

no such thing as empty space



Project Report - Oct 2015



Supported using public funding by
**ARTS COUNCIL
ENGLAND**



Metal



no such thing as empty space was a year long project which developed upon of work done as part of [How in the World do we Know?](#), a commission in 2013 through Islington Council and Central St Martin. *no such thing as empty space* creatively inquired into the extremes, deficits and vagaries of human auditory and haptic perception. The intention being not merely to recreate aspects of the deafblind experience but to shed light on the intricacies of human perception in general. This project worked in collaboration with Sense, the National Deafblind Charity and comprised an extensive series of workshops and creative sessions with Sense students and staff. The main public outcome of the project was a touring exhibition, which partnered with Metal Culture and MK Gallery. The project was led by sound artist Matt Lewis who also drew on the support of other specialists including audiologists, neuroscientists, other sound artists and assistive technology experts.

This report gives an overview of what was achieved throughout the course of the project, concentrating on the following areas:

1. The types of creative activities that participants, both staff and students, explored during sessions in preparation for the touring exhibition.
2. The final exhibition itself, including audience and participant reactions.
3. Creative research into new technological tools which can be used with deafblind people and the involvement of specialists as consultants.
4. Access training for staff in order to continue using the equipment and legacy for the project.



Project Aims:

To conduct creative research into deafblind experience

To test out new tools for use with Sense service users and staff

To support the sharing of ideas between staff, students and organisations around art and sensory loss

To initiate new experiences for students and staff

To produce high quality new work to be exhibited in public prominent public spaces

To create new local, regional and national partnerships focussing on art and disability

To give the artists involved the opportunity to creatively explore the effects of sensory loss

Creative Activities with Students and Staff:

Quantitative outcomes

- 52 practical sessions took place with Sense students and staff from centres in **Hampton in Peterborough, Keech in Luton** and from the **GOT Group in Cornwall**. The workshops were open to all students and ages and involved the broadest possible spectrum of disability.
- Over 130 different students took part in these sessions.
- 82 different staff took part including support workers and teaching staff.

Activities

The 52 practical sessions were made up of the following distinct activities:

Field Recording Trips

These trips formed the bulk of the creative sessions. It was highlighted during the planning stages that that getting students 'out and about' and experiencing new, challenging and stimulating environments was very important. During the sessions participants from the difference Sense services visited different sites in order to explore their surroundings through the medium of field-recording. Participants used industry standard recording and sound capture equipment including shotgun mics, contact mics and hydrophones. A very wide variety of spaces were chosen in order to provide as wide an array of experiences as possible. Sites visited included an airport, a steam train, train stations, cathedrals, bird sanctuaries, swimming pools, rivers, tunnels and an ice-rink. Visiting a range of spaces also meant that a broad palate of sounds would be available for use in the final exhibition. Participants chose many of the locations for the field-trips themselves during feedback and student forum sessions. Importantly, these creative sessions were also able to support many of the students individual learning targets such as using public transport, recognising danger and hazards in new environments and contribution to decision making processes. Public interaction featured heavily in these sessions, as demonstrated below in images such as bell-ringing in Turo, these sessions allowed students to have meaningful contact with diverse groups of people.

"It was a good project, I liked playing keyboard with Matt the music man, and we went on a trip on the train which was good. The train goes choo choo woo woo! We

went to the park and recorded using the microphone, lorries, buses, squeaky cars and ducks; quack, quack” - Sense Student



Bell ringing in Truro



Peterborough Cathedral



Dunstable Downs

“We’ve been visiting a lot of new places and recording different sounds, like trains, traffic and the wind, it’s been good fun, Matt is a good laugh”- Sense Student



Bell Ringing in Truro



Dunstable Downs



Hydrophone recording in Stamford

Creative Sound & Music Sessions



Creative sessions at Sense centres involved music making, improvisation, recording and composing all led by Matt with support from Sense staff. These sessions were used as a way of reflecting on the field-recording activities; the types of spaces visited and the sounds associated with these sites. Students listened to recordings made by them or other students and made decisions as to which sounds they wanted to appear on the final exhibition. These sessions also provided an opportunity for an informal assessment of the recognition skills of individual students and shed light on the hearing impairments experienced by some of the students. For example it was noticed that one student was exhibiting much greater loss in one ear over the other and the false-recognition of sounds by many students was evidence of loss at particular frequency ranges. These findings actively fed into the creative process led by Matt who was able to recreate some of these experiences through digital processing and filtering of the recordings in the final installation.

The sessions were also used to pilot the use of new tools for sound reproduction and reception including a range of midi-controllers, syntonic speakers and vests. Students used

midi-controllers such as the Skoog to trigger the recordings they had made and students with chronic hearing loss and congenital deafness were able to attend to the sounds using syntonix speakers and the Subpac vibrating vests meaning that accessibility was built in and fundamental to the overall process.



Input of specialists

Consultation with specialists was invaluable as a source of expertise in developing the project; it not only enabled an imbedded level of research to be applied to the project but also meant that their support could be used to inform the production of the touring show.

The project involved the input of the following experts:

Donna Corrigan, Sense Technology Co-coordinator and qualified audiologist

Call & Response- Independent Sound Art Organisation and Consultants

Dr Louise Fryer- Neuropsychologist, Audio Describer for BBC presenter

Subpac- Developers of Subbass wearable technology

The involvement of the above consultants guaranteed a touring exhibition that was not only of the highest professional standards but also meant that aspects of art, science and technology could be combined in a meaningful and coherent way.

C&R designed and produced the touring installation, which incorporated a large vibrating panel with the title of project in tactile lettering, the use of their speaker system, usually housed in their gallery space enabled a listening environment of the highest quality. Donna Corrigan provided invaluable, informed explanations of the types and uniqueness of deficits and impairments experienced by students, through analysing and listening to the recordings made by them Donna was able to support Matt in poetically recreating some of their experiences. Her critical and knowledgeable approach to the use of assistive technology was also just what the project needed.

Louise Fryer created an Audio Description of the installation and in her report managed to critically reflect on her own experience of the installation by relating to and drawing comparisons between how the audience might experience the installation with navigation and affordance in the outside world.

Subpac, who loaned their vests to us for the project were supportive in recommending how their vests might best be used in the installation and how to mix the sounds heard to get the bests out of their equipment.

Touring Exhibition

During the summer of 2015 the project toured the following venues and festivals:

Metal Peterborough 18th-24th June 2015

Village Green, Next Generation, Southend, 10th July 2015

Village Green Festival, Southend, 11th July 2015

Village Beach Festival, Grays, Thurrock, 18th July 2015

MK Gallery, Milton Keynes, 5th-6th September 2015



"I felt like a train past right in front of my eyes"- Audience member



“The sensory experience was arousing for our learners, the changes in sounds created continuous responses, the vibrating vest was the best part”. -Sense Staff

The partnerships developed with both **Metal** and **MK Gallery** meant that the installation was able to reach an extremely broad audience: ranging from local artists, students and staff from Sense centres and accommodation, arts professionals, students, local passers by, ravers and partiers, school children and local politicians and councillors. Striking were the number of groups or individuals from the disability community who accessed the installation, not just those involved with Sense but those representative of a cross section of the sector. Bringing the installation to the **Village Green** and **Village Beach** festivals ensured a diverse and largely non-specialist audience were able to access the project. At **Next Generation**, groups of young people were queuing up throughout the day to visit the piece and with almost 30,000 people at Village Green, the installation had a constant flow of visitors.

Due to the disability focus of the project the venues involved in the touring exhibition were able to expand their own audiences to reach a much higher number of individuals from the disability community than usual. The tour launch day at Metal Peterborough, for example, attracted over 70 disabled visitors. New links have already been forged between these visitors and Metal, with Sense students for example now accessing other creative opportunities at Metal, such as taking part in the development of game-based App for Peterborough.



"I liked the vibrating vest because I could feel the sounds, the combination of senses made it seem like I was there for age" s- Audience member, Peterborough.



Installation view- Milton Keynes



Local school visitors as part of 'Next Generation' Metal, Southend.



Village Beach, Grays, Thurrock.

As is evident from the images, the touring installation was reconfigured to suit the different spaces that housed it during the cycle. The installation is highly flexible in order to accommodate different audiences and has now been permanently housed at the Sense centre in Keech, Luton. This will allow students and staff to enjoy it well into the future and will be central to some of the daily activities at the centre.

Accessibility Training

“The impact of the sessions was really positive, the use of technology was really person-centred and this meant that the sounds could be personalised, involving a great deal of learner choice”

An issue that came up repeatedly during the practical sessions with students was the need for staff training around the use of some of new equipment. In order to meet some of this need, 10 training sessions for Sense staff took place and these incorporated the equipment and activities used by Matt during the project.

There exists a paradox when it come to the use of new technological tools within the disability sector whereby technological developments, in particular audio technology, are lead by, and aimed at, disabled users yet individuals often still use older and less advanced tools than in other markets. Feedback from staff training has been overwhelmingly positive, with all staff enthusiastic about the benefit and importance of integrating new equipment into daily and specialist sessions. Staff were very excited and eager to obtain and incorporate these new tools and the majority of staff felt confident in using the new equipment but almost all staff stressed the need for ongoing specialist training in order to maintain use or look for emerging technologies which would benefit students. Staff also reflected on how much they enjoyed the chance to be students and the experience of this training helped integrate them into the project on a much deeper level. Two of the training activities that proved particularly popular with staff were creating audio diaries that could be put online to share activities with friends and family and recording the soundmarks of local environments that blind students use to navigate on a daily basis. The popularity of these activities highlights the power of simple recording and listening activities and their potential to allow reflection and the sharing of learning.

The hope is that the training will create a meaningful ongoing legacy for the work done so far and will enable the tools and skills acquired during the project to remain active and meaningful beyond the project period.

For Matt the training was an opportunity to further develop pedagogical methodologies around sensory loss, following the need for a personalised approach to technological tools but a holistic and coherent approach to creative practice.

“Being able to see the student’s responses and hear their feedback will help us plan new sessions and activities as a result of the training”.

Participant experience



Performance by Students from Hampton as part of tour launch at Metal, Peterborough

The project has supported participants in gaining musical and communication skills and in building self-confidence in both acting alone or as part of a team in a new activity. The recording process has enabled them to gain practical skills by using new technology through which they have mediated new experiences and gained confidence.

Listening sessions have helped them reflect on the process, associating new sounds with specific environments and emotional responses. A key part of the process has been the inclusion of staff and participants in the decisions over new places to visit for recording. This has enabled them to exercise significant decision-making in choosing new activities that reflect their interests. Some of the participants had, for example, not travelled on a train before and so the process of negotiating a busy, noisy station and travelling on board a train was for many both exciting and exhilarating.

One significant impact of the project has been in supporting learners to respond to these environments, and as a result extending their affordance of possibilities when it comes to navigating environments. As one of the support staff commented:

“The project has improved awareness of place-related sounds and helped students relate sounds to environments”.

Assumptions are sometimes made around an individual’s disability and what they may or may not respond to. A common experience of mine has been that when presenting a set of headphones and a microphone to a participant with very poor hearing to be told that they won’t be able to hear anything. A common result however is big smiles and lots of giggles from the person wearing the headphones. I don’t know what the participant may or may not be hearing but it goes to demonstrate the importance of not taking anything for granted and just trying out new things.

A sense of pride and connectivity has been an encouraging result of the project. For example, deafblind participants in the first phase of the project were clearly proud that their contribution had been put on the aural equivalent of display. One participant said, “It was nice to recognise samples of sound we were part of.” Participants and staff were also

excited to hear about and meet others from different centres around the region and beyond demonstrating the importance of projects as much needed opportunities for connection as well as creative endeavor. The launch event in particular was an opportunity to represent and celebrate the deafblind community.

Staff Experience



As described above, an integral aim of the project was to engage staff in the activities providing new experiences and ideas for creative activities. Staff members have also received training in practical skills such as recording and music making. Perhaps more important is that the activities, which broke the users out of their routine scheduled activities, enabled new dynamics to emerge. Many staff commented that the project has helped them to strengthen their relationships with individual users as they got to know them better by interacting with them in a different setting and in a different way. Staff also spoke of returning to some of the sites visited during the gathering sessions and or initiating their own field-recording trips to new sites.



Audience Experience

A liked the range and quality of sounds and that they were experienced in a tactile as well as an auditory way- combined together it gave and an unusual experience, really effective and experimental! - Peterborough

Audience reactions in terms of the validity of the project, creative and production values and accessibility have been overwhelmingly positive. People really enjoyed the immersive quality of the work and valued the opportunity to experience something, which for most people was very new. However, many people found aspects of the experience challenging. As Louise Fryer reflects:

“While some people found this space disturbing and claustrophobic others thought it was fun, happy, sunny and peaceful and returned multiple times”

Some found the work “disorientating” and “scary”, while others found the same moments “blissful” and “exciting” Some of these reactions are possibly down to the fact that Interestingly they show the extent to which we all experience the world in very different ways regardless of disability. Most importantly they demonstrate the impossibility of creating a broadly pleasing artistic experience and the need to test the limits of an audience, just as the limits of many of the participants had been tested in some of the activities.

One observation repeatedly stated by many visitors was the extent to which the installation made them think about what it might be like to have sensory loss. It was pointed out on more than one occasion that work like this might pay a valuable pedagogic contribution in schools and colleges as away of breaking down barriers between students

Effort was spent informing audience members about what they would be experiencing and the environment, which they would be entering prior to doing so. This proved of great benefit as it helped put audience members at ease before entering the exhibition space.

Again Louise Fryer's observations are again useful:

“The final lesson stemmed from the fact that disabled visitors wanted information about what the installation held in store. Sensory loss leaves you vulnerable; it is hard to extract yourself quickly from a space if it turns out to be not empty but threatening on some way. Advanced reassurance about the facilities available, the layout and the availability of people to help, allows people with sensory loss to fully engage with immersive installations such as Matt's that we can all learn from. “

The need for support prior, during and after is something that can definitely be built upon for future projects.

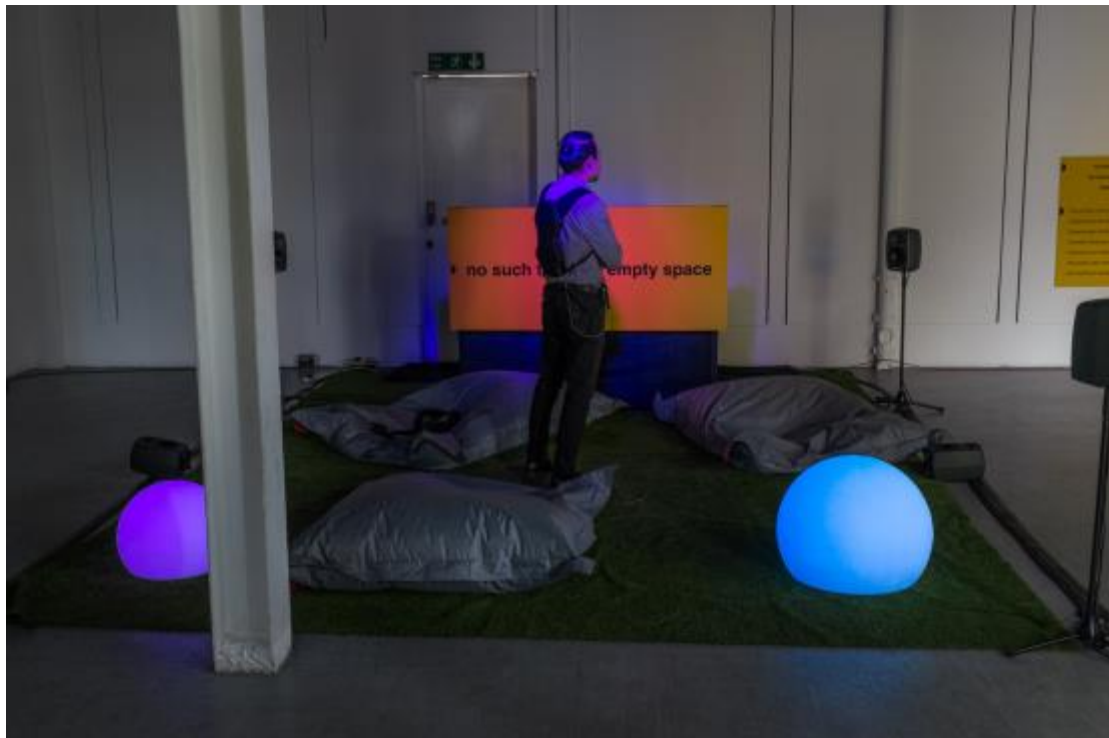


Audience feedback from Metal Peterborough

Tools

"I liked the vibrating vest because I could feel the sounds, the combination of senses made it seem like I was there for ages" - Deafblind visitor

The project involved the use of a range of standard and cutting-edge recording equipment, such as hydrophones and midi-controllers; as such it functioned as a testing ground for possible new tools for creative use by Sense in the future.



Audience member with vibrating vest at MK Gallery.

Here's one example of the experience of one participant in using a shotgun microphone: We wanted to find out how high-end equipment might extend our ears across the counties that were visible from the hilltop. On pointing the microphone across the hills, one of the participants commented "there's a car just over there". In the distance maybe two miles away a car was creeping across the valley, it appeared tiny to me but to the student without sight, holding the mic it was his focus.

This experience shows how technology can enhance our possibilities of understanding the world but also how it can potentially confuse us. It reminded me of how cross modal our perception is when working out what's around us. Of particular sonic beauty was a kite being flow above our heads, which accentuated the gusts of freezing, swirling wind. A real favourite amongst all sections of audience members, staff and students was the use of Subpac vibrating vests. In terms of breaking down barriers between disability and non-disability audiences the vests proved highly successful as they allowed everyone to enjoy a haptic response to sound that is shared amongst us all, regardless of our level of hearing. By enabling the staff and students to test out new equipment such as the Skoog, Subpac and other disability and non-disability market apparatus, informed decisions can now be made over what to purchase in the future and, more importantly, how to use it in exciting and creative ways.



Local young people with Subpac's at Village Beach

Reflections

We are largely very happy with all aspects of the project particularly when it came to participant and audience experience and the project, with the help of Metal really succeeded in getting issues around sensory loss 'out there'.

The potential for using creative activities as research and a method of informal diagnosis of group and individual needs was a very interesting and perhaps unexpected outcome of the project and something that could be developed much further into the future.

The project has resulted in strengthened partnerships with the Arts Council England and the formation of new ones with Metal and MK Gallery and has also helped foster a feeling of community between the disparate Sense centres. This is something that could have been developed further as part of the work. Both Call & Response and Subpac have benefited from the project by being able to work with such a wide range of users and both are keen to develop these relationships further. The disability sector is often perceived as quite closed and due to the nature of their expertise in sound production and reception both C&R and Subpac value those with sensory loss as "one of the most, if not the most important audience".

Matt and Call & Response currently in conversation with The Wellcome Trust about a project that will explore the use of emerging hearing-aid technology for immersive installations in gallery spaces. The intention is that Sense staff and students will be integral in the creative development of the work.

Deafness has always been at the forefront of developments in audio technology and also of our understanding of how we hear in the world. The focus of the work of many artists is an understanding of the world around us through testing out and stretching our perceptual facilities and there are also more and more artists seeking out the potential of new technological tools. We hope that projects like this one therefore demonstrate that the experience of those marginalised due to disability can help us understand and experience our world on a deeper level and therefore these individuals and groups need to be placed at the leading edge of artistic activity rather than at the periphery.

From Sense's point of view Matt's project has illuminated the potential of audio, sound and music projects for creating new enquiries into the deafblind experience. The positive outcomes of the project have been manifold; we have a better grounding for pushing the boundaries in our creative work – for example, trying sound projects with deaf students – more impetus for testing out new equipment and accessing technology, more tools for informal understandings of hearing loss, better understandings of the interrelatedness of sight and hearing loss and a chance to bring together students from across our services to make connections and share ideas and work.

The project has opened up more avenues for deafblind students to make choices and visit new sites – these new experiences were just as exciting, relevant and imperative to the project as was exposing the world to sensory impairment through accessing this wonderful installation. The installation challenged perceptions of the general community about sensory impairment and brought to life the uniqueness of sensory accessibility which we can all relate to.

To have the installation housed at Keech, one of the services involved, brings the project and all it achieved back into the fold. It is important that arts projects provide this type of legacy and connection to those who contributed to it and for them to interact and be part of the unfolding story attached to the many visits and experiences gained through the project.