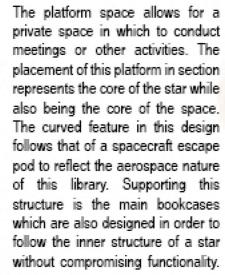
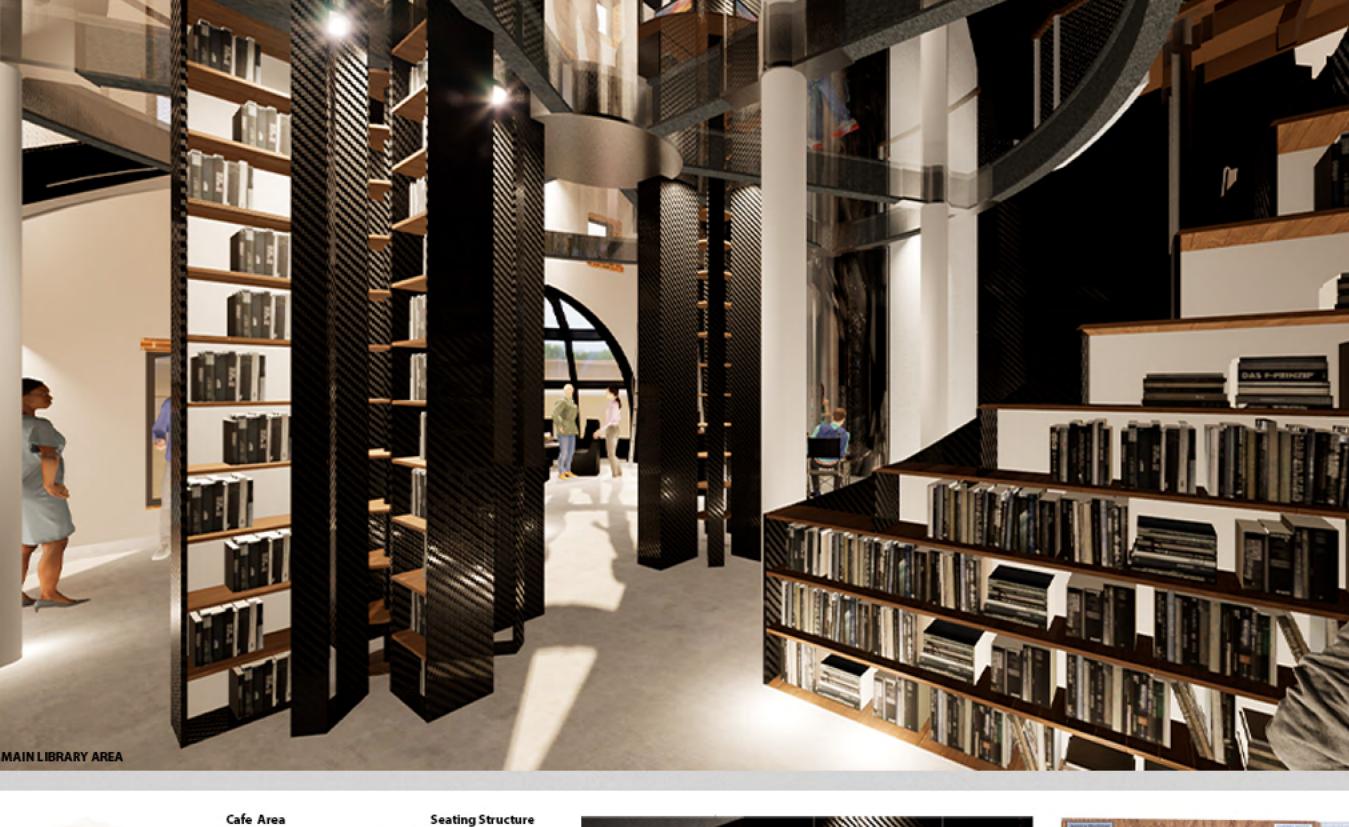


The Solar Spectra Library is a space designed for the needs of IASTI students whether this be individual study spaces, group study areas or the café. The inspiration for this design has originated from stars and aerospace. I used organic forms taken from stars but also structural inspiration from aerospace engineering. In plan this unique design resembles a two dimensional depiction of a star while in section showing the three dimensional shape stars hold. These forms can be seen throughout the design such as in the group seating areas.

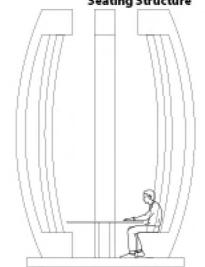






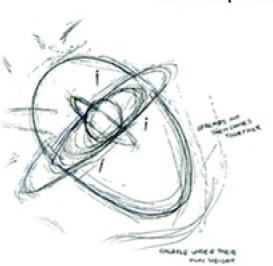




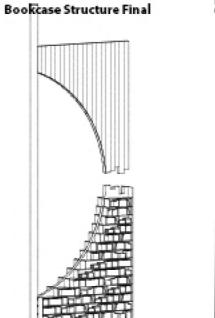


Conceptional drawings showing origial design sketches, inspiration and developments.



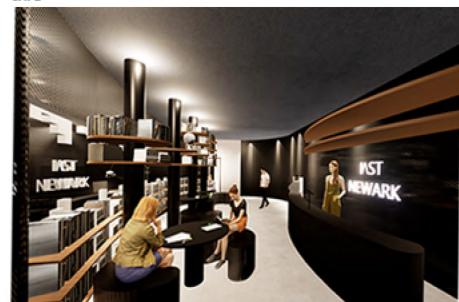






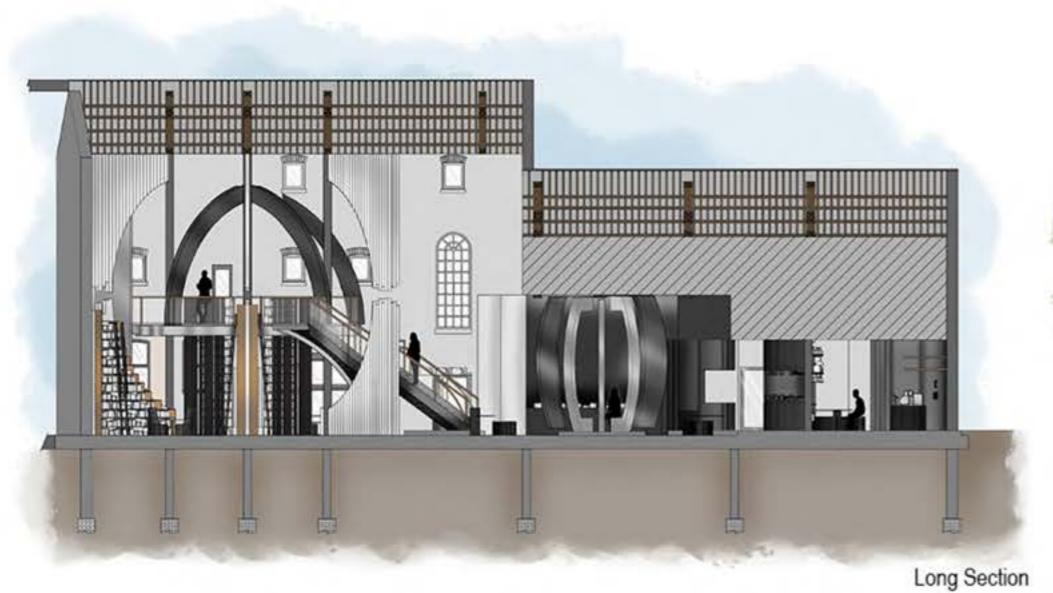


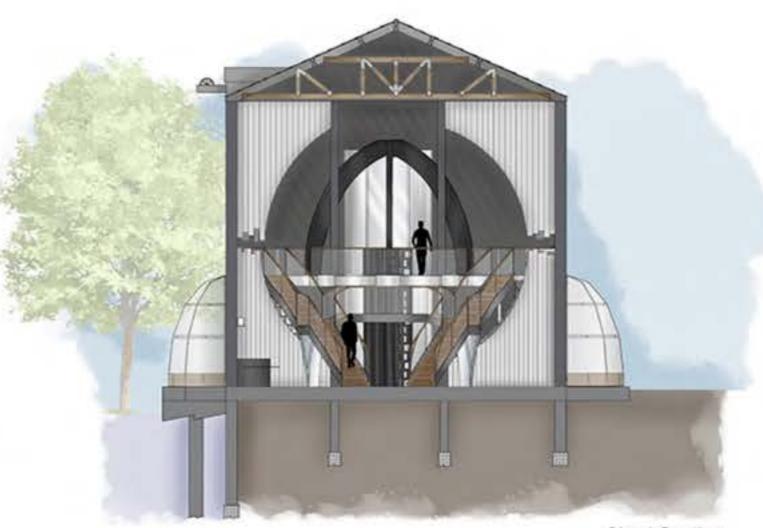






Materiality choices in this space have been strongly thought out in order that they are both sustainable but also compliment that of my concept. This resulted in the majority of the materials in my library being recycled from air and space crafts. These materials are; fiberglass, steel and aluminium. Other materials in my design such as cherry wood are chosen to combine classic library materiality with the other innovative choices.



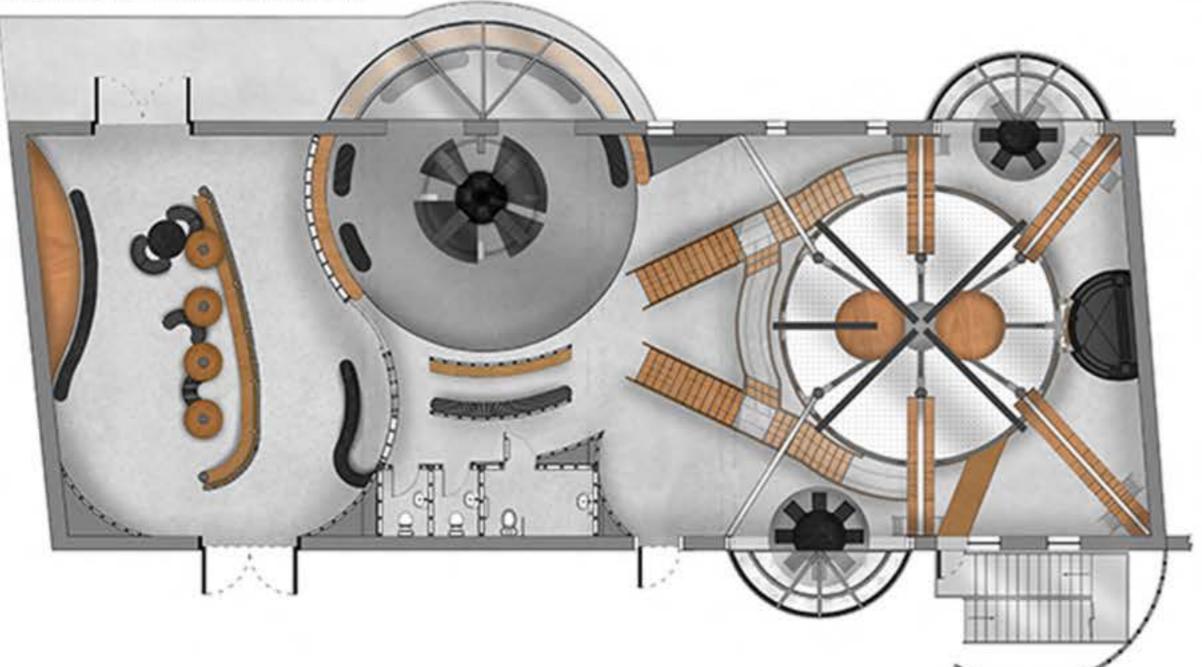


SOLAR SPECTRA LIBRARY

When entering the library you are initially met with the cafe to your left and reception to your right. Following past the reception will lead you to the entrance of the main library area. This holds the waiting area, main study areas and and main library bookshelving. The main library area consists of a main platform work area above the large bookcase structures. This can accessed by the central staircases or the accessible lift.

Short Section

Ground Floor Elevation with main platform



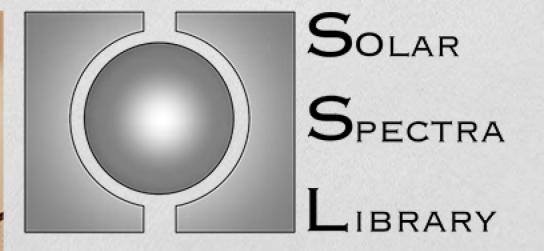
Combing linear and organic forms in this space is vital to the effect it produces overall. This futuristic design speaks for itself. The central stairs and lift separates the space while allowing viewing points to appreciate the library but also allowing movement between the ground floor and platform. With the addition of exterior dome seating it contributes the open dynamic of the space and allows for a larger distribution of natural light.









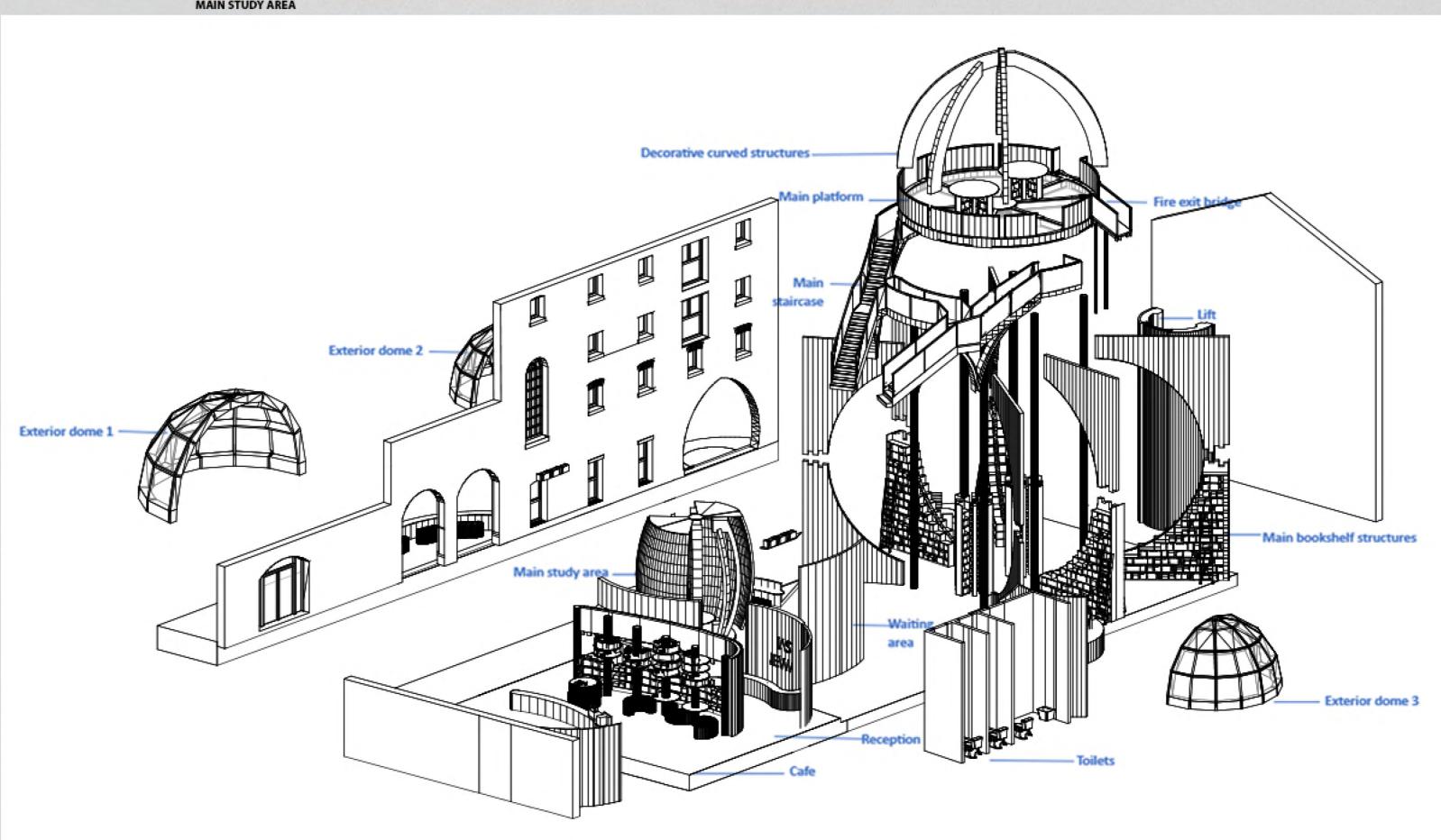


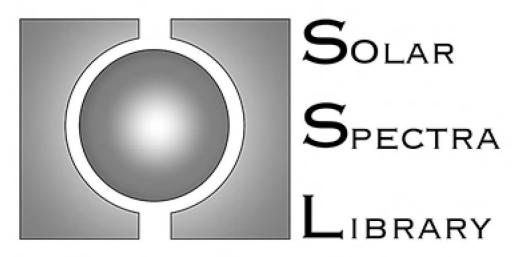
The lighting of the library is different throughout the space whether this be bright or dimly lit. This is done using LED signage, spotlighting, wall lighting and over-head decorative lighting features. In the café and entrance unique lighting features create visual interest and a bright environment. In comparison, the use of wall and ceiling mounted lighting can be manipulated depending on the desired needs of the users.





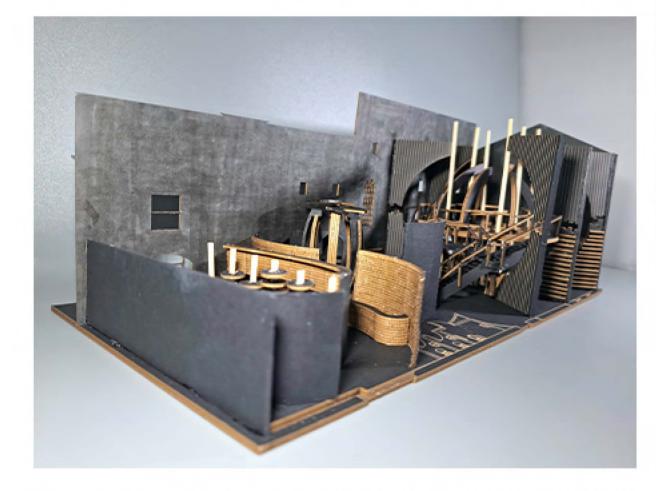
This axonometric shows the layout in which I have chosen for the library. It demonstrates the collaboration between my design elements and the layers created in these elements. All design elements react with the existing structure of the building in complimentory way fitting the design concept. While maintaining a unique design it is vital to ensure accessiblity to everyone therefore, this has been considered throughout the whole space with accessible walkways and acess to the platform structure.





The Solar Spectra Library is a space designed for most ages with spaces catering to all needs. In an accessible location, it opens up opportunities for students to read and study in an inspirational space. This design not only elevates and modernises the landscape but it acts as a catalyst for the exploration of Newark and what it has to offer, meanwhile also provoking social activities for the local community. By being an addition to the new IAST Newark facility it pushes the design importance and relevance to the surroundings.

Sharing design similarities with aerospace facilities and vehicles it created a futeristic atmosphere with materials not common in interior spaces.



Photograph taken of physical 1:100 model displaying the interior of the building. From the extensive curves of the façade to the use of light and shadow within the spaces, this model invites viewers to immerse themselves in the envisioned environment and explore its potential. As a visual narrative, it not only communicates the design intent but also a deeper understanding of the proposed architectural intervention, igniting imagination and fostering dialogue.



MAIN LIBRARY AREA



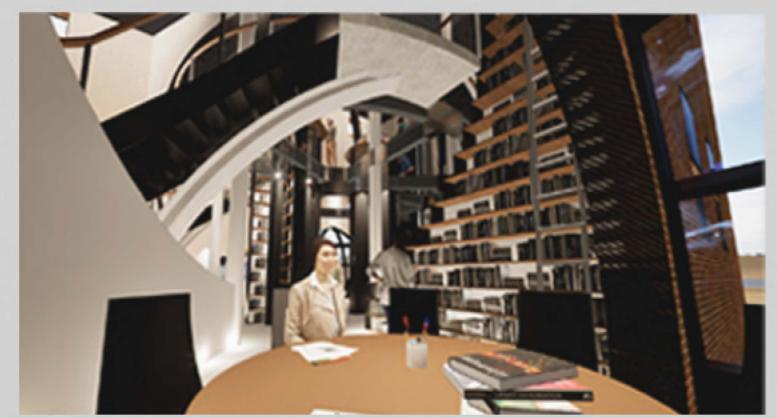
DOME STUDY AREA 2



MAIN LIBRARY AREA



ENTRAL PLATFORM



DOME STUDY AREA

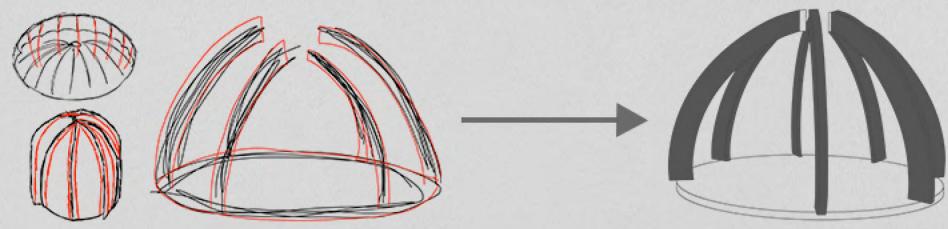


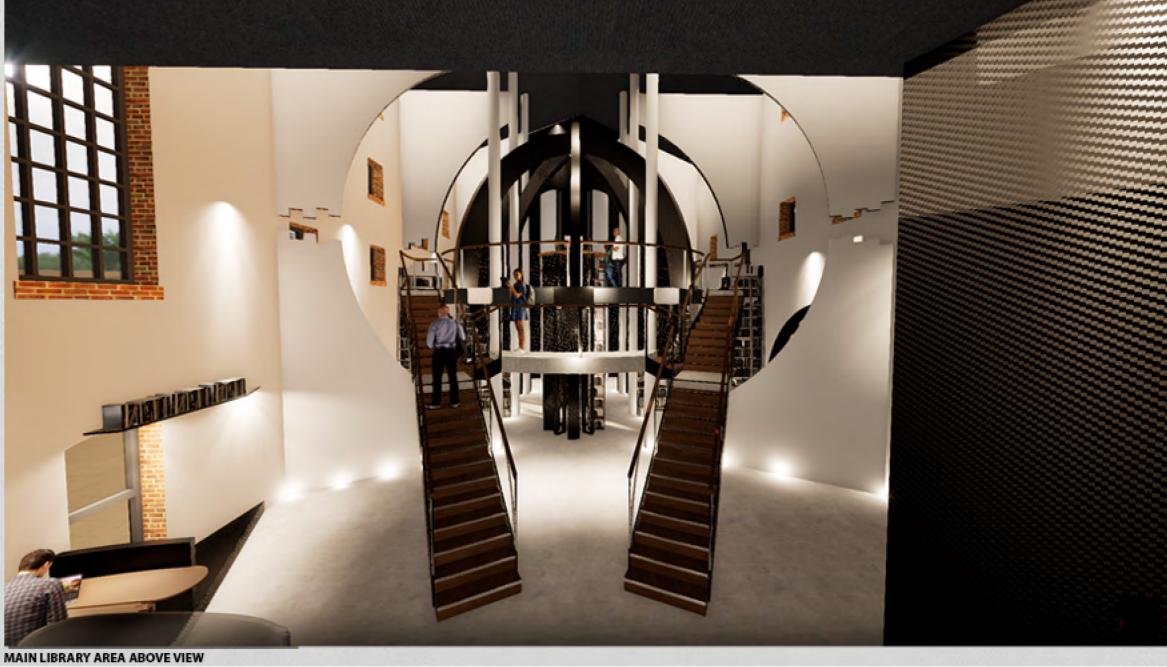
MAIN LIBRARY AREA

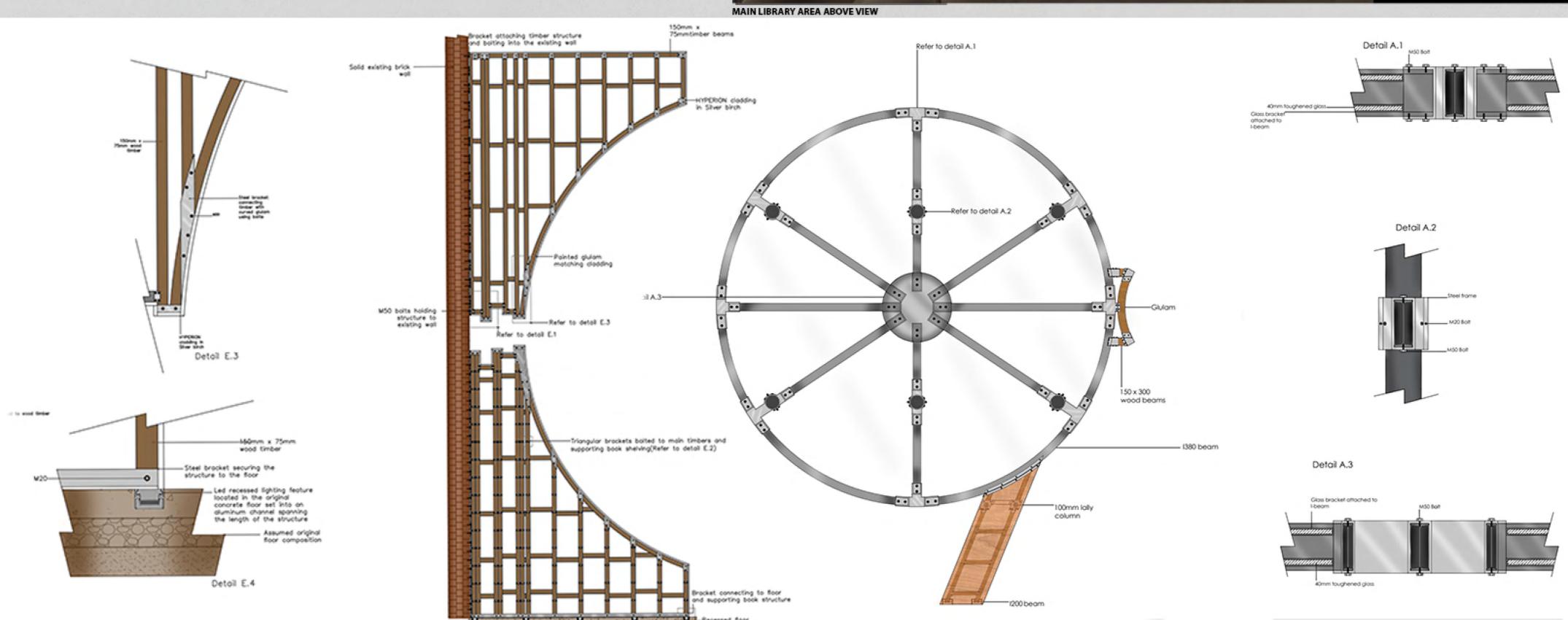
SOLAR SPECTRA LIBRARY

Following the unique nature of this design, an immense amount of consideration must be taken in order to ensure structual stability. When technically resolving this design, aethetics have not been compramised. The visual structure of the platform lends itself nicely to the industrial nature of this library design. The toughened glass panneling inset into the curved I-beam frame creates a marvel in the centre of the library area.

The large curved bookshelf structures spanning the length of the space compliment that of the platform with their vast size. Each shelving structure is custom made to fit perfectly between the existing building walls and columns







glighting (Refer to detail E.4)