

The project aims to create a public building within the city centre which invigorates the senses. The building is a national facility for the integration of deaf and hearing people which primarily accommodates facilities for the use of the public with additional specialist services. The site was chosen based on integration and is located on a primary pedestrian routeway in Dublin's city centre (Trinity Street, Dame Lane and St. Andrews Lane intersection).

Realms of focus were devised to allow for increased perceptual awareness within spaces. In order to gain this focus the monolithic building form was chosen to remove the facility from the chaos of the city centre. Openings act as mediators between two worlds and within the plan free space is created. For example the external walls of the heart (visual realm) are 5m in depth and contain alcoves which in turn provide vertical access to the cafe above.

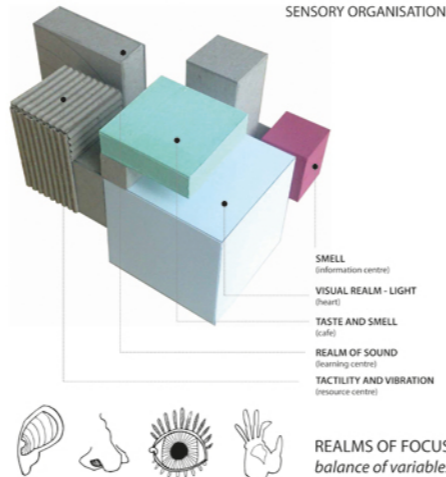
Concrete's versatility was used to reinforce the concept, acoustic needs of the spaces and functional requirements of the space.



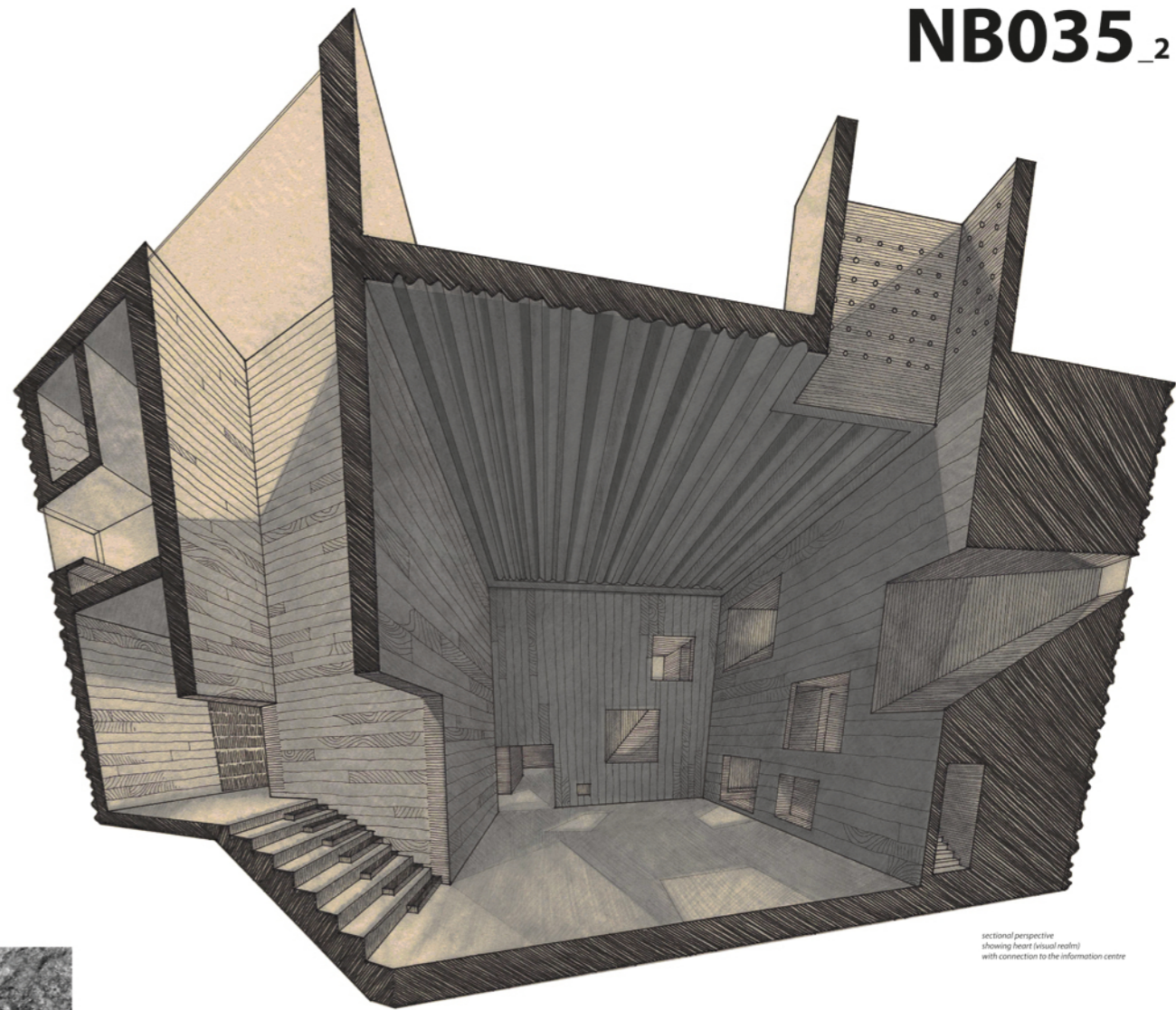
CONCEPT: EROSION BY THE ELEMENTS

light, air and water

REMOVAL FROM CONTEXT



1:2,000



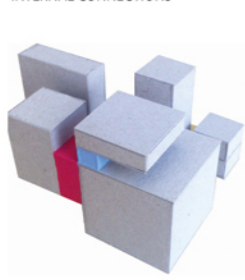
sectional perspective showing heart (visual realm) with connection to the information centre

ORGANISATION



- circulation
- public areas - heart, theatre and club space
- information centre
- learning centre
- resource centre
- cafe

INTERNAL CONNECTIONS



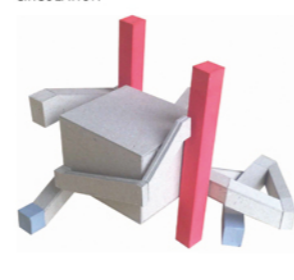
- aural
 - heart - learning centre
 - heart - cafe
- visual
 - heart - resource centre
 - heart - theatre
- physical
 - heart - information centre

EXTERNAL CONNECTIONS

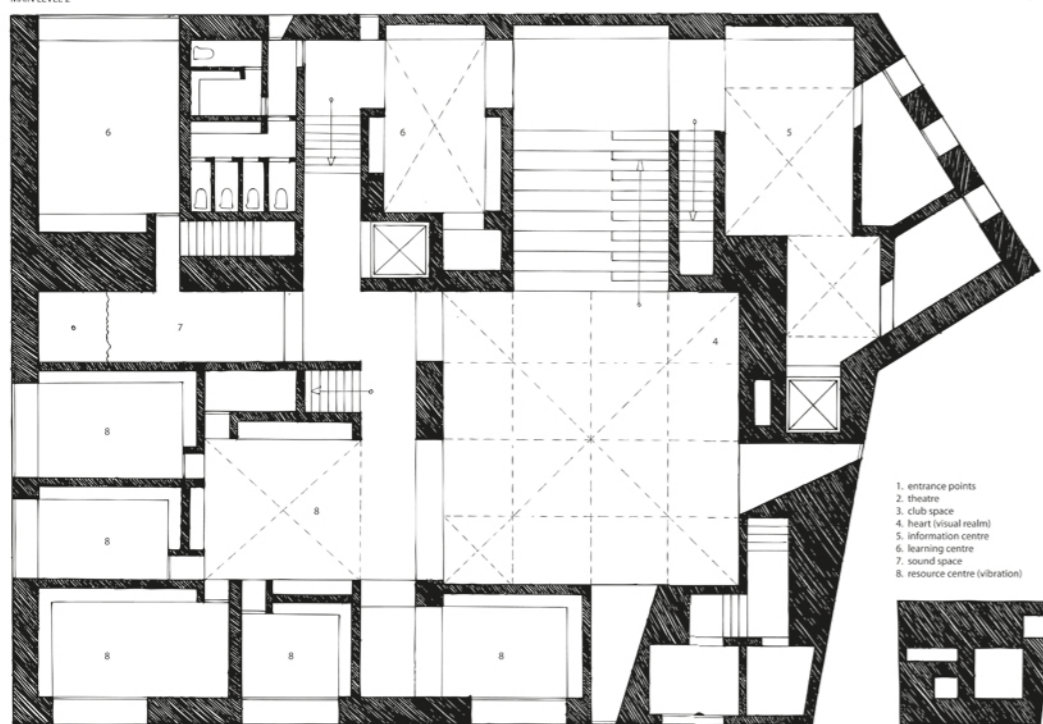


- club space - Dame Lane
- theatre - St. Andrews Lane
- heart - east and south light
- heart connection - sky
- learning centre - rain
- information centre - Trinity Street
- acoustic OUT
- time
- IN
- IN environment
- IN environment
- visual

CIRCULATION



MAIN LEVEL 2

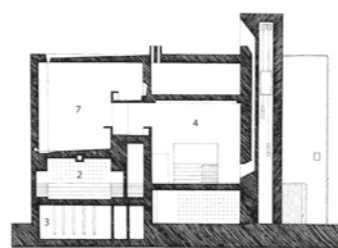


1:100

- entrance points
- theatre
- club space
- heart (visual realm)
- information centre
- learning centre
- sound space
- resource centre (vibration)



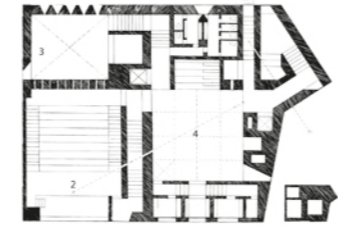
freeplan diagram



scaled to fit



upper level

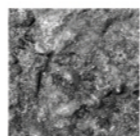
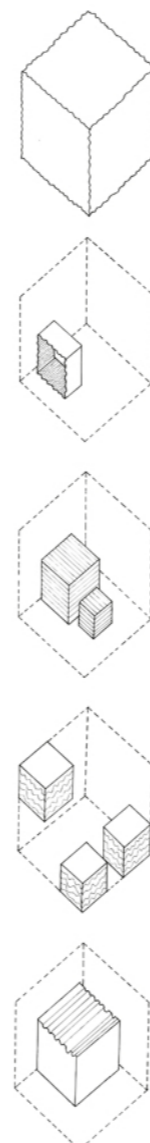


main level 1



ground level

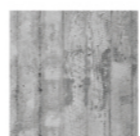
CONCRETE ORGANISATION



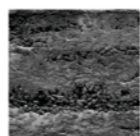
homogeneous exterior very rough textured surface created with sculpted foaming glass insulation formwork



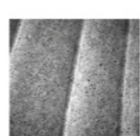
carved thresholds comb-chiselled surface created post-formwork



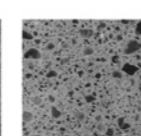
main spaces boardmarked created with rough sawn wood formwork



secondary spaces rammed concrete created with dry mix, packed in formwork - no shadow gaps

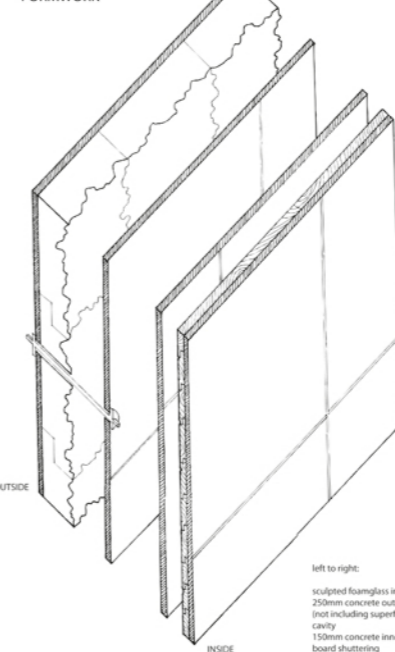


diffused form acoustics requirements of heart created with undulating metal formwork



reflective finish to enhance sound perception in the sound space polished finish with exposed aggregate

TYPICAL FORMWORK



OUTSIDE

INSIDE

left to right:
sculpted foaming glass insulation
250mm concrete outer layer (not including superficial layer)
cavity
150mm concrete inner layer
board shuttering

- GROUND STRUCTURE**
 - concrete layer
 - fine sand
 - coarse sand
 - geotextile mat
- FLOOR STRUCTURE**
 - 100mm concrete finish C120
 - 100mm screed
 - separating layer
 - rigid insulation
 - 40mm concrete slab
- WALL STRUCTURE**
 - outer layer
 - 250mm concrete exterior layer cast with foaming glass insulation formwork
 - 450mm foaming glass insulation
 - 200mm concrete inner layer with boardmarked finish
- THICKNESS**
 - post formwork
 - concrete comb-chiselled with 80mm chisel 90 degree angle to street
- OPENING**
 - 80mm charred wood door

CONCRETE RULES

- REINFORCES THE CONCEPT**
 - rough exterior
 - textured main spaces
 - thresholds carved
- RESPONDS TO ACOUSTIC NEEDS OF SPACE**
 - heart - absorbing
 - sound space - reflective