting moving images as key activities of archives, film museums, festivals, distributors, broadcasting companies and major film studios, cooperating with various local and regional audiovisual institutes. Archives and festival organisers not only work closely with and supervise student interns, but are also in charge of some of the academic modules, contributing with a professional background through experience and on-site classes, to the development of an effective curriculum. The internship programme has brought students to a variety of international organisations and institutions ranging in size and scope including the Deutsches Filmmuseum in Frankfurt, Cinemateca Portuguese, Eye Film Institute, BBC Information & Archives, British Museum, Stedelijk Museum Amsterdam, the Netherlands Media Art Institute, Visual History Archive South Africa, Witness in New York, and the International Criminal Tribunal for the Former Yugoslavia. The shift towards digital workflows and on-

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Twenty-five years ago the archiving of film, broadcast materials and other time-based media objects was taught on the job, by media producers-turned-archivists or historians, archivists and librarians with an interest in audiovisual media.

line access and reuse in the field is reflected in students' interests. Although many are still very much fascinated by the romanticism of analogue film archiving and programming, their major concern is to make this heritage accessible and comprehensible for as many people as possible. The use of digital media to create online access to audiovisual heritage is one of their principal fields of interest. The increased availability of audiovisual archival material online also raises new questions, such as how

Shot of the P&P Blog, found at:
http://2012.curatingthemovingimage.org

to ensure that the content is kept contextually meaningful. Online audiovisual heritage can be viewed and heard, downloaded, remixed and linked to a wealth of other online data. As Steve Rosenbaum argues,[ii] the sheer size of data, tweets, blogs, check-ins and media on the web create a need for a new type of professional, the content curator: an arbiter of taste who, on the basis of professional training, is able to act as a filter-feeder of meaningful content. So after a phase of large-scale digitisation of audiovisual heritage, what we now need are people with the editorial skills to provide these records with reliable contextual information and to connect them through meaningful links. It is my expectation that in 10 years time, these skills will have moved even further to the core of the training programmes, using new digital tools to create flexible but thoroughly contextualised presentations of audiovisual heritage.

In order to meet these new challenges, in Amsterdam we recently redesigned the curriculum of the programme. The new core courses are no longer organised by the type of archive but by stages in the archival process: courses on archiving and exhibiting film, broadcasting materials and media art have thus been replaced by new ones on collection and collection management, preservation and restoration and access and reuse. This better reflects the reality of the workflows in digital archives, where the role and place of the original carrier has become of secondary importance and where the processes of collecting, preserving, contextualizing and making accessible are increasingly intertwined. At the same time, we do address the different cultures >

of archiving and exhibition in film archives, broadcasting archives and mixed media collections and discuss how certain solutions, such as the mass digitisation in broadcasting archives with their huge collections and entirely digital workflows might not work in a museum setting with a small collection of highly diverse media artworks, or why it is sometimes crucial to screen film as film.

After a phase of large-scale digitisation of audiovisual heritage, what we now need are people with the editorial skills to provide these records with reliable contextual information and to connect them through meaningful links.

While already focused on practical training through the internship programme, the Amsterdam curriculum also increased the level of hands-on experience, by providing extra workshops in identifying digital formats and media, handling different types of analogue carriers and playback equipment, and introducing a new, intensive four-week workshop in media art conservation and restoration. In the latter, students work in groups to research, analyse and install a particular time-based media installation artwork. The fact that artists use a wide variety of audiovisual media and digital technologies in an often reflexive way allows students to get intimately acquainted with all dimensions of audiovisual preservation. The workshop also integrates coursework with research in the conservation of computer-based art. In addition, students are offered hands-on experience with the contextualisation of AV heritage by creating a presentation in the form of a gallery exhibition, film program or contribution to our online blog Curating The Moving Image. [iii] Finally, during their extended, four-month internship students will follow an online course in which they learn to translate their theoretical knowledge and practical skills into the writing of funding proposals for preservation or access projects.

While the financial crisis affects audiovisual archiving and preservation all over the world, Europe might not be the worst place for future curators of the moving image. Large-scale AV digitisation projects, worth several hundreds of million Euros, ongoing in the Netherlands and recently announced for France, provide many new jobs for AV specialists, including analogue and digital film technicians, restoration and digitisation coordinators, analogue and digital media restorers, educators, researchers and access project workers. ■

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i.   http://www.studeren.uva.nl/ma_preservation_presentation_moving_image/
ii.   http://curationnation.org/
iii. http://2012.curatingthemovingimage.org/

Preservation Panorama

Training for the Future of Audiovisual Preservation II

Moving Image Archiving and Preservation at NYU
By Howard Besser

New York University's Moving Image Archiving and Preservation Program (MIAP)[i] is an interdisciplinary two-year Masters Degree that provides an international, comprehensive education in the theories, methods, and practices of moving image archiving and preservation. The programme is designed to prepare graduates to enter a variety of cultural institutions (libraries, museums, archives, historical societies, arts organisations), as well as other more commercial entities. All students must take an identical set of 16 courses which together cover all aspects of moving image archiving and preservation including: Film and Television History/Historiography; Conservation, Preservation and Collection Management; Legal Issues and Copyright; Film/Video Laboratory Techniques; Moving Image Cataloging and Metadata; Curatorial Issues and Public Programming; New Media and Multimedia Preservation; Digital Preservation and Digital Repositories, and Reference/Access. The original curriculum was designed in 2002-2003, and the first cohort of students was admitted in Fall 2003 and graduated in Spring 2005. MIAP is graduating its eighth cohort in Spring 2012.

MIAP is designed to train and educate students to address the challenges of film, video and digital preservation by combining theory with practice. In most courses students learn theory and concepts through lectures and readings, then apply these concepts to concrete situations in the form of projects. So, for example, under the direction of an instructor, a student will work with a curator or conservator to design and carry out an assessment of one particular collection that is a high priority for that institution. As another example, a student would research and document a particular encoding format such as QuickTime 3 (noting its time period, field and header information, existing repositories of software to view encoded files, etc.), and would contribute that documentation to the field as a whole.

> Because of continuing rapid changes to the digital environment, professionals need to regularly re-evaluate how things are done, and need to be constantly adapting to new technologies, tools, and methods.

In addition to the coursework and a thesis project, all MIAP students must complete three intensive internships in three different types of institutions. The diverse internship program gives each student experience with multiple repositories, each having a different organisational culture and different approaches to archiving and preservation.

The programme emphasises lifelong learning. Because of continuing rapid changes to the digital environment, professionals need to

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regularly re-evaluate how things are done, and need to be constantly adapting to new technologies, tools, and methods. This is why the curriculum puts such emphasis on using the latest knowledge and methods to examine issues in holistic ways (instead of automatically continuing on a path that may lead to a dead end), and this is why MIAP graduates actively take part in listserv discussions over the latest issues, organise and participate in "skill-shares" and other forms of continuing education, and view learning as a never-ending activity.

All non-laboratory MIAP courses (Copyright, Access, Collection Management, Curating, etc.) integrate teaching about both analogue and digital media, and student projects for these classes deal with both analogue and digital works. MIAP's two laboratory courses on Video Preservation deal extensively with the technical aspects of analogue, born-digital, and digitising. Second year MIAP students take two laboratory classes focused exclusively on digital: Digital Preservation, which focuses on a large corpi of digital works which can be handled in somewhat automated ways (as one would likely find in a broadcasting organisation or library); and Handling Complex Media, which focuses on boutique methods where each digital work needs to be individually analysed (as in

a museum's collection of net art, video games, etc.). Both digital lab courses teach tools for file type verification and extracting metadata. The Digital Preservation class puts more emphasis on repository management (OAIS, PREMIS, Fedora/DSpace, TRAC/Drambura, AIP transformations, etc.) and on practices such as web archiving and personal archiving. The Handling Complex Media class places more emphasis on artist interviews, the Variable Media questionnaire, and other methods for determining which elements of a work need to be most highly protected against technological change.

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What makes a good professional in this field is not merely learning a particular skill or tool, but learning why to use it, and how to figure out when you might want to use something else.

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When the MIAP curriculum was designed in 2002, it was clear that digital technology would continue to reshape audiovisual archiving and preservation practices for many years to come, and support for those kinds of changes were incorporated within the curriculum. From the beginning, the programme has taught theories and concepts (such as how to think through an organisational scheme for your collection) alongside practices (such as following AMIM cataloguing rules), but always indicating that a practice is transitory — what we use this year may be replaced with a different practice next year. What makes a good professional in this field is not merely learning a particular skill or tool, but learning why to use it, and how to figure out when you might want to use something else. Skills and tools are most useful when they are taught as specific examples of how to address a larger problem. It is this that makes the learning experience last longer than a particular skill or tool. **>**

Situation room at MIAP

Skills and tools are most useful when they are taught as specific examples of how to address a larger problem. It is this that makes the learning experience last longer than a particular skill or tool.

Because of this approach, MIAP has had few major course revisions. Classes regularly revise the toolsets taught, but have only had to make minor adjustments in the concepts and theories. Recommendations coming from regular evaluation internally and externally have led to the following changes: replacing one of the original four intensive internships with a first semester skill-building course; changing the order of some courses; doubling the number of hours for the copyright class; adding a second semester of video preservation.

Students are interested and excited by project-based, hands-on learning. MIAP advocates this approach and has student projects helping organisations (Museum of Modern Art, Guggenheim, Anthology Film Archive, Paper Tiger Television, etc.) or well-known individuals (David Byrne, Laurie Anderson, Barney Rosset, George Stoney, etc.). With diverse interests, students are also attracted to the flexibility of project topics that they can pursue if tied to a course; this year more than half a dozen students found ways to

engage with different important projects related to archiving media from the Occupy Movement.[ii]

A few MIAP graduates go on to work in large relatively wealthy media organisations where they are one of many people involved in archiving or preservation. But most graduates go to work in non-profit organisations where they have a wide range of tasks because they are the primary staff member involved in media archiving/preservation. For some of these organisations, the MIAP graduate is the primary technical person dealing with digital media archiving/preservation. A number of MIAP graduates work fulltime for consulting firms. Still other MIAP graduates have conceptualised, developed, and found funding for large-scale entrepreneurial projects. ■

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i.   http://www.nyu.edu/tisch/preservation/
ii. http://activist-archivists.org/wp/?page_id=574

# Keeping Audiovisual Content Alive ...Presto Please!

Digital preservation of audiovisual media is a long-term problem, and a comparatively new one. While archiving is a very ancient activity based on well-established methods, digital archiving is new and presents a major challenge when decisions and technical solutions have to be defined. Knowing what to do is the main challenge archives have to address. Most AV content owners outside a small group of large specialist archives are still without roadmaps, strategy or tools for their long-term digital preservation. As a result, content owners make choices based on expedience (or cost) and hope for the best in the form of possible future technical improvements.

To change this situation, the five largest audiovisual and broadcast archives in Europe have joined up to promote and transfer their experience with digitisation actions and digital preservation technology towards other stakeholders in the world. These archives sit at the heart of the media creation and distribution industry and have excellent access to current technology (often leading the state of the art). As all of their productions become available online on demand, and as archives become fully digital, they have become engaged in the digital preservation of several million hours of file-based content, representing roughly 100 Petabytes of storage. They have launched PrestoCentre (not referring to Pixar's short film magician but to "Preservation Technology") as a distributed effort, collaborating with various partnering organisations, to bring together and encourage stakeholders within the audiovisual digitisation and digital preservation communities to share, work and learn together. It reaches to all stakeholders, both on the user side and technology supply side, by involving communities of practice that have significant needs but are currently on the margins of digital preservation, and by encouraging technology providers to get involved in long-term preservation.

PrestoCentre is a non-profit Foundation (established in December 2011), with a remit to generate financial resources to carry out its objectives. It will take care of long-term operations of PrestoCentre and represent the voice of its members in deliberations with policy makers and industry. Membership is open for organisations across all user communities of practice, including broadcast archives, sound and film archives, national libraries and archives, museums, regional archives, subject-specific archives and special collections, educational institutions, corporate archives, production companies and studios, filmmakers and independent producers, research organisations, commercial providers, as well as funding bodies, standards organisations, and other organisations concerned with audiovisual archiving.

There are three different levels of membership (at different annual subscription rates): a top level of full membership, to meet the service requirements of major specialist institutions dedicated to audiovisual preservation; a second level of full membership for other archives, film and video producers, libraries or museums; and an associate level for research organisations, standards organisations et cetera. There is also a commercial category for service providers,

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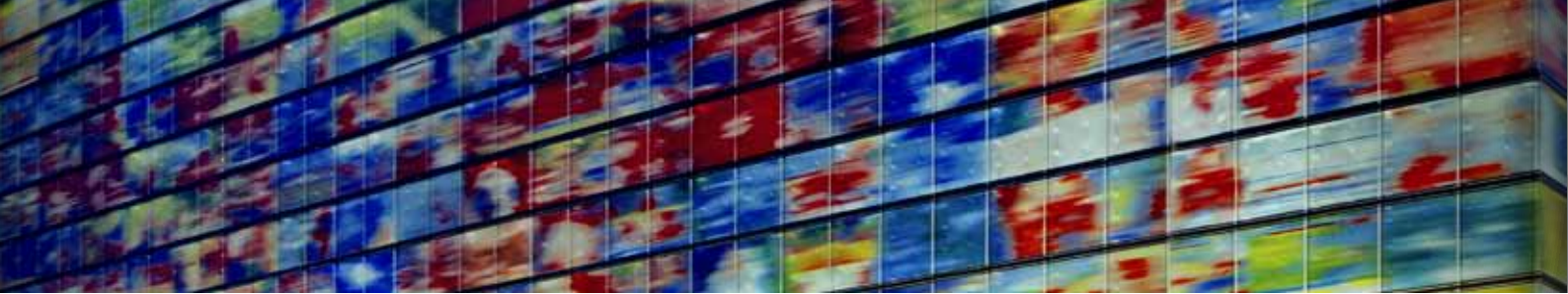
vendors, manufacturers and system integrators. Organisational membership runs on a 12-month cycle, with the fee paid annually. New members receive an introductory discount of 50% for their first subscription year.

PrestoCentre membership will stretch the scope and knowledge of archives and anyone interested in digital audiovisual media preservation, tapping the large pool of preservation research, knowledge and expertise within and around PrestoCentre, and making the connection with key players worldwide. PrestoCentre also guarantees the connection with professional associations working with similar objectives, to prevent duplication of effort and build valuable transfer networks.

As the new kid on the archive block — albeit one embedded in a major audiovisual centre, with Europe's leading audiovisual archives as founding members — PrestoCentre is creating a range of products and services for digitisation and digital preservation that differentiate it from the various associations that serve the traditional archive communities. It has a dedicated team of volunteers who cull together valuable resources and prepare new member services that promote the professional connection between the key players. The magazine at hand is one of

the results. Examples of other services already available are the library (offering a significant number of free and member-only information sources helping the AV community face their digitisation and preservation challenges) and a registry where commercial providers will be able to describe, in detail, their actions and activities and receive an official fact-check by PrestoCentre, so member archives are able to assess if a provider seems like the right fit for their needs. The act of bringing together member archives and commercial providers in this way continues to help forge trustworthy and reliable relationhips and services.

Many of PrestoCentre's activities will be considerably enhanced in the near future. In particular our focus on outreach, leverage and knowledge exchange will be attractive to smaller archives, organisations outside the broadcast centre, and technology suppliers. The increase of PrestoCentre's membership will support this, as well as the long-term maintenance of its future products and services. ■ **RSM**

The Insitute for Sound and Vision in the Netherlands is the host of PrestoCentre. The Institute's building was conceived as a perfect cube, half of it buried underground, and houses the national audiovisual archive, its offices and museum. Wrapped in a blur of images, the building conveys the notion of the daily bombardment from television, movies and the internet.

Budgeting for a Digitisation Project: There be Dragons...

Budgeting for digitisation projects can be like trying to do budgeting for a construction project during a time of economic upheaval. We do know the tools and services we need, but the price for them will be different tomorrow. Does it make sense to wait for lower prices? Maybe. Or does it make sense to act now? Hard to say.

Good information about digitisation and preservation costs is crucial for archives as we are in transition. What archives can and are collecting is changing, how we preserve material is changing, how we catalogue is changing, and the public expectations we have to meet are getting more demanding: our tapes, films, and other recordings are moving to digital formats — partly because production has changed, but also as a part of mass digitisation projects. These mass digitisation projects are now underway all over the world, in both commercial and non-commercial settings, but for the most part, they are still custom engineered. And the rest of us are still in the very early stages of digitisa-

tion. While mass digitisation has truly arrived for books and documents, the same is not the case for audio, video, and film. As a result, there is a lack of actual data about costs. Though certain IT cost estimates, such as storage, might seem easier to arrive at, there are in fact remarkable differences between systems in their performance. And such uncertainties have to be factored into any budget forecast.

To help us gain insight into the costs for digitisation, many different cost models are at our disposal. Actually, millions of dollars have been spent developing these models. They have been developed by very skilled academics, vendors and custodial institutions. Unfortunately, to account for every possible line item, these models get really really complex and they don't make it any clearer how much they can reduce uncertainty. There are simply so many moving parts interacting together in a digitisation project that we cannot plainly compare apples to apples.

Thus, most of the cost models developed so far have

problems: they may require assumptions that are difficult to justify, or data that archives don't yet have. They may involve a level of complexity that makes them unwieldy for any sort of practical budgeting, or in the case of models developed for research data or more generic archival settings, they lack understanding of the special requirements associated with AV. The shortcomings in the existing cost models make it difficult for archives to begin thinking clearly about business models.

On top of that, digitisation brings a variety of associated costs that are difficult to measure and compare effectively. For example, digitisation is often bound up with new cataloguing efforts, or with new access infrastructure. As one manager in a very large institution put it, "we won't really understand costs for another five years — today, it's really easy to spend about 10 million Dollars before you even find out you're wrong about something." While it is beyond the scope of this article, it's important to note that digitisation is also bound ﹥
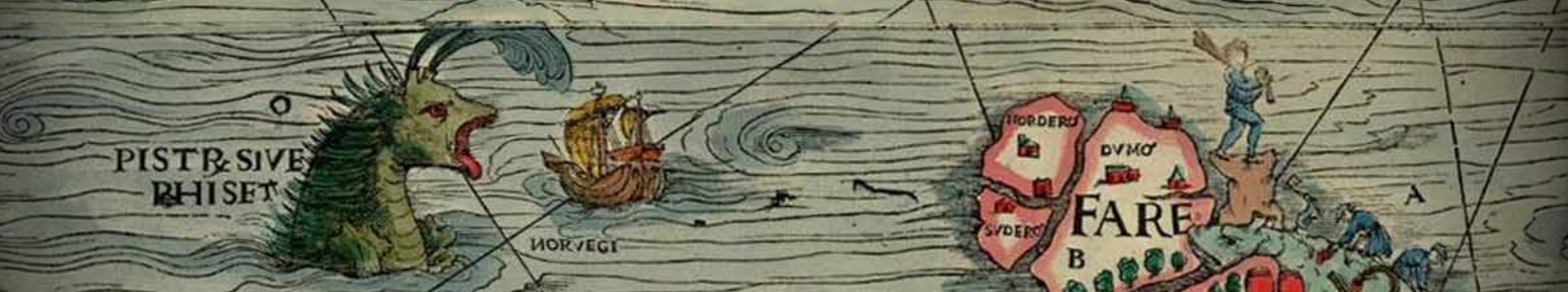
up with a lot of organisational changes. The skills associated with IT operations are different from those typical inside most archives. Even in broadcast archives known for their engineering excellence, digitisation brings completely new requirements in hiring and staffing. And good IT staff tend to be expensive!

Unlike the fully established cost models, what a lot of us would like is simple models that make it possible for our institutions, our funders and others to make wise decisions. Sometimes rough estimates are just what is needed to jumpstart a funding proposal, or to make initial decisions about how to apply funds in hand. Simpler models for cost estimation typically converge on particular measurements such as cost per hour, cost per item, cost per terabyte, or rules of thumb (like: so many hours to clean a tape). Another approach to quick and dirty estimating is to rely on the rough ratios between different cost areas. For example, for mass digitisation projects, ingest typically accounts for over one half of total costs, while storage accounts for roughly a quarter or less of total costs.

The downside to these kinds of quick and dirty approaches is that they only work well when there is good data from comparable projects. And it turns out that these are hard to get.

While you'd think that enough digitisation projects have been done to have some maps of the territory, we don't yet have things to scale. It's like the early maps of the world: we don't see all the land, we've got a couple of areas marked "here be dragons."

Using simple estimates can therefore go very wrong, not the least because digitisation projects commonly run into unexpected costs. For example, a small increase in the number of exceptions in the way a set of materials is being digitised — often due to surprising inconsistencies in material condition, or metadata quality — can result in backlogs that are expensive to clear, and which put project schedules at risk.

Given the rapid changes now happening in digitisation projects, these findings open a number of areas for future work. Clearly, there is a need for better cost data, not only to improve the complex cost models, but to help funders, and small and medium-sized archives and digitisation projects create rough estimates. There is also a need to account for the wide variability in cost data that has been reported. A systematic

approach to collecting these data on an ongoing basis has tremendous value. It could help us all understand what things really cost, how those costs are changing over time, how best to negotiate with vendors and service providers, and how our peers think about the problems we all share.

Another challenge is the issue of long-term storage costs, because many digitisation projects are funded on a one-time basis. For example, if you get a one-time grant to digitise one of your collections, how do you price in your digital storage? The ability to shift between annual and one-time costs is critical. In other words, archives need to be able to tell funders what a one-time payment might be to preserve a given amount of digital material, and to be able to buy "pay once" services from a variety of different service providers. We are seeing some movement in this area and we will continue to report to you on that. ■ **MS**

Keep Talking!

Visit us online: www.prestocentre.org
Email us: office@prestocentre.org
Tweet: @prestocentre
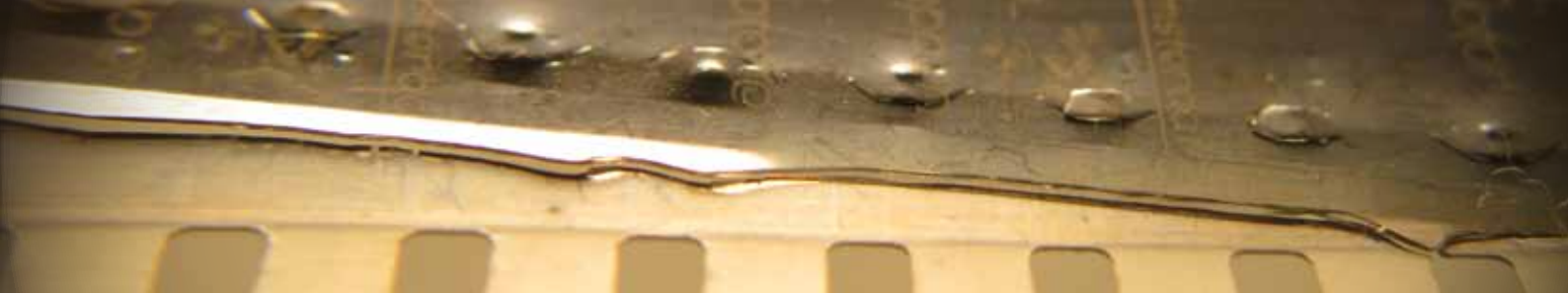
Better Film Scanning through Science

Film digitisation efforts are at full steam. Archives are transferring their treasures from cans to files while the cinema industries are converting their entire production chains to an environment without reels of celluloid, relying more and more on digital formats to capture real life or animated events.

At the Netherlands Institute for Sound and Vision, Erwin Verbruggen and his colleagues started their film-to-data scanning trajectory in 2009, restoring, preserving, digitising and making accessible 22,086 hours of film. Seeing film scanning primarily as a preservation tool, one of the questions they asked themselves was for how much longer will the equipment used in post-production facilities stay around once the cinema industry stops making use of film as a carrier — a looming possibility that was discussed in the recent Digital Agenda for the European Film Heritage's Report *Challenges of the Digital Era for Film Heritage Institutions*[i] and in a Sound and Vision produced white paper.[ii]

Given the resources that archives have, the time constraints posed by project bounds and the lifetime of some of the carriers in their vaults, and the wish to scan these vulnerable assets only once to keep them for all posterity, what file format, what budget, and what storage capacity would be appropriate?

Many real-life proposals have been made, and work is ongoing to propose valid alternatives or new standards to complement what currently is at the disposal of archives and post-production

houses. The SMPTE Technology Committee for instance, is working on a file exchange proposal named APD/ADX — the Academy Printing Density — which is an optical printing density metric suitable for use with motion picture colour negative and inter-negative films.

In Europe, a number of developers are making progress in a different direction. Last year, Erwin's institute joined a European research project CineXPRES, in which audio specialists and digital cinema experts come together to propose a radically different film scanning workflow. The project, bringing together world class digitisation experts, has the potential of creating outcomes that are beneficial for the entire film scanning industry. Doremi is an international forerunner of digital cinema, with a keen interest in allowing standards that have the universality and quality of the various film formats produced throughout history. Cube-Tec provides restoration workflows for audio and video and can adapt its knowledge of film materials to film carriers.

The basic proposition of CineXPRES is to model the transfer steps of film scanning in a scientific approach to quality assessment; to develop open standards for the efficient recording of source elements and the description of degradation aspects; and to support a highly automated restoration workflow with recorded models. By identifying and physically describing the film's degradations (including the consequences of digitisation itself) a film digitisation project's outcomes will consist of a complete mathematical

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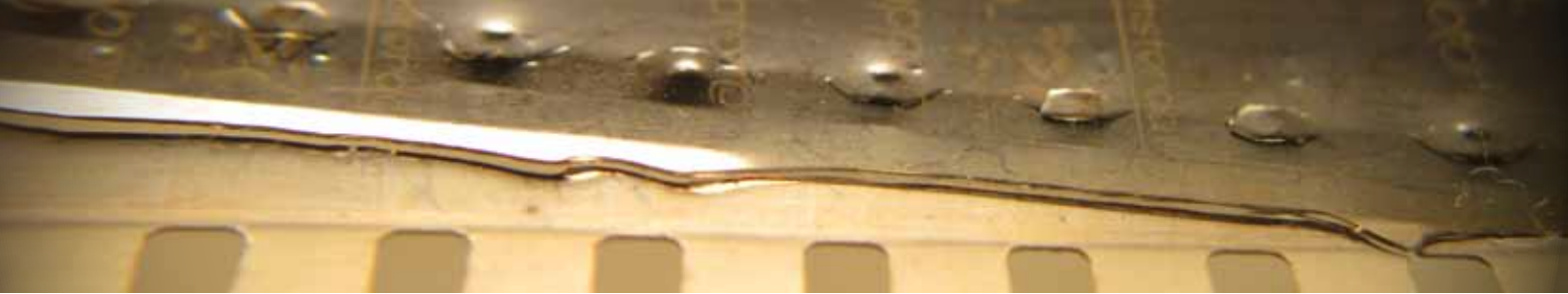
model of degradations. Making use of a floating point pixel format, the digitisation stage follows a precise high quality scheme, whereby coding preserves the highest quality.[iii] By carefully choosing the models, restoration is anticipated but not performed at the digitisation stage, turning out a higher level of automation and allowing for an objective quality assessment on the digitised content, independently of any display consideration.

The purpose of such schema is to expand the scope of what is currently possible in terms of quality, in terms of digitisation budgets and in the scope of information gathering for preserving all of the original information in the most objective way possible. This should allow for international interchanges of files and versions, so that different labs and different archives can cooperate on digitisation projects, or on restorations based on differing versions, without shipping vulnerable carriers out. A fully objective digitisation stage allows for multiple restoration

options at a different time.
In its current state, CineXPRES is assembling the widest range of real-world examples of film formats and degradation examples. Through PrestoCentre, it maintains a Film Scanning Interest Group to discuss film scanning workflow properties, ingenuities and discordances, and to exchange thoughts and visions about the limits and possibilities of archival film digitisation: http:www.prestocentre.org/cinexpres. ■ **RSM**

i.   http://www.dae-filmheritage.eu/final-study.html
ii.   http://www.prestocentre.org/library/resources/film-scan
      ning-considerations
iii. As discussed by François Helt at the 2011 SMPTE conference.

Erwin Verburggen

Research & Development

Reading Room

Tutorial: Planning your preservation project

Richard Wright (2011)

This tutorial guides you through the steps necessary to create a concrete plan for your preservation project, taking into account the balance between cost, quality, time and volume.

The first step defines what needs to be done, when it needs to be done by and how much it will cost in total. The Second step considers the operational aspects of preservation focusing on the details of how preservation will be done on a day-to-day basis.

www.prestocentre.org/library/resources/planning-your-preservation-project

This digest looks at preservation services, whether outsourced or in-house and considerations that are important when defining the service level agreement (SLA) with the service provider. The digest contains a description of two important facets: a survey of audiovisual service providers, investigating what they consider the important considerations when determining whether to trust a service provider, and a proposal of terms to be included in a service level agreement with a preservation service provider.

www.prestocentre.org/library/resources/digest-service-level-agreements

Service level agreements for storage and preservation

PrestoCentre (2011)

A/V Artifact Atlas

Bay Area Video Coalition (BAVC), New York University Digital Library Technology Services, Stanford Media Preservation Lab (2011)

"The AV Artifact Atlas is for use in the identification and definition of the technical issues and anomalies that can afflict audio and video signals."

This community built resource offers a rich list of analogue and digital audio and video artifact examples accompanied by sound bites, videos, still images or waveforms displaying their qualities, a description of the artifact, and information about whether it can be fixed.

www.prestocentre.org/library/resources/av-artifact-atlas

Bits & Bytes

Glossary of Rights

Annarita Di Carlo, Gianluca Picciotti, Monica Bartole-schi, Lara Lucaferri (2012)

The "Glossary of Rights" provides definitions for a broad list of terms commonly used in negotiations of rights on audiovisual contents.

It represents a proposal for the use of a shared terminology for the negotiation and management of rights and it is also at the basis of the PrestoPRIME AudioVisual Rights Ontology.

It includes translations into French, German and Italian, in order to capture the interest of a greater community in the proposed rights model.

http://www.prestocentre.org/library/resources/glossary-rights

Archipel is a project based on the finding that a sustainable digital archive infrastructure is needed in Flanders in order to ensure a structural approach to the problem of digital archiving. The project is also based on the fact that there is an important role for players from the world of arts, cultural and scientific heritage and education in the development of this infrastructure. The aim of Archipel's research project is to look into the practical aspects of creating a sustainable archive of diverse (complex) digital and multimedia objects within a decentralised Flemish digital archive infrastructure. Archipel wants to be an open network where institutes could make their existing digital collection available, and thereby enable sustainable archiving. Archipel stands for a network-centre approach to sustainable digital archives.

To illustrate and bring the results of Archipel to a broader audience four main videos were created as part of the Preserving our History in a Sustainable Digital Way series:

- Introduction
- Legal research
- Social Impact & Examples
- Technical Innovation

www.prestocentre.org/library/resources/archipelproject-introduction

Preserving our History in a Sustainable Digital Way Series

Archipel (2011)

Events

June

Imaging Science & Technology Archiving Conference
June 12-15, Copenhagen, Denmark

The IS&T Archiving Conference brings together imaging scientists and those working in the cultural heritage community, as well as in government, industry, and academia to discuss the most pressing issues related to the digital preservation and stewardship of hardcopy, audio, and video.

FRAME 2012 - Session 1: Preservation and Digitisation of AV Media
June 18-20, Paris, France

FRAME address the issue of new technologies applied to the restoration, digitisation, preservation, marketing and use of television and film archives. Examples of new use of archival content in various media platforms will be showcased.

Also going on in June:
05-08: Annual ACM International Conference on Multimedia Retrieval
10-24: Joint Conference on Digital Libraries (JCDL) 2012
18-22: 17th Brazilian Congress Of Archival Science
19-22: 7th Annual Southeast Asian Cinemas Conference

July

Open Repositories Conference 2012
July 9-4, Edinburgh, Scotland, United Kingdom

The theme and title of the 2012 conference — Open Services for Open Content: Local In for Global Out — reflects the current move towards open content, "augmented content," distributed systems and data delivery infrastructures.

Also going on in July:
02-06: Policies and Practices in Access to Digital Archives: Towards a New Research and Policy Agenda Course

August

World Library and Information Congress: 78th IFLA General Conference and Assembly
August 11-17, Helsinki, Finland

The IFLA World Library and Information Congress sets the international agenda for the profession and offers opportunities for networking and professional development to all delegates.

Also going on in August:
02-04: ICHORA6 - International Conference on the History of Records and Archives 6
17-18: Beyond Libraries: Subject Metadata in the Digital Environment and Semantic Web — IFLA Satellite Post-Conference
20-24: International Conference on Archives (ICA) Congress

September

EUscreen Conference: Television Heritage & the Web
September 13-14, Budapest, Hungary

EUscreen organises its third and final conference on the topic Television Heritage & the Web.

FIAT/IFTA World Conference
September 28-October 1, London, United Kingdom

Also going on in September
3-7: International Conference on Dublin Core and Metadata Application
19-21: 3rd International Symposium on Information Management in a Changing World
24-28: FRAME 2012 - Session 2: Organization, marketing and use of archival digital content
26- 28: UNESCO Conference on Digitization and Digital Preservation

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