

11th January 2018**WILLIAM STIMSON PUBLIC SCHOOL, WETHERILL PARK****DESIGN QUALITY STATEMENT**

JDH Architects has undertaken the design of two new learning buildings at William Stimson Public School. The scope of works includes construction of 12 new permanent learning spaces (also referred to as homebases), four new support home bases, refurbishment and extension of the Administration building and the removal of existing temporary learning accommodation. The design of the buildings has been undertaken in accordance with the requirements of the Education Facilities Standards and Guidelines (EFSG) as published by the NSW Department of Education, and has been reviewed against the GA NSW Design Guide for schools. The design is consistent with the requirements of the EFSG.

In accordance with the State Environment Planning Policy (Educational Establishments and Child Care Facilities) 2017, under the Environmental Planning and Assessment Act of 1979, the design of this project has considered the following principles:

Principle 1 – Context, built form and landscape

The design of the new buildings have taken into consideration the existing site context, location of existing buildings, neighbouring properties, natural landscape and the local community. The existing school site contains predominantly single storey buildings bounded by low residential lots and Shakespeare Park. The project has been divided into two new building proposals have been sited accordingly suit the existing site context. The site context is respected and enhanced by:

- Respecting and responding to the physical context. The new support building and administration extension are single storey and address Lily Street and Shakespeare park. They have been designed to minimise impact on the public domain. The two storey learning building has been nestled within the site and external balconies have been screened with louvres and additional tree planting to respect the privacy of neighbouring properties;
- The buildings respect and respond to the natural environment by integrating all learning spaces with shared outdoor learning facilities. Consideration has been taken to create a variety of outdoor environments, ranging from private retreat terraces/balconies accessed directly off classrooms, to larger shared communal spaces connecting to adjacent play facilities or naturally landscaped learning gardens. The support building has been specifically sited to shelter between

the administration building and Shakespeare park providing security, accessible paths off the main school entrance and views to the natural landscape. Additionally, colourful graphics and wayfinding are proposed to playfully connect shared access and movement through the school;

- The proposal retains existing built form and vegetation where possible. All existing school structures are retained, with the new building proposals aiming to enhance and upgrade cross building connections. Where demolition works are proposed, they are done so to improve accessible pathways and student amenity. Where existing vegetation cannot be retained a one for one tree replacement plan is proposed;
- New landscaping and planting enhances opportunities for play and learning. Allowance has been made for sensory gardens to stimulate and educate students; playful graphics to assist and connect the school with wayfinding; planting adjacent to building entrances enhance views out of classrooms;
- Landscaping has been designed with the intention to improve amenity within the school grounds. Equity to shared amenities and existing facilities has driven the landscape design, with all new paths designed to be playful, accessible and inclusive and as the primary access for all students;
- Taking advantage of its context by enhancing the visual connection to Shakespeare Park. Colourful undulating windows and landscaping present a playful and welcoming front to the public space.

In summary, the new support building adjacent the park is single storey to reflect the scale of the adjacent buildings. The building is designed to orient views from the learning spaces out over the park to provide a pleasant and calming space for the students to enjoy. The two storey learning building is located towards the South of the site on the other side of the school facilities. The building has been located away from neighbouring boundaries and to improve the connection between the existing school facilities and the playing field and games court. The proposal includes the removal of the demountable buildings closer to the boundary and remediation of the site area.

The project has considered the location of the buildings within the landscape and has located the buildings away from existing landscaped areas. Part of the project is to construct new sensory gardens and landscaping around the buildings to provide varied and engaging play areas. Where the proposal includes the removal of existing trees and vegetation, new trees are proposed as replacements as part of the landscaping works.

Principle 2 – Sustainable, efficient and durable

The design of the new buildings have taken into consideration the requirements for a sustainable, efficient and durable construction. The new buildings have been oriented to maximise access to Northern light to the learning areas, combined with appropriate shading this provides the best solution for designing learning walls that are not affected by low level morning or afternoon sunlight. Learning spaces including homebases and practical activities are designed to open to common balconies and

open space to allow for external learning opportunities. The new school development also addresses the following:

- Being responsive to local climate including sun, wind and aspect, with both the proposals oriented North/South, to maximise natural daylight to learning spaces. Amenities and circulation are primarily located on the East/West facades, with appropriate shading provided to all learning spaces. The support learning block was designed as linear to maximise cross ventilation and both buildings are rotated to capture natural breezes.
- Materials and detailing selected pursue a robust and durable design. Ventilated facades have been selected to provide natural cooling for the structure and minimise material heat gain. Colour selections for both roofing and façade are selected to absorb the minimal possible amount of heat gain. All gutters and downpipes are exposed and have been playfully integrated into the façade design to minimise preventable water damage and ensure ease of building maintenance.
- Landscape and planting have been designed to enhance amenity and building performance, with rainwater run off feeding back into the green spaces, and rain water tanks provided for reuse where possible.
- The building has been designed in accordance with the NSW Department of Education “Education Facilities Standards and Guidelines” to incorporate passive environmental design elements that reduce the need for mechanical heating and cooling, including building orientation, sun-shading, natural ventilation, solar energy and thermal mass.
- Initiatives to reduce energy use, waste and emissions have been designed into the buildings with the use of advanced energy production systems where possible. Solar panels have been incorporated on all roof designs, addressing roof pitch and panel direction to assist with off-setting the electrical load of the new works. Learning spaces have been designed to provide access to outdoors and natural ventilation over reliance on mechanical cooling systems, and ventilated façade systems are proposed for minimizing heat gain on the overall building. External shading to the North, East and West facades minimise direct solar access to glazing during summer.

Principle 3 – Accessible and inclusive

The project considers that a welcoming environment for students, parents, teachers and community of all different backgrounds is essential to promote a happy and safe school. The school already accommodates seven support classes for students with a range of abilities in a mix of permanent and temporary buildings. The project includes the removal of the temporary classrooms and provision of permanent facilities that create zone that facilitates ease of movement and comfort for the support classes. These buildings are set within complementing landscaping and sensory gardens to provide a safe and secure learning environment.

Accessibility is a key consideration for the project and the building works include the upgrade of accessible paths to the existing games court and COLA. All areas of the buildings are designed to promote accessibility and to foster inclusion for people with varying needs and capabilities. The following areas have been considered as part of an accessible and inclusive design:

- Establish school security requirements at an early stage to ensure safety is integrated within the design. Primary safety and equity concerns around the supported learning block were considered and resolved through the siting of the proposal. Sheltered between the administration/kindergarten blocks and Shakespeare Park ensures a safe and supervised environment. Additionally, the location allows for an equitable and secure access from the public domain (monitored through the staff/admin block), providing an accessible path to the new facilities through landscaped areas to create a welcoming environment for parents and students;
- Educators, community and parent representatives have been included in the development of the vision and design brief for the school through fortnightly design meetings and workshops to address the needs and future potential of the school;
- Diverse, attractive and accessible spaces to learn, play and socialise have been integrated into the design through the planning of the internal and external learning spaces. Areas ranging from retreat, to small group activities, to accidental encounters to playful wayfinding have been proposed to encourage curiosity and learning in all areas of the school;
- School frontages and entrances are visible, engaging and welcoming. Entrances are accessible and wide to facilitate equity for all students and community members;
- All new paths have been designed for equitable and accessible use.

The project aims to build community ties and school identity and create a culture of welcome and inclusion. The provision of a special programs pavilion, adjacent the support units, has been located adjacent the administration area to create an area that can be utilised by the community outside of school hours. The school already provides community and parent support and these spaces have been designed to facilitate these outcomes.

Principle 4 – Health and safety

The project considers the health and safety of all potential users to ensure that everyone can enjoy the new facilities safely. Safety in design has been considered at all stages of the project and the following identified safety concerns have been addressed:

- Covered areas have been provided for protecting from the sun and rain, in both building proposals. New pathways to access the buildings have covered awnings to shelter building access from weather elements;
- Passive surveillance to shared amenities has been integrated into the design, with primary student amenities located on the ground floor adjacent to play areas and upstairs amenities adjacent to wide circulation areas to support teacher supervision;

- The location and quantity of toilet facilities has been considered, with an accessible toilet provided to all banks, and the primary amenities located on ground floor off the primary play areas;
- Additional supported change rooms and toilets have been provided to the support unit, and we have worked closely with the support staff to identify their needs and how they use these facilities day to day.

The building has been sited carefully to consider the general safety of the public domain. Within the school site, we have sited the buildings to ensure that lines of sight are maintained from existing play areas to the school oval and to minimise areas that are not visible from common areas. The building has also considered passive surveillance with the surrounding public domain, while ensuring that school remains accessible, welcoming and considerate of its neighbours.

Principle 5 – Amenity

The completed project at William Stimson Public School will provide a range of pleasant and engaging spaces which can be enjoyed for educational, informal and community activities. There will be landscaped areas provided around the building which will enhance the amenity of the site and soften the appearance of building. Internal amenities considered for the project include:

- Learning spaces designed to cater for a range of learning styles and group sizes. Private, retreat and small group meeting rooms have been designed with appropriate acoustic for quiet/focused work. Tiered seating areas and seating nooks have been integrated into large group areas to provide individual retreat and withdrawal. All new classrooms have been paired to provide opportunity of team teaching, and the layout has been designed to allow for future focused teaching opportunities or closing off for traditional teaching styles when required. Adaptable spaces for teacher meeting areas, wet craft and presentation areas have been designed as shared opportunity learning spaces;
- Buffer planting has been included in setbacks to reduce the impact of overlooking and noise from the new development;
- Building proposals have been sited away from primary roads and external traffic noise that could impact the acoustics of the learning environments.

Additionally, the project increases the amenity for students and staff with varying mobility by improving access to play areas and across the site. This has been a key driver of the design and remains central to the project. The buildings increase amenity for a variety of uses including community facilities and the school actively encourages community support and participation.

Principle 6 – Whole of life, flexible and adaptive

When designing any educational facility, it is crucial to understand that the way we teach changes over time, and any teaching space must embed the potential to adapt to a variety of uses, be able to be re-configured easily and be suitable for future changing needs.

The project connects collaborative learning spaces to larger shared spaces which enables different learning activities and combined class activities. To allow for future use and building adaptation the proposal has considered the following:

- Operable walls to recreate spaces into flexible working arrangements. Primary services have been located away from the centre to allow for any future adaptation or alteration to the building;
- Prior to the final building siting, a variety of masterplans were tested to ensure the optimum building location that was ensure connectivity to the outdoors, playspace as well as providing locations for future school expansion and growth.

The diversity of adaptable spaces promotes flexible classroom programs. The design also integrates technology to support the teaching methodology of the school and adapt as needs change and develop.

The building provides flexible options for the size and layout of the classrooms to assist with reconfiguring spaces to adapt to changing and developing teaching styles. Classrooms are clustered around ancillary spaces to ensure there is a connection between larger and smaller spaces. This provides a planning structure that supports collaborative learning, individual learning and combined class activities. All classrooms have direct outdoor connections to support outdoor and enquiry based learning.

Principle 7 – Aesthetics

The masterplanning and location of the new buildings on site have been carefully considered to address the existing layout of the site and improve wayfinding, access and lines of site. The following has been considered in developing the aesthetics of the building design:

- Create engaging and attractive environments that inspire curiosity, learning and play. The building proposals are designed to function as part of the student play space and depict a colourful and stimulating environment where the students feel safe to engage with all forms of learning;
- The composition of material elements has been rigorously selected to connect with the existing facilities in a modern way. The variety of materials working together have been selected to represent the playful and inquisitive aspect of learning;

By providing a contemporary form of the buildings, the project introduces a respectful dialogue between old and new. The locations of the building promote better connections across the whole campus and facilitate equitable access across the site.

A key concept of the project is to introduce colour to the buildings to enhance the identification of the building. Colour is used as a key wayfinding device across the site to assist students to find their way around the campus to their classroom or home base. The building actively promotes the connection of students to outside spaces and outdoor learning, as well as providing shelter and shade during play. Much attention has been given to maximising open space and enhancing visual and physical connection through the overall layout of the site.



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