

The Hall





PART 3 DESIGN

DESIGN PRINCIPLES & OBJECTIVES

The overarching proposal is to replace the existing 1980s Centenary building with a new building which will link into the original and historic main school building.

To achieve this, we intend to focus on the following core elements:

WATHEN HALL

Wathen Hall will be demolished and rebuilt on three levels: an additional lower ground level housing a new state of the art sports hall and theatre, two large music and drama studios at the current playground level and an additional three classrooms above the new hall. The total increase in height will be 4.5m at the tallest point, with roof levels needing to be increased to accommodate studio space.

Refurbishing and extending Wathen Hall versus rebuilding has been investigated. A new building will be more sustainable and will enable the school to operate more efficiently. It will also be quicker to demolish the existing building entirely and re-build a new building than to retain the existing Centenary building, which will reduce the length of the construction period.

ATRIUM

The main atrium will become a focal point for the school where the overall layout will become legible and navigation far easier. The new four storey atrium will connect to the Cooper Hall, the Upper Hall, the gallery above, and the existing classrooms on the second floor.

The atrium will be crossed by the glazed link which is the interface between the old and new buildings. At the front this will have small support rooms and to the rear this will feature a new stair and lift connecting all of the main and split levels.

The atrium will be returned to the heart of the building as it was originally, prior to being lost in a fire in 1982.

ART ROOM

Works to the original school building will mostly be limited to reconnecting some corridors and light refurbishment.

However the art room will be transformed by raising the roof by 1.3m allowing the full width of the space to be used. This effectively doubles the size of the room.

This will enable a full class to study art at once, thereby relieving pressure on a complicated timetable.

The form of the roof has been designed such that the daylight/sunlight impact is no worse than the existing.

CENTENARY BUILDING

The Science Block will be reconfigured to provide an upgraded entrance at street level, two additional classrooms at ground level, a further two classrooms on the roof which will replace the current plant rooms, and improved changing facilities and storage.

BASEMENT

Very limited height is being added to the current site, due to its sensitive surroundings. We are therefore proposing to extend below the existing basement to ensure that there is suitable space.

The new basement will not extend past the footprint of the current building. It is proposed that locker rooms, storage and workshops are situated in the basement.

OUTDOOR SPACE

The proposals will not encroach on the playground space. The staircase wrapped around the TPO tree will connect the playground to a new terrace under the canopy of the tree. The studios can be opened up to the playground to enlarge the effective play space by 25%.

By removing the changing blocks in front of the building line a small front garden can be introduced to provide an improved setting for the new entrance. This will also be more in keeping with the rest of the street.



DESIGN DEVELOPMENT

In the lead up to making this application the design team have investigated numerous different solutions before settling on the preferred solution. These are a couple of examples.

EXPLORING RETAINING AND REFURBISHING THE CENTENARY BUILDING

The first idea for the Centenary Building was to try and work with the existing building to make key improvements without full demolition. The proposals addressed the relationship with the street by removing the changing blocks and re-cladding the building in a higher quality red blend brick. It also addressed the roof-line with a new floor added in a mansard roof.

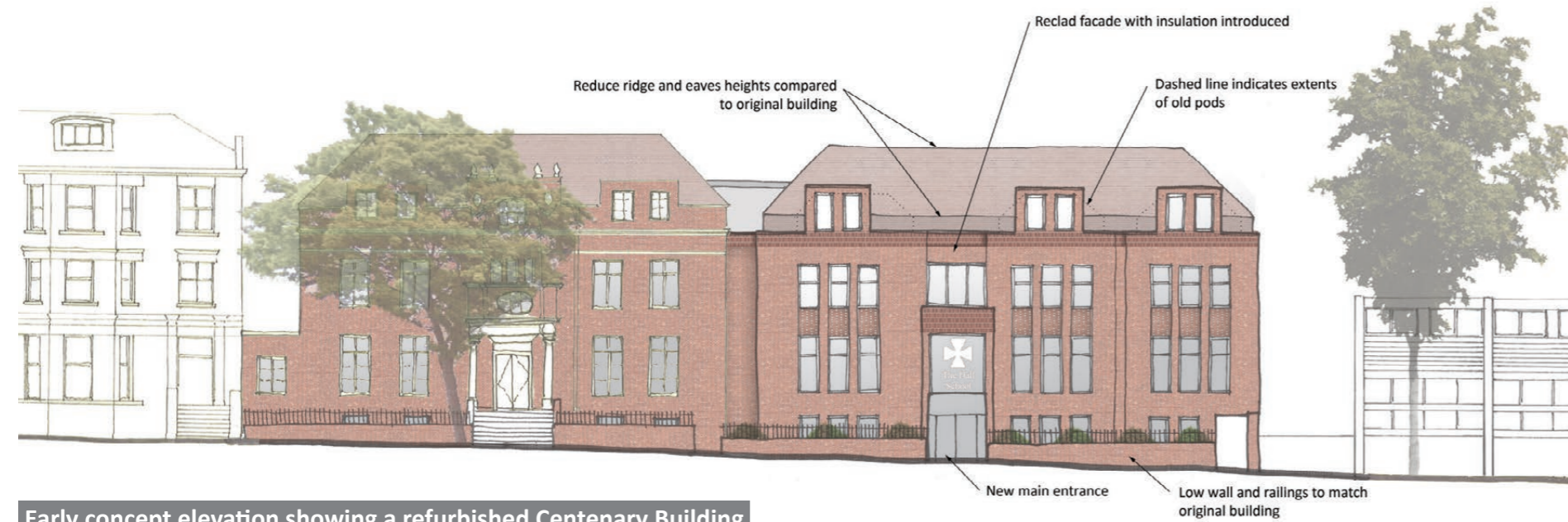
Internally the proposal was to remove the staircase to enable a new street level entrance and reception. However there were some key constraints which made a new build solution more viable, though this still retains some of the original thinking.

The amount of cut and carve required to a building which is only partially steel framed would have been fraught with risk potentially causing delays on site and cost problems. The building structure also made underpinning for the increased basement very slow, disruptive and inefficient in terms of area wasted on structure.

The building also posed a logistical problem for the rest for the site as it effectively blocked all access requiring either to lift over the top or go through the building.



Early concept sketch showing a refurbished Centenary Building



Early concept elevation showing a refurbished Centenary Building

ADDRESSING THE SPLIT LEVELS IN THE ORIGINAL SCHOOL BUILDING

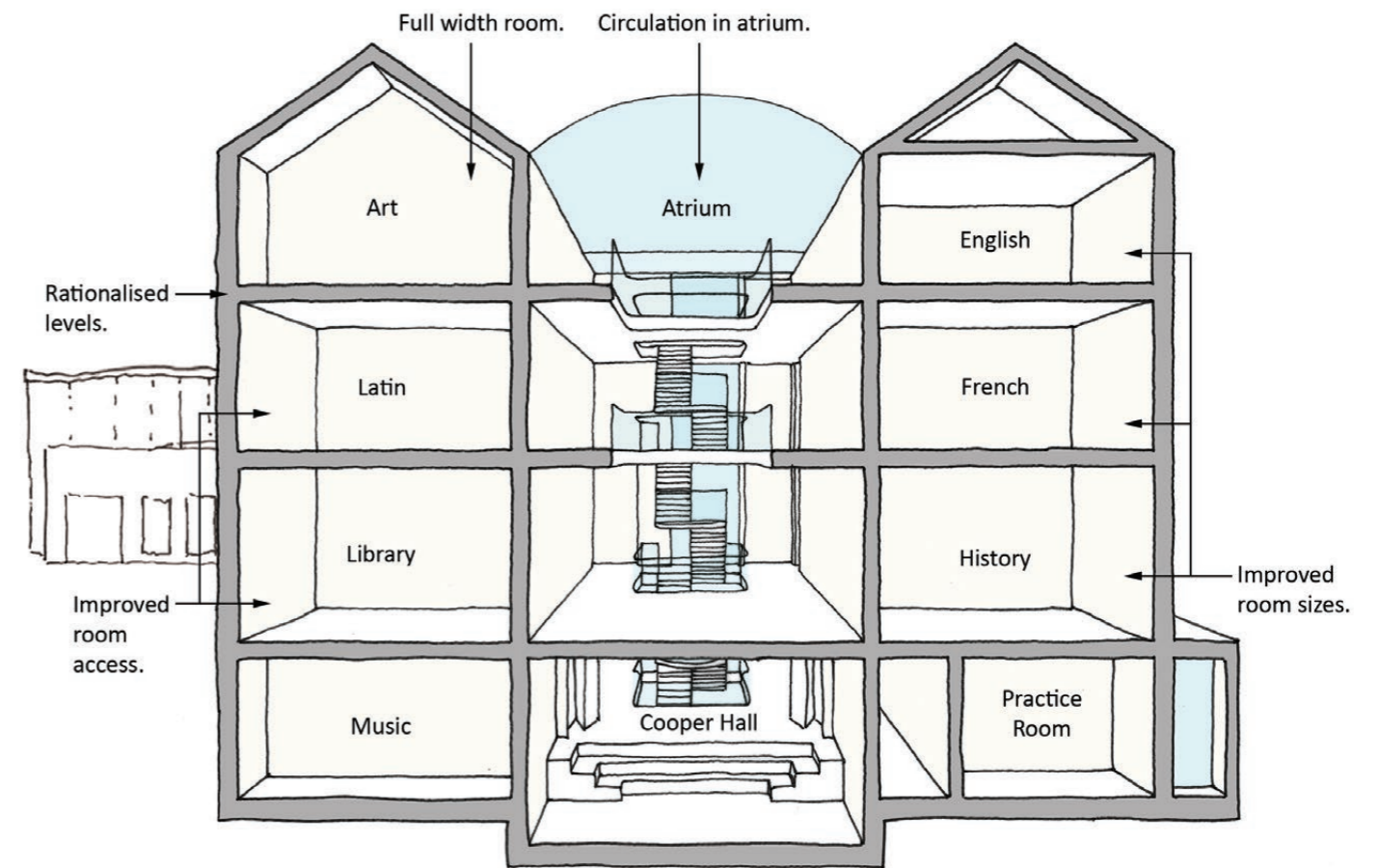
The first idea for the rear of the building was to refurbish the existing buildings to create level floor plates throughout the building. This would have dramatically improved circulation and access within the building.

This would have required the original rear of the building to be extensively refurbished as the floors, intermediate walls, windows and doorways would all have needed to be altered. Upon further investigation this level of refurbishment would not have been worthwhile and knocking the whole of the rear of the building down to rebuild would have been unacceptably harmful to the original fabric of the heritage asset and prohibitively expensive.

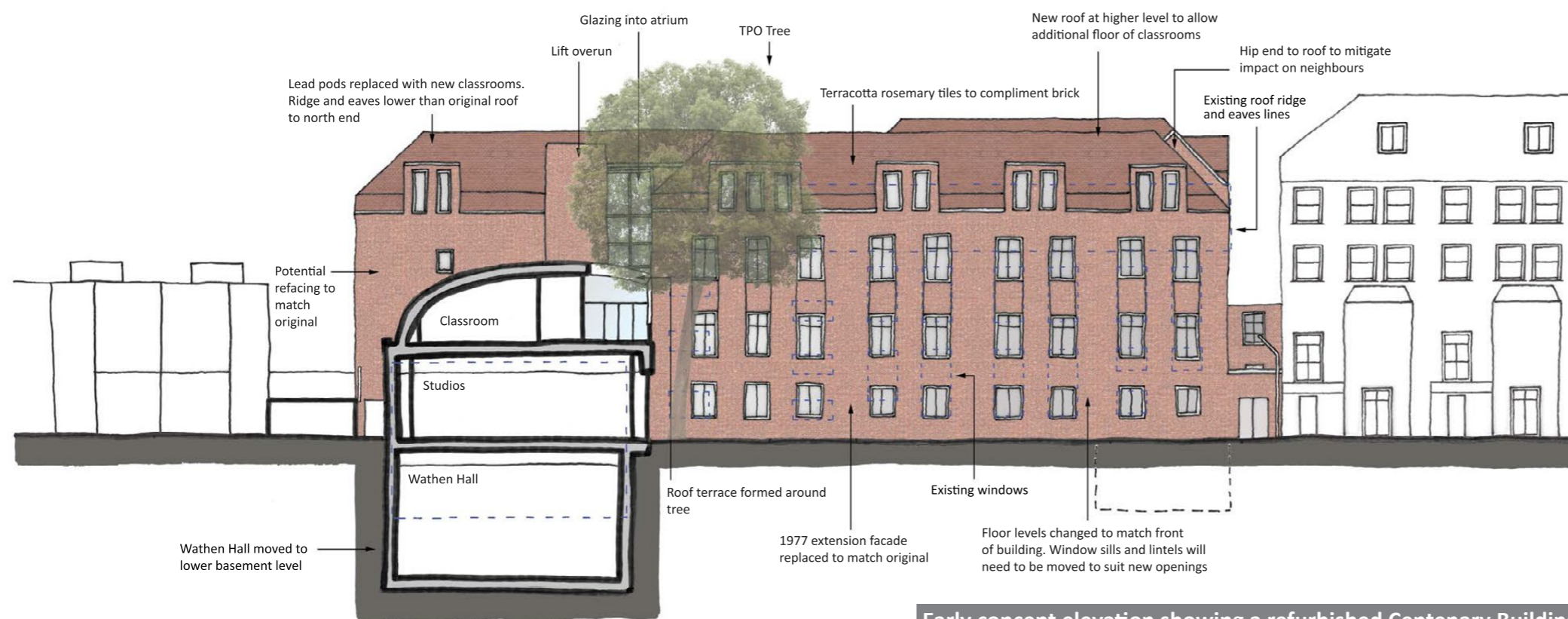
Adding a full second floor to the rear would have also increased the height to a degree where the increase of shading to neighbours could have resulted in loss of amenity.

Making all the levels common was also complicated by the enhanced ceiling heights required by some of the larger spaces. The new studios and Cooper Hall both worked better with the upper ground level so some kind of split level was inevitable. We investigated lowering the floor of Cooper Hall but this would have required underpinning the original school building.

The current proposals work with the split levels by positioning the new main stair and lift where the levels meet so that half landings can access the split levels. This allows wheelchair access to all area bar a couple of offices on a mezzanine.



Early concept section showing level floor plates, and sunken Cooper Hall



Early concept elevation showing a refurbished Centenary Building

SCALE & MASSING

OVERALL SCALE

The target schedule of accommodation is based upon a detailed assessment of the school's long term needs based upon guidance in Building Bulletin 103. This required an increase in floor area of 1300m². The constraints of the site have determined the best locations for the additional mass. The key factors are as follows:

- Avoid increasing the mass on the northern boundary to prevent sunlight and daylight issues for neighbours.
- Avoid increasing the footprint of the school
- Remove the lean-tos in the front garden, replacing the accommodation in the basement
- Avoid excavations in the root protection area (RPA) of the TPO tree, this area extends under most of the playground but not under the existing buildings.
- Use levels that allow better on-grade connections between the lower ground floor and the playground.
- Keep the height of the Wathen Hall building in the playground as low as possible.
- Avoid overbearing the southern boundary by not bridging over the alleyway.
- Use mansard roofs to mitigate the impact of adding a second floor to the new building.

The scale of the proposals are in keeping with the massing of the surrounding buildings and has been articulated in such a way as to avoid sunlight and daylight issues and mitigate any loss of amenity to neighbours.

Whilst there will be no increase in pupil numbers, to meet the long-term needs of the current school population the building needs to be expanded. There will not be any increase of the building footprint, with no reduction in the area of playground. This part of the site is unsuitable for development due to being largely covered in root protection areas of mature and TPO trees. There will be some reduction in the foot print of the building with the proposal being moved away from No.24 at the front, and also the removal of the changing rooms in the front garden which are considered unsuitable locations for development.

To increase space without increasing the footprint requires the building to be made more efficient where feasible, height to be added where suitable and basement to be added where practical.

EFFICIENCY

The additions to the building added over time have become increasingly congested with corridors and staircases. The proposals are focused on clearing these out of the way so that a new building can be added to match up to original school building in terms of clarity of layout and levels.

ADDED HEIGHT

Detailed verified analysis has been undertaken to test which parts of the building can be increased in height without harming the daylight and sunlight amenity to neighbouring properties. Due to the aspect of the site it is possible to add height to the south west corner of the building as this will only cast shade on the playground. Reduced mass is deemed suitable for the roof of the Wathen Hall as this is in the garden area behind the main building line and avoids casting shadows over neighbouring gardens. It is proposed to increase the height of the roof to the rear of the original building, however by changing the shape of the roof near the boundary the effect is to slightly decrease the extent of shading.

Overall the height of building has been kept to a minimum, with the second floor space in a mansard, whilst maintaining suitable roof forms for the conservation area. Any further reduction in height would lead to compromised levels for access and ceiling heights negating the long-term benefits of the scheme.

NEIGHBOURLY MATTERS

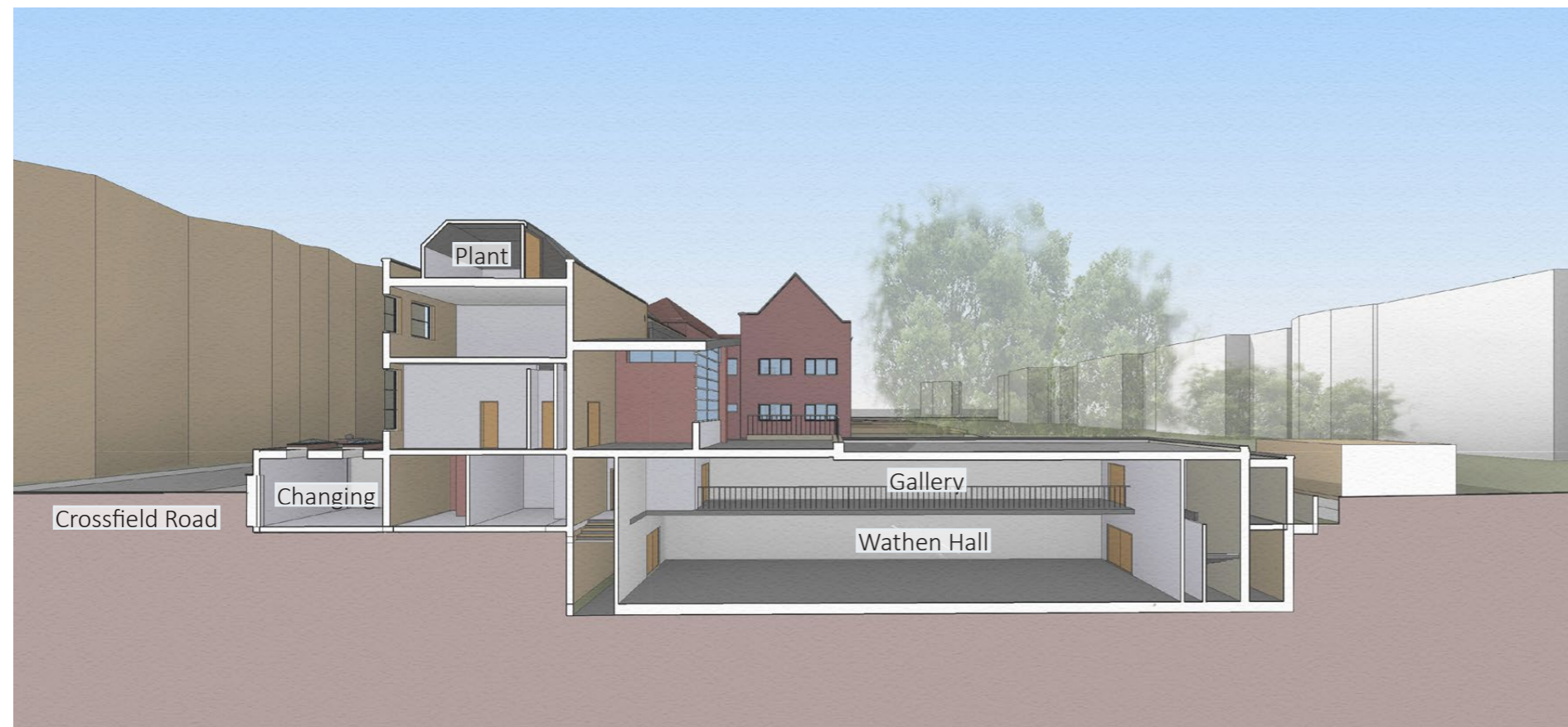
The School recognises very well that it lies in a predominantly residential area, and while the school has been present in its location for over a century it has a responsibility to manage its potential impacts on its neighbours. The School is also aware that there are a number of other schools in the vicinity and the cumulative impacts of the schools operating in this area. It has measures in place to ensure that potential amenity, noise and transport-related impacts (discussed at Page 8) are managed.

The School also recognises that the proposed development will cause impacts on neighbours, notably during the periods of demolition and construction. The new and altered buildings will also have the potential to affect amenity considerations such as daylight, sunlight and privacy. The scheme has accordingly been designed to minimise such impacts as far as possible.

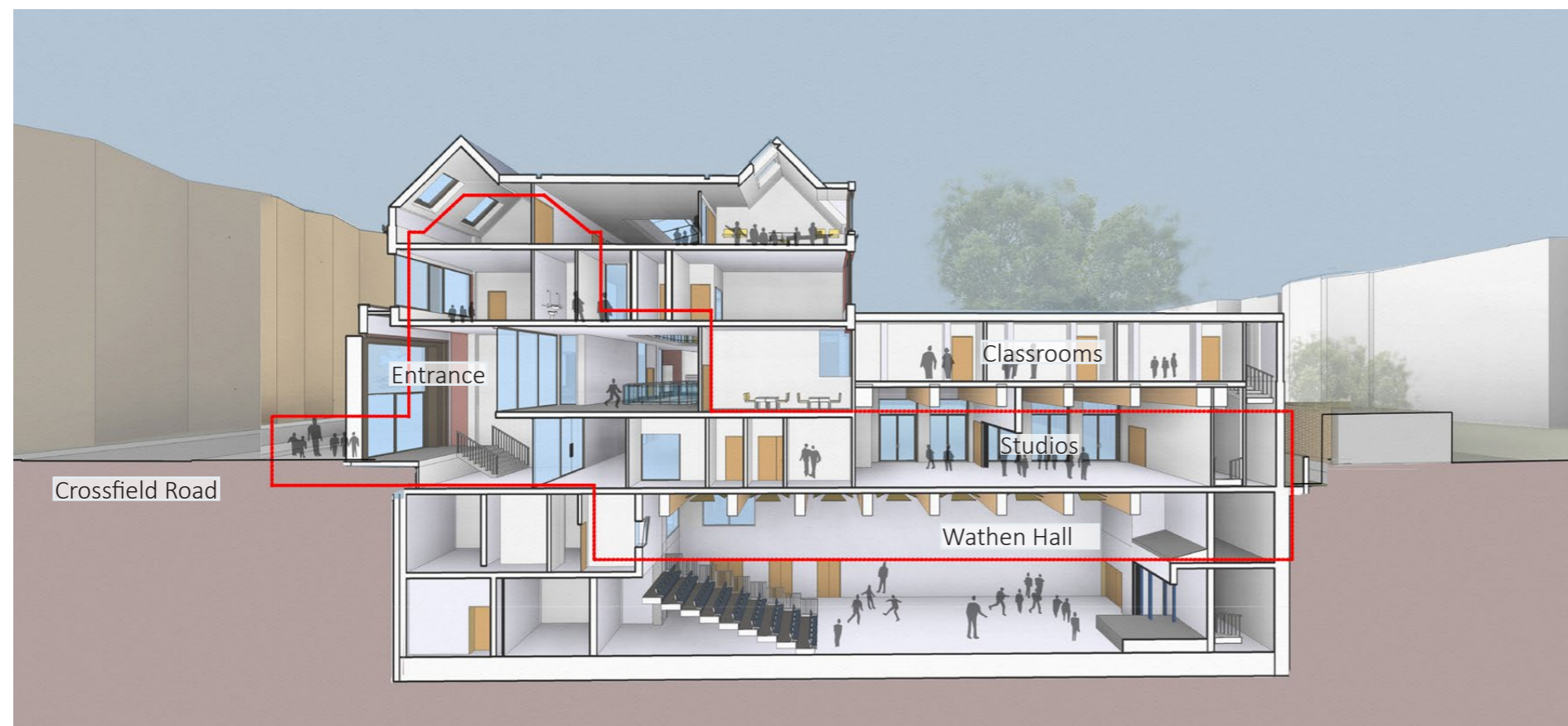
For example, it has been recognised that rebuilding the Wathen Hall and Wathen (Centenary) Building would be quicker than underpinning, extending and refurbishing it, thus reducing disruption.

As a community use, the school has a responsibility to engage with its local community prior to undertaking any development. Accordingly, a detailed and robust programme of community engagement has been carried out at an early stage of the development process to gather feedback from local people about potential impacts. The feedback has been considered and informed the eventual proposals.

PRINCIPLES OF LAYOUT



Section D Through Hall & Entrance - Existing



Section D Through Hall & Entrance - Proposed

REPLACING THE CENTENARY BUILDING & HALL

The fundamental principle behind our proposal is to further the educational experience of the pupils at the Hall. In order to create this environment we need to alter the internal layout of the main school building.

These layout changes include:

- The reconfiguration of floor to ceiling heights, to create consistency throughout the building and to maximise the space;
- Levelling of the floors throughout the building to significantly improve disabled accessibility;
- The 'reworking' of the staircases to create a sense of order throughout the building and allow for an increase in classroom numbers;
- Removal of corridors which are currently dead ends.
- Replacement of below size classrooms with larger ones suited to modern teaching methods.
- Creating break out spaces outside the classrooms for independent and group working.
- Using the atrium spaces to allow air and light to get to the depth of the building improving the learning environment.
- Designing the new building in such a way that it has the space and structure to be adapted as teaching needs and methods change in the future.

