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River is the Venue (RiV):

Evaluation of the Public Engagement Project, Involving Artists, Educational and Arts Agencies Working Collaboratively to Educate the Public on The History of Flooding in Bath Through Accessible Public Artworks

Abstract—A public engagement project using accessible public artworks to educate people in Bath about the history and dangers of flooding in the city. The artworks were commissioned specifically with accessibility and inclusion of under-represented members of the community in mind, particularly those with disabilities. The project was designed, developed and evaluated using grounded methodology and was part of the development of a model of inclusive capital. It was hypothesized that: The artworks could be developed according to the five stages of inclusive capital in order to promote education and access. It is found that the artists planned their artworks carefully, although in all but one case could have done more to test their artworks with people with access needs before exhibiting them.

I.INTRODUCTION

This report discusses the evaluation of an accessible public artwork project to educate the community in and visitors to Bath about the history of and dangers of flooding in the city. The history of flooding covered in the artworks ranged from the nineteenth century until the early millennium.

The project aimed to engage with the local community and tourists and visitors to Bath and investigate the development of an inclusive arts environment for people with disabilities and other access issues. It also aimed at encouraging social and cultural well-being across local communities.

The outputs of the project included: an interactive digital platform; a guided trail with artworks relating to historic flood events of the River Avon; hydraulic models of selected cross-sections of the River Avon representing historic flood events; reconstructed evidence of the

social history of the River Avon; an accessible and inclusive exhibition of the trail's artworks and of the project's story.

The outcomes of the project related mainly to community engagement, through the creation of a physically and culturally accessible art-spaces for the local community. The accessible and democratic project design was also meant to reach out to non-conventional audiences.

Furthermore, the project was designed to contribute a general public awareness for flood management strategies and to the establishments of collaborations across a unique range of local stakeholders – these stakeholders included art spaces, schools, colleges, University of Bath, care home residents, patient groups, the city council, local disability organisations, community groups and local water companies.

The project involved a collaboration between three partners, who were involved in the design, development, administration and evaluation of RiV:

- University of Bath (UoB) – for UoB, the project was designed to develop collaborative, networking and teamworking skills. The project was also to provide the basis of local impact through extensive community involvement and the extension of collaborations with organization partners across Bath and North East Somerset.

- 44AD art studio (44AD) – The democratic project design and execution was designed to expose the work of the studio to new partners and make artwork accessible to new and non-conventional audiences.

- Royal United Hospital (RUH) – The project was of interest to the RUH because it promoted wellbeing, community networking, while it involves the community engagement. It also assisted the organization to better understand what makes an accessible project. The outputs of the project were also to constitute a part of a permanent exhibition in their new building which provides an accessible environment for traditional and non-conventional exhibition audiences.

The project combined the expertise and experiences of these partners to commission and curate the artworks, and to develop the exhibition. This approach provided ground for interdisciplinary research between water engineering (Department of Architecture & Civil Engineering) and accessible and inclusive education (Department of Education).

At the same time, this approach provided a basis for transdisciplinary research in action through supporting a democratic and inclusive research design with input from local communities and stakeholders. This approach intended to inform all the phases of the project, from formulation of the artworks through to the evaluation process.

Subsequently, the project enabled community networking between a diverse range of participants, from hospitals, art spaces, research institutions, utilities, policy makers, and local community members. The interactive character of the project also allowed for teamwork, contribution and involvement at multiple stages of the project.

B. The Context of RiV

Traditionally, public artworks were commissioned to represent soldiers, aristocrats, politicians, and religious leaders. Other artworks have been commissioned to communicate to and inspire the public about religious passages or cultural stories.

However, rather than making the public feel closer to these figures, public artworks have often been placed up high, out of reach of their viewers; all too often they are designed to make the public feel a sense of reverence rather than a *sense of inclusion*. Furthermore, as they are placed up high all too often they are inaccessible with visual impairments or problems with mobility.

During the last century, the subject of public artworks has changed to become closer to the public imagination: they included less elevated issues and ideas; they were respectful of fallen foot-soldiers; they communicated a broader range of beliefs; they represented a broader spectrum of humanity and religious ideals.

The philosophy of commissioning art has also changed to engender less reverence, to develop more debate or communicate a feeling or a message. And yet, despite these changes, public artworks still often inadvertently excluded viewers, mainly because these viewers are physically, intellectually or socially unable to access the artworks.

The aim of RiV was to explore public artwork commissions in a different way. As well as making the subject of the artwork and the message more socially inclusive, the commissions for RiV were designed to make the medium of public artworks closer to the public.

The different artworks represented the flooding of Bath by the River Avon through different senses – visual, aural, tactile and even the smells of the river. And, the messages they communicated were designed to be interactive through performance and participation.

To achieve its aims, RiV commissioned a range of artistic works, based on numerous medias, from sculptural pieces to music, puppet theatre and a series of workshops. The workshops in particular allowed members of the local community to participate in creating an artwork, engendering a sense of ownership.

Through bringing the artworks physically, intellectually and culturally into the community of Bath, the project partners worked to engender a greater feeling of inclusion amongst all the local community.

As it was the first project to use public art works as a purposive means to develop accessible Science Technology Engineering and Mathematics (STEM) education, RiV was also unique - it combined water science, art and information technologies. Funded by the Public Engagement Unit of the University of Bath and led by a team of researchers and art professionals, the RiV project thus contributed a new perspective on the water heritage of Bath.

This range of evidence-based, flood-inspired artworks and workshops engaged local communities with the water history and raised their awareness on flood risk and protection. The project's outputs were thus an example of accessible art-spaces, and its novel outlook on the flood history of Bath worked to capture the essence of the river as an asset for Bath and as a core element of its social history.

The research underpinning and informing the RiV project was conducted as part of an ongoing project of the Architecture & Civil Engineering (ACE) Department of the University of Bath, funded by The Leverhulme Trust. This umbrella project, entitled "Mobilising Britain's historical flood information in support of contemporary flood risk assessments: the city of Bath," aimed to investigate and assess the utility of documentary evidence of past floods within modern flood risk assessments.

A thorough archive search for this umbrella project has resulted in the recollection of data on the spatial distribution of past flood events and in the reconstruction of the policy history of Bath. The findings of this project also feed into the development of models representing historical changes in the river's hydraulics and of novel advanced statistical models.

Thanks to the unique character and team-composition of the RiV project, a number of new collaborations have emerged across disciplinary and institutional boundaries. For example, the Bath Record Office: Archives and Local Stories of the Bath & North East Somerset Council has been a valuable resource for the researchers and art professionals involved in the project.

Furthermore, during a workshop series a wide range of the local stakeholders, audiences and communities has been exposed to fascinating elements of the water history of the River Avon.

The project's framework and its outputs are designed to reach out to non-conventional audiences, including people with disabilities and other culturally under-represented groups. Thus, the RiV project combined expertise and experiences to deliver a unique output: an inclusive art-space inspired by the flood history of Bath.

In the following report, the research methodology used to develop, design and implement the project, a discussion of findings of the evaluation, and the conclusions that were drawn are presented.

II. CONTEXT AND METHODOLOGY

A. Introduction to Grounded Methodology

The methodology used to develop RiV was Grounded Methodology (GM), an adapted form of Grounded Theory (GT) (Glaser & Strauss, 1967). GM is specifically designed without inducing testable theories, but encourages evolution of interpretive deduced theories that evolve through discourse, such as course or workshop design, or the design of a technology. As it is more flexible, GM can also be applied to forms of investigation that are not normally associated with GT, such as literature searches.

As with GT, GM has three phases of study: open, axial and selective phases. Data is collected and analyzed in different ways during these three phases. During the open phase, categories of behavior, identity, objects or environments that are to be examined during the study are identified, and theories of analysis begin to be developed. This provides a focus for the research.

For example, in previous research using this methodology, learning environments and participants were classified according to individual impairments in order to examine appropriate technologies for learning support.

During the axial phase, links between variables in individual categories are linked together or the categories are developed into a testable pedagogy – the latter was the case in this research. If it is for a study of a course or workshop, this linkage is done for practical purposes and provides a direction for evaluation. If this methodology is used for an observational study, individual variables such as gender or educational level are identified and compared.

Between axial and selective phases, a hypothesis is developed that is tested during evaluation or observation. During the selective phase, evidence is gathered to test this hypothesis through data collection, such as workshop or course evaluations or through observations.

As with GT, GM also constantly compares data, refines its methodology and regards all forms of data collected during the project as equally important, valuable and useable. This flexible approach to data collection suits reflexive, problem solving approaches to new contexts, topics and settings, which are previously unscrutinised or have been under-investigated in pedagogical design.

Data and theoretical approaches can also be stored for later research, where they can be applicable in a different context. This differs from GT, where it is expected that the investigator enters the study from a naïve perspective.

There are also practical differences between GT and GM. Most notably, GM is more accommodating to mixed analyses of qualitative and quantitative data, whereas GT is linked largely with qualitative studies. GM also relies less on formal coding, which has evolved to become a significant element of GT.

GM, by contrast, relies more on narratives developed by the researcher in order to state an original problem. GM is also applicable to non-traditional research studies, such as the design and evaluation of learning, or a structured literature search.

B. RiV's Workplan and Planned Innovations

To implement its methodology, the project team worked closely with the local water-related stakeholders, such as the city's council, river authority and domestic water and sewage suppliers on a series of innovations.

It was the intention of the project to expose the venues of the proposed artworks to new audiences across a wide range of social groups through this process. Additionally, the project also offered the opportunity for educational activities and collaborations with educational institutions in Bath and district.

As stated, the focus of the project was to make public artworks accessible to new and diversified community audiences, especially people with disabilities. Thus, it created a non-institutional space for exhibits and the outputs of the project were synthesised through the unique combination of ICT, hydraulic modelling and artworks.

This blend of these activities was designed to promote an interdisciplinary and a transdisciplinary approach in practice.

The project shed light on a new aspect of water heritage in Bath, the history of the River Avon, and in doing so attempted to re-vitalise the essence of the river as an asset for the city and a core element of its social history. Through its creative outputs, the project subsequently contributed to raising public awareness for global issues, such as climate change on a local level and the nature of flood management plans.

The project also offered the opportunity to create a new type of collaboration, as its partners had never previously worked with each other, so for each of them the project provided a unique professional experience. The team-setting was also innovative, combining a wide-spectrum of expertise and perspectives, including arts professionals, cultural education, health and wellbeing, water engineering and art exhibition management.

C. The Three Phases of Design, Development and Evaluation

In this study, the open phase consisted of designing a theoretical model of knowledge-transfer and evaluation for the project – that is to say, a theoretical instrument through which we could implement and measure learning, knowledge-transfer and development – and conducting participatory meetings with stakeholders.

This methodological design was an evolution of previous workshop designs using art making as an educational aim (Hayhoe, 2013, 2017); although this was the first time this methodology was applied to professional public art works as an instrument of education.

The theoretical model was conducted in conjunction with a model of study for a separate cultural heritage research project (Hayhoe, 2018a, in press), and alongside the participatory meetings were largely conducted during the design phase. The axial phase further evolved this theoretical model, which complied with the project's aim to support the learning of unrepresented learners, particularly those with disabilities, and led to a learning strategy.

The axial phase initially developed an accessible and inclusive plan for knowledge-transfer, based on the theoretical model constructed and the participant meetings from the open phase. This included:

- a call for artists, incorporating aspects of consultation and the theoretical model

- the commissioning of an accessible website to promote the artworks and contribute to the learning and knowledge transfer of the project in early March 2018

- the development of artworks based on modes of accessibility

- the exhibition of the mechanical pieces linked to flooding research

This knowledge-transfer was in part based on recent experiences of participatory research groups, and compared different experiences of accessing artworks in museums (Hayhoe, 2018b). From this theoretical model, a hypothesis was developed to conduct the evaluation, which itself was based on the original aims of the project.

To implement GM, the evaluation used three data collection methods: photography of the exhibits, the proposals, interviews with the artists and questionnaires for those participating in initial participatory sessions.

The questionnaire used open questions, which invited protracted answers, and was created and returned in MS Word format or paper – this software was chosen as it is largely accessible to people with disabilities, and is used and understood by a large proportion of the population. The questions forming the surveys were split into two, with the first set asking participants' professional history and the second half asking about their experience of the project.

Participation in the initial participatory sessions and the commissioning of art works by the stakeholders and artists was wholly voluntary, and the participants were self-selecting. – stakeholders, such as local council representatives, artists and water companies, local residential centres and associations for people with disabilities were invited to participate through previously established contacts.

The questionnaire, interviews and observations were also conducted in accordance with the British Educational Research Association's guidelines on ethical research (BERA, 2018) - its design was evaluated by the Faculty of Humanities and Social Science's Ethics Committee.

During the study, and in order to comply with its ethical procedures, consent forms were provided for all participants of the interviews and questionnaires, and participants were offered the opportunity to withdraw. However, over the course of the participatory consultations no participants asked to withdraw and no coercion was applied through incentives.

III. OPEN PHASE: DESIGNING A MODEL OF DESIGN AND DEVELOPMENT

A. Models of Learning Through Developing Human Value

Philosophies of human value have evolved chronologically since the Enlightenment (Hayhoe, in press). Human value, referred to as intangible skills and habits by Bourdieu (2010)

and Yardi (2009, 2010), is an effective way of understanding our personal knowledge, activities, and skills. These variables also influence how these elements shape our personality, memory, and characters.

Furthermore, theorists since the eighteenth century have theorised human values shape individual identity, behaviour, motives and desires (Hayhoe, in press). Human value can also be applied to informal knowledge. These previous philosophies of human values have a common theme: they value a *sense of inclusion* for a category of people as part of our human condition to feel part of a network. That is, they hypothesise the value of family, friends, social class, religion, and ethnicity as a community.

Subsequently, these philosophies seemed to agree it is instinctive to network to learn – i.e. although there are better and worse ways of networking and learning and we might be encouraged to use one way over another, because we are not specifically taught to network and learn, we simply network and learn. Networking and learning are therefore arguably part of our human condition.

B. Bourdieu and Yardi's Model of Capital as Knowledge and Habits

Yardi's (2009) model of technical capital demonstrated it is not only important to get information and use it to *feel included*. Information is part of our human history to develop and use technologies and the arts, just as it can also be said to be part of our history to seek out our heritage and the heritage of others.

Cultural capital, such as that described by Bourdieu (2010), can also be knowing when to use certain types of language, such as slang and swearing, and with whom certain language is socially acceptable. More controversially, human capital is our moral and immoral knowledge, such as our rules about how to exclude others who don't fit our rules of social acceptability.

It could also be said that it is part of our human character to seek out inclusion as a value to feel our sense of inclusion, and this inclusion fosters our sense of value. It can be said that throughout history, people have formed new communities, to feel secure, and to feel a sense of value. Consequently, to develop inclusive capital can also then be central to our human history, as it provides us with a *sense of value*.

I argue that acquiring inclusive capital is especially important if you are a disabled or an older person. This difficulty is caused because people with disabilities are more likely to find barriers to accessing the first steps of inclusive capital. This leads to a lessening of their sense of inclusion in mainstream society, and to a growing sense of social exclusion and isolation.

For instance, disabled people often find it harder to access technologies they can interact with, or to access the environments of cultural institutions. They are less likely to have their needs understood, or be thought of as needing access to the learning of non-disabled people. They are often thought to want separate cultural institutions, such as schools or classes, or separate museum entrances or exhibitions in museums.

The physical nature of some disabilities or infirmities caused by old age can also lessen our access to acquiring inclusive capital. For instance, acquiring deafness and/or blindness later in life can make it harder to join group discussions that are an essential part of networking for gaining information or using technology.

For example, some people who have late disabilities often do not learn sign language or Braille or identify themselves as being disabled (Hayhoe in press).

Physical disabilities may also make it harder to find transport or access cultural institutions or physical networks. Late acquired learning disabilities can similarly be thought to restrict access to mainstream learning, and the spaces and places of cultural institutions that people once enjoyed.

C. The Application of Capitals to the Project

It was the purpose of the model developed from this investigation of literature to develop a means by which to investigate the development of inclusive capital as an instrument to foster a *sense of inclusion*. Cultural institutions and learning facilitators – in this case, the artists and curators - do not just need to understand this sense of inclusion intellectually and academically; they need to feel empathy with this sense of inclusion.

Practically, cultural institutions and teachers must also understand and study ways in which they can adapt their spaces and places – both their physical and virtual environments. These institutions and teachers also need to adapt their own behaviour to develop habits and practices that recognise a sense of inclusion in others.

To develop this argument and to understand the evidence for cultural inclusion in the case study, I start by developing the academic background developing inclusive capital from human values (Hayhoe, in press). The process of developing this background will structure the model of inclusive capital as a framework of different stages of development.

D. The Development of Participatory Meetings

In addition to developing inclusive capital, it was decided that the project should be influenced by emancipatory and participatory methods to ensure the artworks went some way to represent those they were intended to educate (Henderson, 1995). Subsequently, in February and March 2018 three open meetings with stakeholders, partners and potential artists were held.

Practically, as there were different issues surrounding the topic of the flooding and social inclusion involved in the project, it was decided to hold different sessions on both topics. The first of these meetings was held at a university building in Bath city centre, and was designed to discuss the flooding of Bath as a topic.

Participants in the meeting included twenty-two key personnel, including local councils and river authorities, universities, arts centres and water and sewerage companies.

The second of these meetings, held at the Royal National Hospital for Rheumatic Diseases (the Min) again in Bath city centre, and addressed the issue of inclusion. Eleven participants in this meeting included key personnel from a local association for the deaf, local arts institutes and associations, independent members of the community, universities and art colleges – it was noted that a number of the participants had disabilities, although it was decided not to classify people according to disability or impairment.

The third of these meetings was a walk along the river bank in Bath in February 2018, to gauge the flooded areas and the most vulnerable areas of the city during the floods. All of the partners and volunteer stakeholders attended this walk.

During the walk, images were recorded, which would later be exhibited, and a discussion was held about key sites where the river flooding was particularly dangerous. Here it was noticed there was an area of the river where historical flood levels were marked against the wall, which had been researched previously but not discussed in situ.

During the first two meetings, participants were asked what they would like to have included in the project, and how they would like to see the artworks presented. These opinions were recorded and influenced future decisions of the project.

For example, where the environment was discussed during these groups, decisions were made as to where and how the eventual pieces were sited. In addition, evaluation questionnaires were handed out and further comments recorded through a Likert scale and open questions.

These meetings proved relatively positive. Although there were reservations about where the artworks could be sited along the river – two authorities in particular felt the pieces

could not achieve planning permission – the questionnaires and the meeting at the Min in particular also developed suggestions for collaborations with stakeholders.

In addition, answers to the questions on the Likert scale in the questionnaires showed that all elements of the meetings generated positive discussions; in this section of the questionnaire, it seemed that networking and knowledge-exchange created being seen as particularly positive.

In terms of the open answers in these final questionnaires, it was found that the history of the flooding was a particularly important element of the topic the participants particularly wanted to emphasise. There was particular mention of a 1968 flood, perhaps the most devastating flood in the latter decades of the twentieth century and the first decades of the twenty first century. This was a part of the life experience of many people in the community, and it was also the fiftieth anniversary of this flood during the year of the ARCHES project.

IV. AXIAL PHASE: THE APPLICATION OF THE MODEL OF INCLUSIVE CAPITAL

A. Applying the Model of Inclusive Capital to the Project's Development

As with other forms of capital, inclusive capital is acquired through life course. It can also be said that a single cycle of acquiring inclusive capital takes place in five stages.

The first stage in this cycle is connecting and bonding with a network of people – that is to say, to acquire bonds from our human necessity to bond. These groups are largely seen as a family or a group of friends, classmates, or workmates, or, as Yardi (2009, 2010) observed, connecting and bonding with a group developed through social media.

Without connecting and bonding to this social or cultural network, there is no sense of inclusion. Consequently, our sense of inclusion is premised on a social and cultural process of feeling valued in these bonds and connections.

The second stage in this cycle is learning inclusive capital through our networks – that is to say, we use our human condition to learn to develop and acquire human capital. Thus, learning inclusive capital consists of acquiring habits, knowledge, and practices that can lead to a sense of inclusion.

In common with the writing of Marx (1867), part of this learning of inclusive capital is also about seeing ourselves as equally included as others are, in order to humanise our skills.

However, unlike Marx's understanding of morals, this is also where people are said to develop a further sense, the moral sense of justice, which can also be described as a form of

moral knowledge. In this respect, justice is also connected to a process of bonding, connecting, and feeling included, and being included could be said to be an important part of our moral understanding.

The third stage in this cycle is collecting information that points to or later leads to knowledge. This collection of information can include finding out about our surroundings, making judgements about their worth, or planning to travel within our surroundings. For example, this information could be directions from maps.

Yardi and Bourdieu suggest such forms of cultural capital can also be acquired through the use of technology or gaining information. In the modern era, this third stage can also mean accessing digital networks or learning, and access to these networks and this learning can help develop a sense of inclusion.

Consequently, information is a vital part of planning and designing inclusive capital, and its subsequent habits and practice. It can be described as the raw material or the atomic level of inclusive capital.

The fourth stage in this cycle is physical or virtual access to spaces and places, such as visiting or attending cultural institutions or reading about their collections and history. These institutions can include places such as schools, parks, universities, museums, or, as Yardi suggests, surfing websites.

The fifth stage in this cycle is a form of capital that weaves its way through all the others. This capital is physical and virtual mobility, which allows for navigation through spaces and places, networks, information, and learning – for instance, this can include the skills needed to surf the Web for information, move around or between institutional environments, or navigate technologies like telephones.

Conversely, lacking mobility can lead to exclusion, to being unable to attend an institution as a place, to being unable to find information, or to being unable to move between networks. Subsequently, mobility is the essential catalyst of inclusive capital.

C. Developing Learning Through Public Artworks

It was felt that the learning activities should develop a historical understanding of the development of flooding and the dangers of living close to the river and low-lying areaosemite – thus providing learning and information.

This development was based on previous models of teaching people who are blind separately, and was facilitated through networking and bonding. Thus, exercises were designed to include familiar subjects and topics through groups, that would allow all viewers and learners to relate to the artworks.

It was also intended that the commissioned artworks would help the viewers explore local environments, investigating issues such as mobility and an understanding of different natural and cultural surroundings. Thus, the following four days' activities were planned to achieve this aim.

The first stage in the development was the call for artists in March 2018, which incorporated aspects of consultation with the participatory group and the theoretical model. In addition to the call for artists, an open evening for artists interested in submitting a proposal was held at 44AD, where these artists could meet the partners.

In late March, the decision was made to commission five pieces from a range of media which engaged different senses and forms of learning, and which it was felt would actively engage viewers. These artists were:

- Ross Bennett – a fine artist, who created painted concrete columns, designed to represent samples taken from the earth using scientific machinery. The layers painted onto each of these cores represented a different sedimentary layer, laid down by the river. An illustration of this work is represented in figure 1 below. The pieces were designed to rest on the ground and are meant to be touched and encourage interaction. Being ground level height to up to a metre and a half tall, the pieces were designed to be particularly accessible to people with mobility issues and children.

Figure 1: The original design of the concrete cores designed by Ross Bennett

- Edward Bettella – a musician, who created soundscapes to represent different elements of the river. This was Edward's description of his piece from his proposal:

  "The soundscapes will be available to hear at listening stations and at a live performance. The soundscapes will be thematic and focus on 4 themes: 1. Flooding: The flood waters and the unstoppable force of nature over hundreds of years; 2. Destruction: of property and livestock, taking inspiration of the numerous accounts of people trying to protect themselves, their homes and livestock within the city; 3. Inaction: of local authorities and the population to invest in a flood prevention scheme, a story that starts in 1832; 4. Prevention: flooding is consigned to history as the Bath Flood Prevention Scheme is implemented. The echoes of past musical themes gently drift off into silence.

  The soundscapes will be constructed from original composed music that utilizes acoustic and synthesized instruments. Sound recordings and effects will be recorded at source or sought from sound libraries. Each piece will last no longer than 1 minute 30 seconds."

- Edwina Bridgeman – a fine artist and educator, who proposed a series of workshops for and within the local community, engaging participants' understanding of the river and the flooding, and stimulating memories and descriptions. This was Edwina's description of her artwork in her project:

  "Working with groups throughout the community we will create artworks based around the history of the river. As a provocation we will look at the story of the baby in its cradle washed away and subsequently rescued from flood water in the Dolemeads in 1894. I made a piece of work in response to this story for my

show Miracles at the Victoria Art Gallery Bath, it generated much interest and I would like to explore the story further and in particular the area known as the Dolemeads. The Dolemeads was a flood plain, housing Baths poorest community and I think would have relevance today for community-based work. Participants will have the opportunity to take part in exciting and engaging workshops exploring materials and techniques, creating both 2D and 3D work for exhibition.

The work will have a strong narrative and we will focus on the stories and experiences of the participants as well as those that we discover through research. My work is often generated through 'small ' stories which are universally recognisable.

I make three-dimensional work using simple materials often used in unexpected ways. My materials include wood, fabric, paper, tape, yarn and found objects. I create work from what is to hand, celebrating the personal, handmade and imperfect. In my experience using every day materials engages audiences, it creates a definite possibility that they too could make work from these materials. The 1968 floods in Bath are in living memory for many and this proposal offers the opportunity for people to retell their stories nonverbally. Work created would be mounted in large box frames.

I work widely in the community. My sense of playfulness and accessibility extends to the work that I make with all ages from babies to Elders living with dementia. I run projects with an open agenda following the interests of the participants in a welcoming, non-judgemental way. I see my own work as a reflection of my work with various groups and settings. My visual arts practice and work as artist / facilitator are entwined, each celebrating the other. Creating multi-generational work displayed together is exciting and engaging for audiences. I would document the project throughout and potentially use the documentation alongside the exhibition. I would like to create an opportunity for a student or early career artist to work with me on the project. I have experience of and would propose working with the following groups."

As part of her artwork, in the Spring of 2018 Edwina conducted single and repeated workshops with a local primary school close to the River Avon, a residential care centre

for people with dementia, also next to the river, and with patients from the Royal United Hospital. These pieces subsequently formed items in display cases during the final exhibitions. An example of this making process is shown in Figure 2.

Figure 2: Images from Edwina Bridgeman's Workshop in a Residential Care Home Next to the River Avon

- Alyson Minkley – a fine artist, who created a series of flags that ran were to run along the river. Like Ross, Alyson represented strata on her flags, although these strata were designed to reflect the flood levels found along the river, particularly the flood levels discussed during the walk. Alyson had also gone into detail about the exact height and position of the floods, making the flags represent the height of the flooding. As the flapped in the wind, the flags also made a sound and had a sense of movement, and so engaged a number of senses as well as presenting information. The flags were also designed to look like the sails of boats, also representing water and river usage.

- Marc Parrett – a fine artist, performance artist and puppeteer, who created a mixed media piece from flotsam and debris that can be washed up by the river, based on an old pram. On the pram, Marc created a mechanism and pump, which would take water from a tank, pump it up through a pipe, which would then pour onto an A3 size piece of paper. During his performance, Marc made quick self-portraits of sitters in watercolour, through which the colours ran. This piece showed the uses of water, and played with the subject in an almost comical way. The water in particular came from an old plastic fish

tank, with pondweed and models of divers. This was the description of Marc's artwork in his proposal:

> "I intend to create an installation/ performance piece to be sited on the proposed route ideally in an overgrown or messy or gravel pathed area by the river if available. This piece will explore the destructive and regenerative properties of water, the mythology and history of catastrophic floods, the emotional trauma which often results from the displacement and destruction caused by urban flooding and linking it to past events in Bath, in particular the 'great flood' of 1968. Cultural uses of the word and concept of 'flood' will also be explored; A flood of emotion, a flood of tears, letting flavour flood out, being overwhelmed by a flood of political and cultural madness. This is illustrated in Figure 3.

Figure 3: The Design of Marc Parrett's Piece, Based on Images of Debris from a Flood

> The piece will be a cabaret of flotsam. Object performance will blend with puppetry, mime and silent storytelling. The structural elements of the installation will be formed of found, semi destroyed objects hanging from wooden and pole structures anchored into the ground. Small water pumps will provide constant drips and spills. A hidden sound system will play distorted watered-down

sounds. The central feature of the installation will be a water tank on wheels containing a sunken model of 'central Bath'. Visitors will view this feature via a peep hole. Small battery driven mechanical elements will provide movement in the tank. A performer will engage with the audience, leading them to explore the various elements of the installation. Semi submerged puppets clinging to floating objects and fighting for thier physical and mental survival will also interact with visitors. The mood of the piece will be playful and blackly humorous as well as sombre and resigned."

The artists weren't simply chosen for their choice of accessible media. As the participants maintained during the early meetings, the centre of all these pieces were to be the history of the flooding, and so a large part of the decision to commission the artists included their research of the flooding itself.

Many of the artists also made particular reference to the 50th anniversary of the Great Flood of 1968, with Marc in particular coming from Keynsham, a town down-river from Bath, which was also hit by the flooding.

In tandem with the commissioning of the artworks was also the commissioning of the website, which was to act as a base for the information and learning elements of the project. Eventually, a postgraduate student from the Computer Science department was identified and commissioned to build the site.

As with the art works, the website had to be accessible and engage as many of the stakeholders as possible. commissioning of an accessible website to promote the artworks and contribute to the learning and knowledge transfer of the project in early March 2018.

During its development, feedback was given on a regular basis to the partners, and suggestions about access and aesthetics led to an evolution of the website in tandem with the artworks.

Initially the website was hosted on the website of 44AD. However, in Summer 2018 it was decided to buy a URL and pay for hosting, which would provide the project with a distinct identity that the community could relate to this project.

Eventually, the website (http://riveristhevenue.co.uk/) developed to incorporate: a description of the project as a whole, a page on the artists and their work, a calendar of events that RiV would appear in and a gallery of the work from the events and the making processes. In addition, the web developer also managed to create accessible pages for people with a visual

impairment using internationally recognised symbols. The front page of this website can be seen in Figure 4.

Figure 4: The Frontpage of the RiV Website
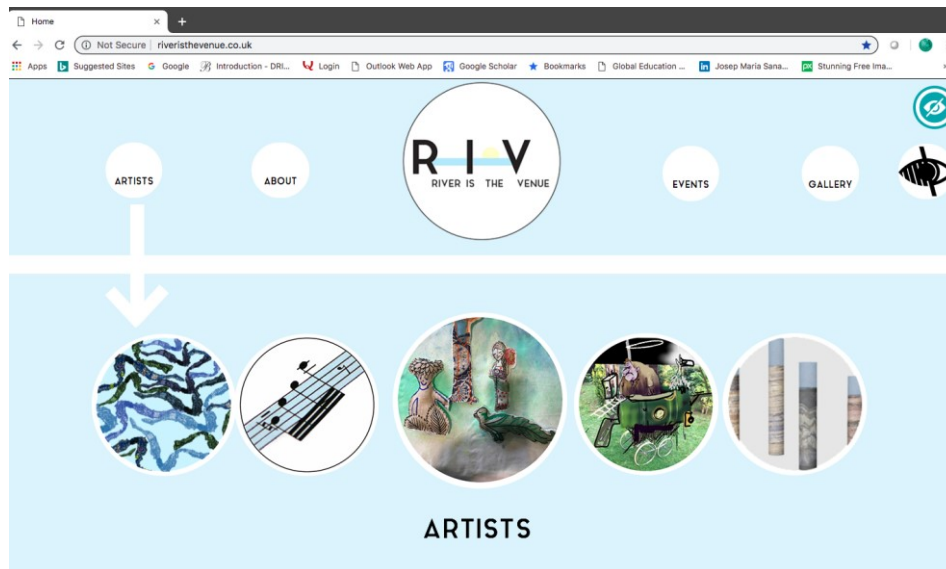
In June 2018, RiV was promoted locally at two events, designed to raise awareness of the project and its aim to educate the local community about the history and dangers of flooding in the city. The first of the events was a stall featuring mechanically simulated flooding at Bath Festival of Nature, early June 2018, in Green Park, Bath (www.bnhc.org.uk).

The Festival of Nature in particular helped to develop interest in RiV in the local community, as it was a free family festival which was advertised in local schools and based in a park next to the River Avon. The second event was the Creative Bath Summer Party in Queens Square, Bath, where RiV's partners again promoted the artworks and educational content of the project to the local arts community.

From September 2018 - January 2019, the finished pieces from RiV were exhibited and discussed at four community events in Bath, which were recommended by stakeholders and partners involved in RiV.

The first event was European Researchers Night in late September 2018 at the Edge Arts Centre, University of Bath. This night was designed to increase awareness of research and innovation activities at UoB. The researchers' night was also supposed to support the public

recognition of researchers, demonstrate their impact on the daily life of the communities they worked in, and encouraged young people to develop research careers.

During the night, a pop-up exhibition of the RiV project and its artworks was displayed in the art centre's Weston Studio.

The second event was the art festival, Forest of Imagination (www.forestofimagination.org.uk), which began the day after European Researchers Night, in the final three days of September 2018.

Like the Festival of Nature, Forest of Imagination was a much larger community and family-centred festival in the centre of Bath and included contemporary artworks, outdoor theatre, sensory installations and participatory creative activities. The RiV artworks were displayed in the part of the festival running alongside the River Avon, apart from Marc Parrett who performed in Kingsmead Square where other performances were taking place.

The fourth event was an exhibition of the pieces in November 2018 at 44AD Art Space, Abbey Street, Bath (www.44AD.net) – this was close to the Roman Baths, again following the theme of environments near the waters in Bath. This event was a documentary exhibition of the RiV artworks, alongside new and developed elements to some of the commissioned pieces, and footage of the project to date.

During the exhibition, there was also a schedule of events, including artists' talks and workshops relating to the project.

The final event was the documentary exhibition of the pieces by Art at the Heart at the Royal United Hospital, Bath (www.artatruh.org), home on the new Min – which is still currently under construction – from December 2018 – January 2019. The exhibition itself covered one of the most used stretches of corridor in the hospital, lining the walls near the main reception of the hospital.

During the development of the project in its Axial Phase, the following hypothesis was formed to measure the performance of the project's development in line with its theoretical model:

> The artworks could be developed according to the five stages of inclusive capital in order to promote education and access.

V. SELECTIVE PHASE: EVALUATING THE WORKSHOP

A. Planning According to Elements of Inclusive Capital

In the selective phase data from the interviews with the artists and comments from Edwina Bridgeman's workshop were analysed through the hypothesis.

This analysis found there was a desire by the artists, partners and the majority of stakeholders to develop and exhibit the artworks in a way that supported all the elements of inclusive capital. However, the reality of overcoming certain practicalities meant that the implementation of the education and learning by the artists and partners became harder.

More particularly, the original call for artists and the subsequent proposals emphasised a desire by the partners to incorporate elements of: bonding through community involvement; the space and place of the river environment: movement around the river environment.

Similarly, the artists proposals emphasised the importance of the environment in the performance or exhibition of their work, and movement around this environment to emphasise the experience. For instance, Edward Bettella proposed:

"Listening stations will be placed strategically along the river route, for example by a weir or sluice gate. Each listening station will feature a specially printed sign that recounts a local story from the floods; this would also be printed in Braille for the visually impaired. The sign will also feature a QR code, which can be scanned on any smartphone and links directly to the online audio file of the track.

The second half of the proposal is to stage a live performance for the community at a chosen point along the river walk, which will feature extended versions of the soundscapes, with live instrumental improvisation performed over the backing track. Each track could be extended to 4 minutes and the set of soundscapes could be performed three times over the course of the day. The proposed date for this would be Sunday 3 June, weather permitting. A possible site is the Bath Quays riverside area, which would allow maximum access for families to come and hear the music by the river. Access to the site is flat from either direction and the steps are designed like an amphitheatre, providing plenty of seating for those who need it."

Similarly, in her interview Alyson Minkley described how she reasoned the artworks were to be sited along the river, so accessibility needed to be considered on many fronts. Eventually, Alyson chose to make works that could be appreciated as "simply festive and fun, bringing colour & movement to draw attention to the site and its purpose without having to get too close or engage too deeply."

For Alyson, the acoustics of the environment and the emphasis on their exhibition outdoors allowed flapping flags to become evocative of festivals and sailing. "This added an element for those without full vision."

B. Restrictions and Tensions to Inclusive Capital

However, restriction discussed by the local council and river authority which were discussed in the original stakeholder meetings meant that citing an exhibition along the riverside became an almost impossible target.

For example, the local council emphasised that any artwork that required fixtures would need planning permission that could take up to a year and significant resources and expensive legal guidance to apply for. Similarly, the local river authority controlled the area surrounding the river as well as the river itself, and were reluctant to approve the siting of artworks alongside the river banks.

These restrictions meant the RiV partners decided it was best to emphasise the exhibition of the artworks through purely through existing science and art festivals, and the pre-planned exhibitions at 44AD and the RUH. This meant that many of the original plans to incorporate the environment were not always applicable – although Forest of the Imagination managed to site the artworks alongside the river during the course of the festival.

Consequently, the eventual interviews with the artists showed there had been an emphasis on information and learning, but less emphasis on the environment of the artworks. In addition, only two of the artists could build networking or a form of bonding with the audiences through their artworks.

C. Information, Education, Bonding and Accessibility Emphasised as Part of the Artists' Experience

However, the restrictions and tensions felt with regards to access to the environment and the mobility around the environment were offset by the information and learning experiences the artists had. In particular, the artists took the opportunity to explore different elements of the history of the flooding and the dangers the community felt, and emphasised these through their pieces.

For instance, as Alyson Minkley was previously connected to the local Records Office, the city's library and Bath in Time, she was able to get access to the flood modelling. In

addition, personal temporary experience of a lack of mobility helped Alyson consider the mobility needs of different members of the community during her development of the flags.

> "As I was recovering from a dislocated knee at the time of researching my work, I was all too well aware of physical access needs and very short walks along the river were my first excursions!"

In addition to using the opportunity to research accessibility and flooding in the area he grew up in, Marc Parrett also used the development of artwork to explore flooding more broadly. For example, in his interview he explained searching for videos of flooding more generally on YouTube and Twitter, particularly recent flooding events. This allowed him to incorporate these findings into his performance.

> "Having grown up in this area the stories of the disastrous floods were often recounted, particularly on car journeys through Pensford. Although I started with a plan for my RIV piece I left space in its framework to incorporate new discoveries and developments. The piece itself kept growing even throughout it's delivery during the Forest of the Imagination and related events. My only concerns for accessibility were for safety near water and traffic. As I was mostly sited away from the river bank and roads this was not an issue."

In their workshops and performances, Edwina Bridgeman and Marc Parrett also emphasised the use of their artworks to encourage networking and bonding as part of the learning experience.

This emphasis was a deliberate element of their practice, and they both felt that the experience made them feel the whole experience became more accessible as a result. For example, Marc felt that because the humour in his performance made the piece intrinsically more accessible, as it allowed dialogue and engagement between himself and the viewer.

> "My 'sunk' piece, being an outdoor public performance could be approached by pretty much anyone of any ability. Visitors engaged with the artwork by viewing the trolley installation, the automata & water features. They could also watch the live portrait painting or sit for their portrait. Most of the 'sit-s' took their portraits away with them … One person asked me quizzically if this was a serious piece. It's an interesting point. I like dancing dangerously close to pure whimsy and my trolley of painted objects and mechanical toy dipping is a prime example of my quixotic output."

D. Overall Experience of Access During the Project

Despite their inability to exhibit the pieces publicly along the river on a longer-term basis, there seemed to be positive feedback and anecdotes from the artists as to the educational value of the project. In particular, four of the artists recorded comments by visitors who had viewed, heard or taken part in the performances, and what they had subsequently done to learn more about the city's flooding heritage.

For instance, all the artists taking part in the interviews described how people who had experienced the artworks had gone on to find the flood sites by the riverside, which acted as the inspiration for the events described through the various artworks. As Alyson Minkley reported,

> "I have had people tell me they have been to look at the flood markings under Ha'penny Bridge & had several conversations about the phenomenal scale of water mass that the flags indicate when in position and how that would behave differently spread out in the flood conveyance system which was rewarding to realise people understood and were as fascinated by the physical modelling of it as I am."

Similarly, all the artists that were interviewed reported enjoying the project, finding that they learnt a great deal through the experience of researching and creating their pieces. All the artists reported that they would like to be involved in similar projects in future, and would continue to consider accessibility in future pieces.

For example, as Marc Parrett described of his time performing his artwork,

> "It was a thoroughly enjoyable experience. The actual portrait painting turned out to be somewhat exhausting (more a drain on the nerves than an actual physical ordeal). The water pump worked perfectly well and the results of the "underwater colour" portraits were on the whole surprising, and delightful. I'm glad I could provide a whole world of experience for visitors, so people not watching the live painting or being painted could encounter the water automata, the trolley construction and the previous paintings left to dry …

> Trusting in my process is always a big issue. I have to take risks to create work which surprises me but it does leave me feeling exposed. I have to ignore the countless internal critics and just be incredibly honest. I'm very happy that I took risks with 'sunk' and I personally feel it worked on many levels. This success will undoubtedly propel me to continue making work of a similar quality and take further risks in this future."

VI. CONCLUSION

The projects' educational and access aims were largely fulfilled through the planned exhibitions, execution of the performative pieces and the practice of the community when they engaged with the workshops. The artists reported positive feedback and instances where visitors had gone out to discover further information about the flooding.

However, there were restrictions to the extent to which the exhibition, performances and workshops could be developed. Most notably, developing more permanent access to the most relevant riverside venues, where arguably the artworks would have had greater impact, proved impossible given the restrictions the project worked within.

This was not the fault of the artists, as each of them clearly discussed the environment their artworks should be exhibited in and were commissioned based on these plans. However, the practicalities of the project, most notably the timing, security and legal barriers to the exhibition of the project, often created barriers to more efficient uses of the artworks.

Therefore, two significant lessons can be learnt from this project. Firstly, future similar projects need to realise that the administration surrounding public artworks is perhaps one of the most important future consideration. Secondly, perhaps the greatest asset that can be developed in the planning of similar projects is the development of partnerships with stakeholders, whose space and place and expertise can be shared for the common good.

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