

Courting Power

Courtroom Acoustics at the Guildhall Newcastle

by Johannah Latchem* j.latchem2@newcastle.ac.uk, sound by Tim Shaw, archaeological scans by Gianluca Foschi

Aim

- ♣ To investigate how the acoustics and architecture of the Guildhall Courtroom, Newcastle silenced or facilitated the voices of those involved in its judicial processes

Objective

- ♣ To use artistic and scientific approaches to create a public sound artwork based on this 17th century court's acoustic history

Methods

- ♣ Data collection on the speech transmission index of the space - or how far voices travel across the room from specific locations
- ♣ A scan of the courtroom - a 3D image of the sound moving round the court
- ♣ Archival research undertaken into historic documents d.1656 when the court was built, and into an historic court case held there involving a woman
- ♣ The findings were used to create a sound artwork based on that woman's story



Manacles in Defendant cell



473 visitors to Courting Power

Background

The Guildhall Newcastle (1655) houses a courtroom containing manacles, iron bars on the defendant box and a barred holding cell. This artwork opened a secretive city space to new audiences through an installation of sound that explored the **courtroom acoustics and architecture**. It addressed the power dynamics of state controlled space, the history of women in the courtroom and its maritime connections.



Aerial view of court, showing jury stand to left

The Show

The masculine realm of the court was explored through acoustics using the case of Margaret Hebbon who in July 1834 was sentenced to transportation to Van Diemen's Land (Tasmania) for 14 years, for receiving a silver watch. The local newspaper reported Margaret as screaming loudly from the defendant's dock upon hearing her sentence, the scream permeating the compartmentalised acoustic boundaries of the courtroom.

- This effect was represented by the occasional siren that could be heard during the section of the sound work played from the dock, informed by acoustic analysis of the projection for a woman's voice from that exact spot using the top and bottom frequencies for the female voice.
- Underwater microphone recordings taken at the mooring site of the convict ship museum *Success*, formerly a prison hulk and a sensationalised spectacle moored at Mill Dam, South Shields, provided an atmospheric and ambient, yet dissonant sound. Simultaneously, whispers resounded *another scene of screaming*; and give way to a judge's gavel that interrupts the lulling soundscape.

Conclusions

- ♣ 1659 courtroom acoustic documents evidence that acoustics **were considered in relation to the materials** used to build the courtroom furnishings
- ♣ There was evidence **Hebbon's scream would have reached the back of the 90ft hall**, both in silence or with background noise
- ♣ Two acoustic measurements were rated **Excellent or Good** on the standard scale for courtrooms to achieve. The defendant's stand to the Counsel was 'Excellent', the defendant stand to the judge's bench 'Good'
- ♣ Normal male and female spoken voices between the judge's bench and the grand jury stand were Bad and Poor respectively



Sound from defendant's barred holding cell



View of Defendant's cell