Caulfield Grammar School
The Learning Project
Project Details

Project Name: The Learning Project
Location: Caulfield Grammar School, Melbourne, Victoria, Australia
District Name: Caulfield, Malvern, Wheelers Hill campuses
Principal: Rev. Andrew Syme
Occupancy Date: October 2014
Grades Housed: From Preparatory to Year 12
Capacity (Students): 93
Gross Area: 410sq.m / 4413 sq. ft.
Per Occupant (gross): 4.4sq.m / 47 sq. ft.
Design and Build? No
Site Development: N/A
Building Construction: $1,200,000 AUD (typical price/site)
Fixed Equipment: $60,000 AUD Furniture & Equipment (typical price/site)

Submitting Applicant | Firm
Name: Hayball
Project Role: Architect
Contact: Kirsten Trengove
Title: Practice Communications
Address: 4/135 Sturt Street, Southbank, Victoria 3006, Australia
Email: ktrengove@hayball.com.au
Phone: +61 3 9699 3644

Sub-Consultants
Name: Precom
Project Role: Lead Contractor / Fabricator
Name: BRT Consultants
Project Role: Electrical
Name: Acoustic Logic
Project Role: Acoustics
Name: ModCons
Project Role: Mechanical Design & Construct
Name: DiB
Project Role: Specialist IT & AV Consultant & Supplier

Click here to view a video of the full story of the construction and delivery of the Learning Project.
The Learning Project evolved through the masterplanning of the three metropolitan campuses at Caulfield Grammar School. Early in the process it became evident that a new education pedagogy, strongly grounded in research and developed through professional learning, was emerging at the school. Questions were asked about what learning would look like at CGS in the next five, ten or even fifty years, and how the spaces would evolve beyond the existing classrooms and collaborative zones to support this.

As a result, the Learning Project explores the nature of purposeful settings over highly flexible ones, where users of the space will intuitively understand the activities the settings are designed to support. By limiting the flexibility of some spaces, the quality of experience for the user is increased as the lighting, acoustics, furniture and resources available are appropriate to the learning activity being undertaken.

An authentic prototype, the Learning Project is a vehicle for change, enabling the school and design team to evolve spaces and settings to support a multi-modal, learner centered pedagogy. By conducting research and post occupancy evaluations to critically assess and analyse the successes and failures of all aspects of the project, both the school and design team are able to develop an in depth understanding of the links between pedagogy and space at CGS. Now in its 3rd year of occupation, the Learning Project is already influencing both the way new building projects and teaching practice are approached at the school.

Recognising the value in deepening and disseminating our understanding of how spaces can support learning, both Hayball and Caulfield Grammar School are now linkage partners with the Learning Environments Applied Research Network (LEaRN), at the University of Melbourne. As part of the Evaluating 21st Century Learning Environments (E21LE) ARC Linkage Project, the LEaRN research team is developing new learning environment evaluation tools which are being used to evaluate the impact that the new environments are having on a variety of factors including student engagement and results.

The shared commitment to develop new understandings, document all stages of the project and learn together through testing and evaluating ideas has further strengthened the working relationship between the school and design team. The buildings themselves have become the tool by which we are learning together as architects and educators, to develop a common language and ensure future projects at Caulfield Grammar School will provide the highest quality learning experience for the students.

The Learning Project is a bold initiative that demonstrates the interplay between action that is knowledgeable and knowledge that is actionable. This collaboration between educators, architects and researchers is an important first step in setting new standards for the design of truly innovative learning environments.

By engaging with formal research to evaluate its impact and creatively utilizing pre-built portable construction, the Caulfield Grammar Learning Project makes a significant contribution to the development of theoretically informed, practice oriented, architectural design for learning. The impact of the project has been resounding for both staff practices and student responses.
The Learning Project was delivered across three separate campuses of the Caulfield Grammar School. Each campus presented different student cohorts (Wheelers Hill being K-12, Malvern being K-6, and Caulfield being 7-12) yet the primary objective of the exercise remained the same: to provide a series of similar installations deployed across 3 campuses to test a wide variety of spatial arrangements, and designed to catalyze innovation in teaching and learning practice.

Scope of Work and Budget

- **March 2013**  
  - Project Initiated
- **April 2013**  
  - Master Plan Completed
  - Schematic Design Completed
- **October 2013**  
  - Education Specification
- **March 2014**  
  - Tender Acceptance
- **February 2014**  
  - Design Development Completed
- **May 2014**  
  - Construction Documents Completed
  - Construction Started (Fabrication)
- **September 2014**  
  - Construction Completed (Fabrication)
  - Construction Completed (install)
- **October 2014**  
  - Occupancy
- **June 2015 to 2017**  
  - Formal Research
  - Post Occupancy Evaluations
  - ‘Feed forward’ into new teaching practices and spaces
Malvern Campus

Educational Facility Address: Willoughby Avenue
City and Postcode: Glen Iris, 3146
State: Victoria, Australia
Educational Facility Phone: (03) 9885 5995
Principal: Rev. Andrew Syme
Head of Campus: Jill Bosanquet
Type of Educational Facility: Pre-Primary & Primary
Year Levels: From 3 Year Old Kindergarten to Year 6
Occupancy Date: November 2014
Capacity: 430 Students (Current Enrolment)
Site Size: 3.7 Acres
Gross Area: 2583 sq ft
Project Budget
Total Project Cost: $585,000 AUD

Caulfield Campus

Educational Facility Address: 217 Glen Eira Road
City and Postcode: East St Kilda, 3183
State: Victoria, Australia
Educational Facility Phone: (03) 9524 6300
Principal: Rev. Andrew Syme
Deputy Principal / Head of Campus: Jim Alexiades
Type of Educational Facility: Secondary
Year Levels: From Year 7 – 12
Occupancy Date: October 2014
Capacity: 1350 (Current Enrolment)
Site Size: 18.2 Acres
Gross Area: 4413 sq ft
Project Budget
Total Project Cost: $1,200,000 AUD

Wheelers Hill Campus

Educational Facility Address: 74 – 82 Jells Road
City and Postcode: Wheelers Hill, 3150
State: Victoria, Australia
Educational Facility Phone: (03) 8562 5300
Principal: Rev. Andrew Syme
Deputy Principal / Head of Campus: Paul Runting
Type of Educational Facility: Pre-Primary, Primary & Secondary
Year Levels: From Pre-Preparatory to Year 12
Occupancy Date: October 2014
Capacity: 1445 Students (Current Enrolment)
Site Size: 51.6 Acres
Gross Area: 4413 sq ft
Project Budget
Total Project Cost: $1,200,000 AUD
1. School and Community Engagement

A clear objective of The Learning Project was to challenge the nature of existing learning spaces at Caulfield Grammar School (CGS) and thus enable the next step in the evolution of teaching and learning practice across the school's three metropolitan campuses.

For the design response to fulfil this objective, a strong engagement and connection between the school community and the design team was critical. The school appointed ambassadors from each campus to join the design team in re-imagining learning spaces. This consisted of 24 key teaching staff, (8 from each campus) and the school leadership team of Principal, Head of Teaching and Learning, and three Heads of Campus.

The design process involved regular workshops and discussions with the project ambassadors who were then the conduit to the rest of the school community, collating feedback and ideas from within their own campuses. This process established a common language and shared vision for how learning spaces would support an evolving pedagogy at CGS.

With each campus being unique in size and cohort makeup, a key challenge during the briefing process was harnessing all stakeholders input to develop cohesive pedagogical objectives and a common direction for all campus. Delivery of three built projects, in separate locations with differing school needs, required strategic planning and consideration of alternative methods of construction. i.e. prefabrication.

The Learning Project fosters joint use/whole school community engagement by designing the spaces as inter-disciplinary studios, owned by all and providing engaging learning settings for students from ages 5-18 years.

The design process involved regular workshops and discussions with the project ambassadors who were then the conduit to the rest of the school community, collating feedback and ideas from within their own campuses. This process established a common language and shared vision for how learning spaces would support an evolving pedagogy at CGS.

With each campus being unique in size and cohort makeup, a key challenge during the briefing process was harnessing all stakeholders input to develop cohesive pedagogical objectives and a common direction for all campus. Delivery of three built projects, in separate locations with differing school needs, required strategic planning and consideration of alternative methods of construction. i.e. prefabrication.

The Learning Project fosters joint use/whole school community engagement by designing the spaces as inter-disciplinary studios, owned by all and providing engaging learning settings for students from ages 5-18 years.

The Learning Project took advantage of the assets available within the community by engaging staff in site visits to exemplary school projects and by involving the project in a formal education research program. This was valuable in giving stakeholders and the design team a mandate to explore the possibilities of contemporary teaching and learning environments.

2. Education Environment

The Learning Project grew out of the School's vision for a new pedagogy, strongly grounded in research and developed through professional learning. Supporting a "learning anywhere, anytime" philosophy, the school's aim was to support students in their learning as individuals within a community of learners.

The design response to such a challenging and exciting brief has seen the creation of a series of highly purposeful and connected learning settings, each designed to support a particular learning activity. The adjacencies, size and connectedness of these settings were devised to ensure the project maximized opportunities for a multi-modal, learner-centred pedagogy to be supported.

Designed as four distinct zones: Launch Pad, Collaborative Studio, Workshop and Hub, learning activities have been grouped together to provide working spaces for up to 93 students and 6 staff. Up to a total of 33 unique learning settings have been designed, each created with bespoke resources, furniture and technology supporting a particular learning activity.

As the project intended to provide a place to evolve, test and evaluate ideas, this diversity was a strong design driver. By deliberately providing subtle variations across all setting typologies the design not only supports a range of learning activities, but also provides multiple opportunities for learners to choose the setting that best supports their own needs.

The Learning Project explores purposeful spaces over flexible ones, where the quality of the user experience is increased as the lighting, acoustics, furniture and resources available are appropriate to support the learning activity being undertaken.

The Learning Project is adaptable in supporting future changes in educational delivery systems by being an evolving prototype, actively defining the future of teaching and learning spaces and practice at CGS. It provides a platform for staff and students to test and evaluate changes in curriculum, pedagogy and space, which can then be implemented across the wider school community.
3. Physical Environment

The Learning Project provides an enhanced user experience through providing a physical environment, which seamlessly interconnects a network of spaces and promotes the “flow of learning”. The strong connection between indoor and outdoor learning settings, and a considered roof design which provides natural light into the depths of the building, contribute to providing an appealing and contemporary environment for learning.

The Learning Project was designed to fit within the larger community context, by providing a solution which utilised a ‘kit of parts’ approach to provide consistency of learning objectives across each campus, whilst recognising the differences in student cohorts from ages 5 -18, at each campus.

As a prototype facility, the Learning Project was designed and developed as a series of relocatable buildings that could be moved between the school’s three metropolitan campuses. Working with modular construction company Precom, the buildings were fabricated off site and designed with the parameters of transportation in mind. This process maximised the efficiency of construction time, whilst minimising disruption to the school during on site installation.

Considering the significant environmental differences of each of the three sites and the potential relocation across sites a factor, it was critical that the design of the buildings be able to work across these conditions. This has been achieved through careful selection of materials and detailing.

The buildings are sited on each campus to connect into existing circulation paths and provide access to other core curriculum buildings. They have been positioned and oriented to make the most of unique views to and from their surroundings. As a “whole of school” facility, the Learning Project provides a focus for innovative teaching and learning at each campus.

In its prototypical nature, the project motivates the research and evaluation of settings created, providing valuable insight into learner needs at CGS.

4. Results of the Process and Project

The Learning Project achieves the school’s education goals by providing a multi-modal learning environment that promotes transition to contemporary teaching and learning pedagogies.

The conception of this project as a prototype allowed it to achieve both school district and community goals by exciting staff and students to embrace and explore different ways of collaborative teaching and learning. A robust method of construction, with benefits of fast-delivery, modularity, and portability has meant that the school was able to deliver three significant projects, in short time and with little disruption to daily campus activities.

To further assist with the capture and communication of the ideas explored throughout the Learning Project a Design Guide has been developed. Outlining each of the learning settings in detail, the guide provides the school community and visitors with a record of the process, ideas and outcomes. By capturing the intent of settings we are able to evaluate the extent of success of the spaces, and provide interventions where improvements can be made. This ongoing post occupancy evaluation assists in capturing the changing practices of teaching and learning at the school, and informs how future facilities can be designed to reflect the school’s education goals.

In conjunction with Caulfield Grammar School, we are linkage partners with the Learning Environments Applied Research Network (LEaRN), at the University of Melbourne. As part of the Evaluating 21st Century Learning Environments (E21LE) ARC Linkage Project, the LEaRN research team is developing new learning environment evaluation tools which are being used to evaluate the impact that the new environments are having on a variety of factors including student engagement and results.

This shared commitment to develop new understandings and learn together through testing and evaluating ideas has further strengthened the working relationship between the school and design team. The planning process and the buildings themselves have become the tools by which we are learning together as architects and educators, to develop a common language and ensure future projects at Caulfield Grammar School will provide the highest quality learning experience for the students.
Floor Plan Settings
Caulfield and Wheelers Hill Campus - Senior Schools
The design of the Learning Project is based on the concept of three collaborative studios connected by a central hub. Each studio would cater for different learning activities through diverse settings and spaces, whilst the hub would provide a central meeting place and information point.
The design of the Learning Project is based on the concept of three collaborative studios connected by a central hub. Each studio would cater for different learning activities through diverse settings and spaces, whilst the hub would provide a central meeting place and information point.
Educational Settings - ‘Pit Stop’

Student storage and display

Workshop
Creative project space for up to 16 students engaging in creative activities, making and doing

Pitstop
Small group setting with writeable table top to assist in collaborative planning for projects
The Learning Project
Educational Settings - ‘Staff Setdown’

**Workshop**
Creative project space for 16 students

**Print station**
Resource storage and print station for staff and student use

**Greenhouse**
Meeting space for formal meetings, seminars and targeted teaching

**Lounge**
Informal gathering, instruction, presentation and discussion. Also supports independent study, reading and relaxing

**Secure storage**
Staff storage for student files and personal belongings

**Kitchen bench**
Set down space for staff enabling staff to staff and staff to student discussion
The Learning Project
Educational Settings - ‘Interconnected Settings’

Media cubby
Enclosed space for media production and recording using iPads and other mobile devices

Planning, production and editing
Standing height work bench and pinboards to support storyboarding and collaborative planning of visual and digital presentations

Resource storage
Equipment and resources for creative workshop space

Workshop
Creative project space for 16 students

Pitstop
Small group setting with writeable table top to assist in collaborative planning for projects
The Learning Project

Educational Settings - ‘The Lounge’

Workshop
Creative project space for 16 students

Greenhouse meeting space
Meeting space for formal meetings, seminars and targeted teaching

Lounge
Informal gathering space for direct instruction, presentation and discussion. Also supports independent study, reading and relaxing

Kitchen bench
Set down bench for staff enabling staff to staff and staff to student discussion
The Learning Project
Educational Settings - ‘Workshop’

Display cabinet
Exhibition of student work

Media cubby
Enclosed space for media production and recording using ipads and other mobile devices

Resource and student storage

Pitstop
Small group collaborative planning

Workshop ceiling
Acoustic baffles and drop down power outlets to provide flexibility for multiple uses and additional acoustic treatment for noisy activities

Workshop
Adjustable height tables and stools to enable a range of working styles. Creative wet studio for collaborative projects and group work using a range of media

LAUNCH PAD
KITCHEN TABLE
HUB
GREENHOUSE
MEETING
THE DECK
STUDIO
VIDEO
CONFERENCING
PLANNING
TABLE
PIT STOP
MEDIA
CUBBY
PRESENTATION
SPACE
WORKSHOP
KITCHEN BENCH
ENTRY DECK
The Learning Project
Educational Settings - ‘Courtyard’

Chalkboard surface

Courtyard
Protected outdoor learning space for independent and small work

Translucent Roof Sheeting
To maximise natural light into the courtyard

Visual connection to both launch pad and collaborative studio adjacent

Grass Hill
Provides relaxed environment for a small number of students working independently, studying, reading and relaxing

Outdoor table and benches
For small group meetings and individual work
The Learning Project

Educational Settings - ‘The Kitchen Table’

- Visual connection to lounge and central hub spaces
- Pinboard: For the display of student work and learning resources
- Meeting nook
- Launch pad: Area beyond
- Kitchen table: Central, protected meeting space for democratic discussion, direct instruction and collaborative group work
The Learning Project

Educational Settings - ‘Presentation Nook’

Presentation nook
Semi screened space for small group discussion and presentation. Also supports independent study.

Video conference pod

Kitchen bench
Set down space for staff and students.
The Learning Project
Educational Settings - ‘Collaborative Studio’

Interactive surface table

Collaborative studio
Open learning studio to facilitate independent and interdependent group work. Diverse range of settings and technology available

Presentation nook
Large screen and Apple TV to facilitate seamless connection with student devices for information sharing

Writeable walls
The Learning Project

Educational Settings - ‘The Launching Pad’

- **Pinboard**
  For the display of student work and learning resources

- **Working walls**
  Writeable surfaces for brainstorming, storyboarding and discussion of ideas

- **The steps**
  Raised platform and steps for whole group gathering, instruction and presentation. Also supports performance reading and relaxing

- **Highly mobile furniture allowing agile adaptation of space**

---

**LE Solutions 2017 - Caulfield Grammar School - The Learning Project**
The Learning Project
Educational Settings - ‘The Launching Pad’

Pinboard
For the display of student work and learning resources

Working walls
For brainstorming, storyboarding and discussion of ideas

Pinboard
For the display of student work and learning resources

Working walls
For brainstorming, storyboarding and discussion of ideas

The steps
Raised platform and steps for whole group gathering, instruction and presentation. Also supports performance reading and relaxing

Large flat floor area
Providing flexibility to adapt for different learning activities

Working wall
For the interactive projection of student and staff media facilitating presentation and discussion

Working wall
For the interactive projection of student and staff media facilitating presentation and discussion
“An exceptional point of significance has been Hayball’s willingness to engage our teaching staff in the creation of these spaces. From the outset the process was a true collaborative one.”

- Reverend Andrew P Syme, Principal of the School
Delivering the pre-fabricated modules from factory to site
Over its 133 year history, Caulfield Grammar School has continually evolved to meet the changing needs of metropolitan Melbourne, including the early expansion to a multi-campus model of operation. Guiding the delivery of learning programs into the future is the school’s mission “to enable quality learning every day in every experience for every learner for life”.

As the school transitions towards more contemporary teaching and learning practices, our requirement was to construct new learning spaces to enable staff to choose the environment that best suits the learning needs of their particular lesson or moment within a lesson.

Not wanting to impose one mode of learning, the creation of “multi-model learning environments” was the focus. The dedicated programming of each space such that it is purposefully maximises the use of all indoor space was the overriding intention. Applying contemporary concepts such as the creation of three walled classrooms to enhance connections between learning areas also contributes to ensuring the visibility of learning at all times as does the introduction of glazed walls for transparency from within and beyond the classrooms. Perspex/glass writing walls, wireless connectivity and multiple focal points were other fundamentals delivered in the construction.

There are 33 exceptional features throughout the Learning Project, all pivotal to providing an engaging learning experience for students spanning the ages of 5-18 years. Lounges, a greenhouse, video conference pods, a media cubby, working walls, a kitchen table and a news stand are tangible examples of unique constructions that are not found in traditional classroom settings. Each of the 33 exceptional features has a clear purpose enabling teaching staff to have significant choice in how they deliver their lesson.

Another critical point is the careful consideration of the needs of the “adult learner” – our teaching staff. Professional educators all have differing styles of working effectively and the adult spaces throughout the Learning Project will cater for introverts and extroverts alike in students and staff.

Catering for diverse age ranges and imbuing a whole-school vision across discrete campuses were key challenges which were met by the comprehensive engagement of key stakeholders and decisions based on evidence and research.

An exceptional point of significance has been Hayball’s willingness to engage our teaching staff in the creation of these spaces. From the outset the process was a true collaborative one. Twenty-five education staff were invited to provide insight into the realities of their classroom teaching and Hayball’s team complemented this with sharing their expertise and experience from previous, similar projects.

There has been a great sense of optimism among the school community as the spaces came to fruition, with a significant demand from excited staff to occupy the new spaces which underscore our emphasis on student learning at the heart of the school. With installation having just been completed, we are preparing to move into the new facilities as Term 4 gets underway.