



Figure 3.31 The steeply sloping area between the gymnasium and the Elamang Avenue boundary, which is marked by a steel picket fence. (Source: GML, November 2016)



Figure 3.32 The unused land between the gymnasium (on the right) and the school's northwestern boundary, where the large fig tree is located. (Source: GML, November 2016)



Figure 3.33 The terraced area to the southeast of the gymnasium, as viewed from the south. (Source: GML, November 2016)



Figure 3.34 Looking up to the landscaped terraces to the southeast of the gymnasium. (Source: GML, November 2016)

Northern Wing of the Junior School: Gonzaga Barry Centre (GBC)

The northernmost wing of the Junior School, known as the Gonzaga Barry Centre (GBC), is included in the project's Western Precinct together with the landscaped areas of its immediate surrounds. Designed by Leffler Simes Architects and built c1990, the GBC is a one–two storey rendered masonry structure. It consists of single large room at lower ground floor level with roof terrace above. Windows and doors are aluminium framed. The main building form is supported on circular concrete columns, which allow for an undercroft space below, which is partially enclosed with fibrous cement sheeting (Figures 3.35 and 3.37).

On the west side of the building are concrete stairs and paths, adjacent to which is a small area of open lawn (Figure 3.38). To the north of the building is a small fenced playground. To the east are brick paved and concrete stairs and paths, with rendered masonry planter boxes and low garden walls (Figure 3.36). There is also a small area of lawn to the east (Figure 3.38). All landscaping is contemporary with the GBC.

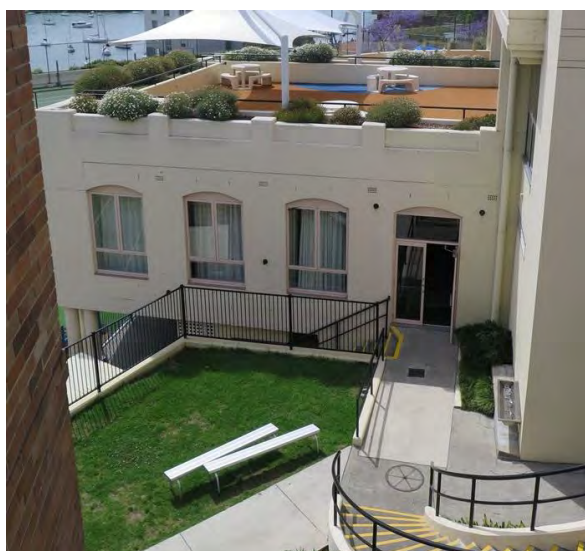


Figure 3.35 The northwestern elevation of the GBC with landscaped area in the foreground. (Source: GML, November 2016)

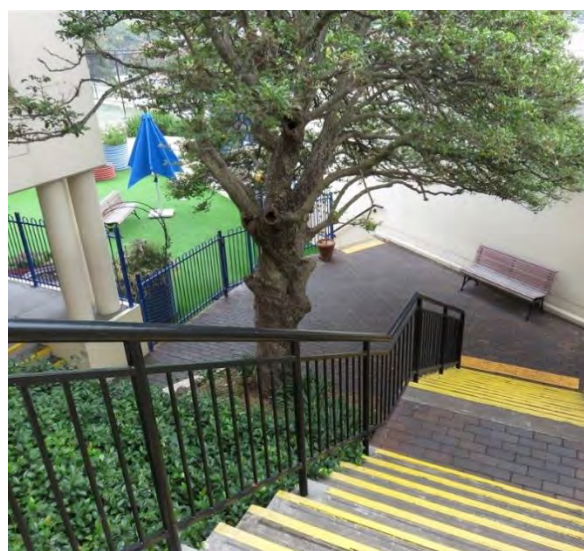


Figure 3.36 The landscaped area on the east side of the GBC. (Source: GML, November 2016)



Figure 3.37 The north elevation of the GBC, as seen from the tennis court roof of the gymnasium. (Source: GML, November 2016)



Figure 3.38 The path leading to the eastern entrance of the GBC, through a small area of lawn. (Source: GML, November 2016)

3.2.2 Northern Precinct

The Northern Precinct encompasses the central portion of the school campus that fronts Elamang Avenue. The precinct encompasses two detached buildings—Centenary Hall and the Science Building, including its basement carpark. The precinct also encompasses the landscaped spaces between and around the buildings.

Centenary Hall

Like the gymnasium, Centenary Hall is a flat-roofed rendered masonry building, which is partially subgrade. Its roof—used as a tennis court—is accessible from the adjacent ground level on its southwestern side (Figure 3.40). The two buildings also share a common architectural language and materiality. The building's northeastern elevation (its main elevation) features a colonnade with double columns arranged evenly across its length (Figure 3.39). Between the columns, arched motifs are recessed into the wall above. The recessed arched motif is repeated above the doors which are located along the colonnade. These doors are aluminium framed and consist of two equal width leaves with fixed glazing at the sides. The doors and adjacent glazing are divided into four equal sections by transoms. A flat formal lawn area is located adjacent to the northeastern side of the building. A rendered masonry retaining wall and planter box separates the lawn area from the public footpath adjacent (Figure 3.42).

On the northeastern corner of the building is a pitched tiled roof, which covers the main entrance to the building (Figure 3.41). The entrance consists of a series of glazed aluminium framed doors. Between the Science Building and Centenary Hall (at the end of the formal lawn) is a brick paved terrace (Figure 3.44). This terrace is connected to higher areas of the campus to the southwest by external stairs (concrete) and landscaped terraces with rendered masonry and sandstone block retaining walls (Figures 3.41 and 3.43).



Figure 3.39 The northeastern elevation of Centenary Hall and formal lawn adjacent. (Source: GML, November 2016)



Figure 3.40 Centenary Hall's rooftop tennis court. (Source: GML, November 2016)



Figure 3.41 The brick paved terrace between Centenary Hall and the Science Building. The single storey structure on the left houses the carpark lift. The main entrance to Centenary Hall can be seen on the right, with red tiled roof over. (Source: GML, November 2016)



Figure 3.42 The partially concealed view of Centenary Hall from Elamang Avenue. (Source: GML, December 2016)



Figure 3.43 The rendered masonry and sandstone retaining walls on the southeastern side of Centenary Hall. (Source: GML, December 2016)



Figure 3.44 The brick paved terrace between Centenary Hall and the Science Building, looking northeast. The apartment block at 21 Elamang Avenue can be seen in the background. (Source: GML, December 2016)

The Science Building

The Science Building is located close to and parallel with the school's Elamang Avenue boundary. Like the gymnasium and Centenary Hall, this building is a flat-roofed masonry and concrete building, situated partially underground. It consists of three floors, the lowest of these being a carpark which has vehicular access from Elamang Avenue (Figure 3.50). The flat roof is used as a multi-sports court. The architectural language and materiality of the building—rendered masonry external walls, double columns and recessed arched motifs—match that of the gymnasium and Centenary Hall (Figures 3.45–3.47). A verandah with pitched tiled roof runs along part of the building's northeast elevation at upper floor level, and returns around its southeastern and northwestern sides (Figures 3.45–3.47). Following recent refurbishment, the building's interiors are contemporary in character (Figures 3.48 and 3.49).



Figure 3.45 The Science Building as viewed from Elamang Avenue. (Source: GML, November 2016)



Figure 3.46 The northwestern elevation of the Science Building. (Source: GML, November 2016)



Figure 3.47 The southwestern elevation of the Science Building. (Source: GML, November 2016)



Figure 3.48 The contemporary interior of the Science Building. (Source: GML, November 2016)



Figure 3.49 The contemporary interior of the Science Building. (Source: GML, November 2016)

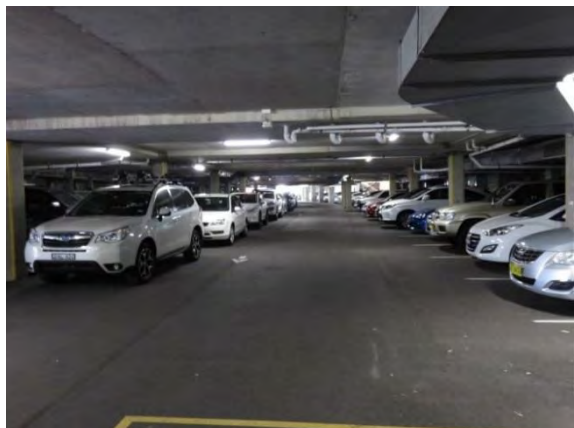


Figure 3.50 The basement carpark, Science Building. (Source: GML, November 2016)

3.2.3 Eastern Precinct

The Eastern Precinct includes the Music and Performing Arts Building and basement carpark, the garbage room, the Mary Ward building, and surrounding landscaped spaces. All of these buildings are built adjacent to the school's southeastern property boundary. The Mary Ward building is adjacent to the school's boundary with the rear garden of Araluen House.

Music and Performing Arts

Music and performing arts are housed in a 1999 two-storey extension to the Mary Ward building, designed by Leffler Simes Architects. The building is steel and concrete framed, with rendered masonry external walls, and tiled roof terraces. At basement level is a carpark which was constructed as an earlier project in the late 1980s. The carpark extends into the carpark in the basement of the Science Building (Figure 3.54). The basement level is built close to the property boundary at Elamang Avenue, but above this the building steps back from the boundary with each floor, with roof terraces formed at lower and upper floor levels (Figures 3.51 and 3.52). The building's windows and doors are aluminium framed. A feature of the building is its curved and rounded corners. The interiors of the building feature contemporary finishes and detailing (Figure 3.53).



Figure 3.51 The Music and Performing Arts Building, as viewed from Elamang Avenue. The basement carpark is at street level. (Source: GML, November 2016)



Figure 3.52 The lower level roof terrace and northeast elevation of Music and Performing Arts. The upper floor steps back and as such is not clearly visible. (Source: GML, November 2016)



Figure 3.53 An interior space within the Music and Performing Arts Building. (Source: GML, November 2016)



Figure 3.54 The basement carpark below the building (Source: GML, November 2016)

On the northwestern side of the building is a pedestrian thoroughfare consisting of external stairs, landscaped terraces and gardens, which descends through the site. This landscape is contemporary in character, with brick paved terraces, concrete stairs, painted metal balustrades and low walls (retaining walls and planters) of rendered masonry. The planters contain low-height shrubs and small trees (Figures 3.55 and 3.56).



Figure 3.55 The external stair on the northwestern side of the building which leads up to the lower roof terrace. (Source: GML, November 2016)



Figure 3.56 The stepped thoroughfare on the northwestern side of the building. The connection between the Music and Performing Arts Building and the Mary Ward building can be seen. (Source: GML, November 2016)

The Garbage Room

The garbage room is a small detached single storey building, located in the eastern corner of the campus, adjacent to the school's property boundaries. External walls are generally rendered and painted masonry walls, although some original face brickwork can be seen on its northeastern corner. The roof is hipped and slate-clad with terracotta tile cappings, and timber rafters are a feature of its modest projecting eaves. Exposed timber roof framing is visible internally. All doors to the building are located on its northwestern side and are contemporary. The building has no windows. The Music and Performing Arts Building cantilevers slightly over the building (Figures 3.57 and 3.58).



Figure 3.57 The northwestern wall of the garbage room (rendered and painted, with door) encroaches into the carpark. (Source: GML, November 2016)



Figure 3.58 The view of the garbage room from Elamang Avenue. (Source: GML, November 2016)

The Mary Ward Building

The Mary Ward building—also known as the Senior School Building—was designed by Kevin Curtin, and opened in 1981. The two–three storey Modernist building has an exposed concrete structure, with distinctly facettted columns on its northeastern and southwestern elevations. External walls are face brickwork, and doors and windows are aluminium framed (Figures 3.59–3.61). The flat roof of the building is used as a recreational outdoor area by the school (Figure 3.64). The building does not have a prominent street presence, being largely concealed from view on its northeastern side by the Music and Performing Arts Building, and by Araluen House on its southwestern side.

A stepped auditorium with stage is a feature of the building's interior (Figure 3.63). The auditorium has a distinctive profiled ceiling with recessed lighting. Lobby areas have timber boarded ceilings and terrazzo floors, and appear to be original to the building (Figure 3.62). Elsewhere however interiors have been altered over time.

Although the building is well maintained there are reported problems with the building's concrete structure that date back to the 1980s. Currently tell-tales are in place to monitor building movement.

A sandstone retaining block is located close to the Mary Ward building on its southwestern side. The retaining wall is nominally four metres high, and is located close to the property boundary of the school and Araluen House and 69 Carabella Street. The northwestern end of the wall is built on top of a hewn sandstone cliff. This wall most likely dates from c1904, when the Eversfield house was constructed (demolished 1968), and was most likely built to provide a level area for the construction of the tennis court which existed at the rear of the house (Figures 3.65 and 3.66).



Figure 3.59 The northern corner of the Mary Ward building, with the Music and Performing Arts Building on the right. The northeastern elevation of the Mary Ward building is largely concealed by the other building. (Source: GML, November 2016)



Figure 3.60 The entrance to the building on its northwestern side. (Source: GML, November 2016)



Figure 3.61 Looking along the southwestern elevation of the building. The sandstone retaining wall on the property boundary is on the right. (Source: GML, November 2016)

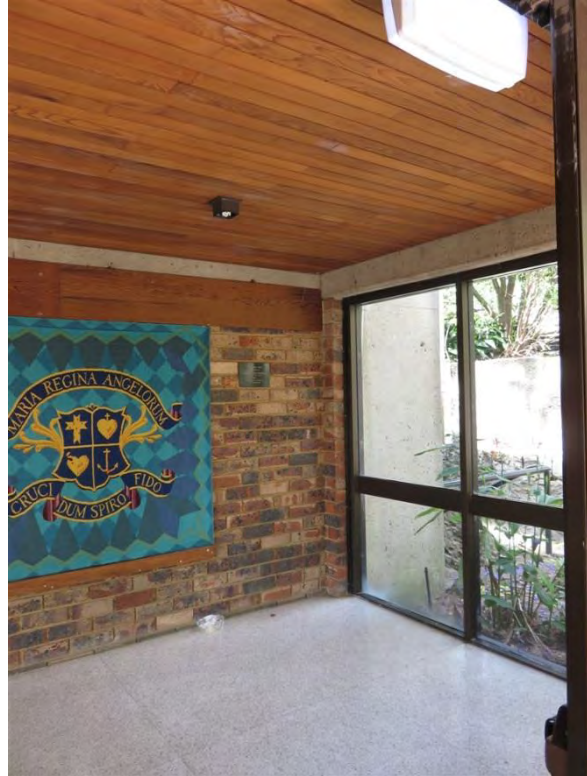


Figure 3.62 The entry lobby, Mary Ward building. (Source: GML, November 2016)



Figure 3.63 The stepped auditorium, Mary Ward building. (Source: GML, November 2016)



Figure 3.64 The roof of the Mary Ward building, used as a recreational space. (Source: GML, November 2016)



Figure 3.65 The sandstone retaining wall adjacent to the building. (Source: GML, November 2016)



Figure 3.66 The sandstone retaining wall adjacent to the building, on the property boundary of 69 Carabella Street. (Source: GML, November 2016)

3.2.4 Southern Precinct

The Southern Precinct encompasses the school's buildings closest to Carabella Street, including St Joseph's classroom block (J-Block), the chapel building, and Elamang including administration adjacent. Also within the Southern Precinct is the Junior School Building, and landscape spaces in and around these buildings.

St Joseph's (J-Block)

J-Block is a three–four storey building located close to the school's Carabella Street boundary (two and a half storeys are visible from Carabella Street) (Figures 3.67 and 3.68). Built in 1965 (with top floor added in 1970), the building is L-shaped in plan. Walls are face brickwork (bricks are rough-cast and speckled) and fenestration is incorporated into the rhythmic articulation of the building's façades. A high metal fascia borders all sides of the low-pitch metal deck roof, and a cantilevered concrete awning marks the entrance to the building on its southwestern elevation. Parts of the building (library) have recently been refurbished internally, with the refurbishment including distinctive changes to fenestration locally (Figure 3.69). Other areas of the building maintain original interior finishes—terrazzo floors and timber boards as wall lining (Figure 3.70).



Figure 3.67 J-Block, as seen from Carabella Street. The cantilevered concrete awning marks the original entrance to the building. (Source: GML, November 2016)



Figure 3.68 The northeastern wing of the building, as seen from the northwest. (Source: GML, November 2016)



Figure 3.69 The northeast elevation of the building. Recent alterations to the top floor fenestration are evident. The chapel building can be seen on the right. (Source: GML, November 2016)



Figure 3.70 The interior stairwell retains original finishes and detailing. (Source: GML, November 2016)

The Chapel Building

The chapel building is a two–three storey rendered masonry building, constructed in 1929-30, located close to the Carabella Street property boundary (Figures 3.71–3.73). The building is T-shaped in plan: the dominant central building has symmetrical secondary projecting wings built adjacent to Carabella Street. Rising above the central building at its northern corner is an elaborate Italianate tower (also rendered masonry) at the top of which is a golden stained glass octagonal lantern with copper lantern, cupola and cross above (Figure 3.71). The tower is a landmark of the area, being visible from many vantage points in the surrounding area and the harbour. On the southeastern side of the main building is the single storey St Aloysius' Verandah, built at the same time as the chapel building (Figure 3.75). The wings were designed in the Victorian Georgian style, the northern wing having two storeys with a hipped terracotta tiled roof (Figure 3.72). The southeastern wing has three storeys and a flat roof: an unsympathetic addition was built in the 1970s, which included an additional floor in place of the original pitched roof, and concrete framed verandahs on the northeastern elevation (Figure 3.74). This wing is now used as classrooms.

The chapel's main building form has a pitched terracotta tiled roof, with projecting eaves and eaves gutters. Together with the tower it features arched Romanesque windows, many of which have decorative leadlight stained glass. On lower floors windows are timber framed and multipaned. Expressed corner quoining is used throughout. The tower includes a high level open viewing balcony, and is widely visible from around the campus.

The school's chapel—Chapel of Our Lady of The Sacred Heart—occupies the upper floor of the building (Figure 3.77). It is a single room with mezzanine choir gallery at the rear. The lower floor is divided into classrooms, which are accessed from St Aloysius' Verandah. Within the tower is a distinctive winding terrazzo stair with central void to the lobby space at the base of the stair (Figure 3.78).

The northeastern end of the building is physically connected to Elamang by a two-storey rendered masonry building with curved façade and ground floor colonnade, built at the same time as the chapel building (Figure 3.76). The main entrance to the school's chapel is by way of this colonnade.

The main school entrance drive extends around the northwestern side of the chapel building, making the building's northwestern side its most visually prominent (Figure 3.73). Landscaped gardens are located adjacent to the building on its northwestern side.



Figure 3.71 The tower at the northern corner of the chapel building, which is a local landmark visible from the harbour and surrounding areas. (Source: GML, November 2016)



Figure 3.72 The northwestern elevation of the northwestern wing. (Source: GML, November 2016)



Figure 3.73 The northwestern elevation of the chapel's main building, with landscaped gardens in the foreground. (Source: GML, November 2016)



Figure 3.74 The southeastern wing, as seen from Carabella Street. The unsympathetic upper floor addition is evident. (Source: GML, November 2016)



Figure 3.75 St Aloysius' verandah on the southeastern side of the chapel building. (Source: GML, November 2016)



Figure 3.76 The curved façade of the connection between the chapel building and Elamang. (Source: GML, November 2016)



Figure 3.77 The interior of the chapel, the most significant internal space of the building. (Source: GML, November 2016)



Figure 3.78 The distinctive winding terrazzo stair within the tower. (Source: GML, November 2016)

Elamang and Administration

The historic mansion Elamang—dating from 1851—is used by the school for administrative purposes. A formal driveway from Carabella Street leads to the building's main entrance on its northern side, which is marked by a recently constructed semicircular portico. Located on the upper part of the school campus, and with low-rise buildings located to the north, the building has extensive harbour views.

Elamang is a two-storey building with external walls of sandstone block tiled roofs. The building has open verandahs on its northern and eastern sides at ground floor and upper floor levels, the original verandahs having been replaced in 1924. (Figures 3.79 and 3.80). Regularly spaced verandah posts are rectangular in plan, and extend in a single uninterrupted length from ground floor level up to the roof structure. Balustrades at upper floor level extend between the verandah posts, and are constructed of a solid sheet material. The building is connected to adjacent structures on its eastern and western sides.



Figure 3.79 Elamang, as viewed from the north. (Source: GML, November 2016)



Figure 3.80 Elamang, as viewed from the east. (Source: GML, November 2016)

A two-storey extension—housing administration and classrooms—abuts Elamang on its eastern side (Figures 3.83 and 3.84). This building has rendered masonry walls and a tiled pitched roof. Windows and external doors are generally timber framed and multipaned.

A Classical semicircular entry portico—a recent addition to the building—marks the building's public entrance, and connects to the single storey verandah which runs along the western half of the building's north elevation (Figure 3.81). Classical circular columns extend along the edge of the verandah and entrance portico. A contemporary steel and glass extension and verandah have been added on the south side of the building (eastern end) which connect to raised walkways (Figure 3.82).



Figure 3.81 The semicircular entry portico marking the main entrance to the school's administration office. (Source: GML, November 2016)



Figure 3.82 The rear of Elamang, viewed from the west. Recent additions can be seen on the right. (Source: GML, November 2016)



Figure 3.83 The eastern elevation of the eastern additions to Elamang. (Source: GML, November 2016)



Figure 3.84 The northern elevation of the eastern additions to Elamang. (Source: GML, November 2016)

The Junior School

The Junior School consists of a 1960s purpose-built classroom building, which has been progressively altered and extended (the most recent works dating from 2006) such that the original building is almost illegible (Figure 3.85–3.90). The original two-storey 1960 building was U-shaped in plan, with brickwork walls and a flat concrete slab roof. External walls are now rendered and painted, and the centre of the ‘U’ has been covered with a curved shade structure (Figure 3.87). A 1970s extension to the original building on its western side remains—originally a two-storey face brick building with concrete tiled pitched roofs—but external walls of this building are now rendered and painted (Figure 3.88). Further extensions on the northern and southwestern sides of the building include a new entrance on the southwest corner and new open terraces to the north (Figure 3.86). Interiors have been updated over time and are contemporary in character (3.90).



Figure 3.85 The view over the roof of the Junior School. The many additions to the original 1960s building can be seen. (Source: GML, November 2016)



Figure 3.86 The front entrance to the Junior School, as seen from Carabella Street. (Source: GML, November 2016)



Figure 3.87 Junior School, east elevation. This is part of the original 1960s classroom block. (Source: GML, November 2016)



Figure 3.88 The distinctive form of the 1970s extension to the Junior School. (Source: GML, November 2016)



Figure 3.89 The eastern side of the Junior School, with a path leading to the lower floor level. (Source: GML, December 2016)



Figure 3.90 The entry lobby of the Junior School. (Source: GML, December 2016)

3.2.5 Campus Core

Central Garden and Driveway

A central campus garden, consisting of sloping lawn, gardens and a small amphitheatre, is located in the area between Centennial Hall, Science, the Junior School and Elamang. The area is separated from Elamang by sandstone retaining walls and gardens, and contains picnic tables and umbrellas. There is direct access to the Science Building rooftop sports courts from this area (Figures 3.91–3.93).

The main driveway leads from the school's Carabella Street gates to Elamang's main entrance (Figure 3.94). The drive follows the line of the original driveway to the school, but features contemporary finishes—granite sets and bitumen. The drive is flanked by well-maintained lawns and gardens. At the base of the drive views of Elamang open up on the south, and views of the harbour open up to the north and northeast.



Figure 3.91 A bird's eye view over the central campus garden. (Source: GML, December 2016)



Figure 3.92 The small amphitheatre within the garden. (Source: GML, December 2016)



Figure 3.93 The central campus garden contains picnic tables and umbrellas. (Source: GML, December 2016)



Figure 3.94 The main driveway leading to Elamang from Carabella Street. (Source: GML, November 2016)

4.0 Heritage Context

4.1 The Subject Site

4.1.1 The Loreto Kirribilli Campus

The Loreto Kirribilli school is listed as an item of local heritage significance in the North Sydney LEP 2013 under the name 'Elamang' (Item I0204) (Figure 4.1). The State Heritage Inventory includes the following Statement of Significance for Loreto Kirribilli:

The listing includes the whole site. Of particular note are 'Elamang', a two-storey Colonial Georgian style mansion c 1851–52, Bell tower, Chapel and Presbtery. No. 71 Carabella St also has association [sic] with the school as the convent. Elamang is an important early house in Kirribilli associated with prominent local family. Built as one of the North Shore mansions on an elevated site commanding extensive harbour view. It is an intact, though modified, Georgian house on substantial grounds. It has been used throughout the twentieth century by a prominent private girls school. It remains a landmark in the area.¹

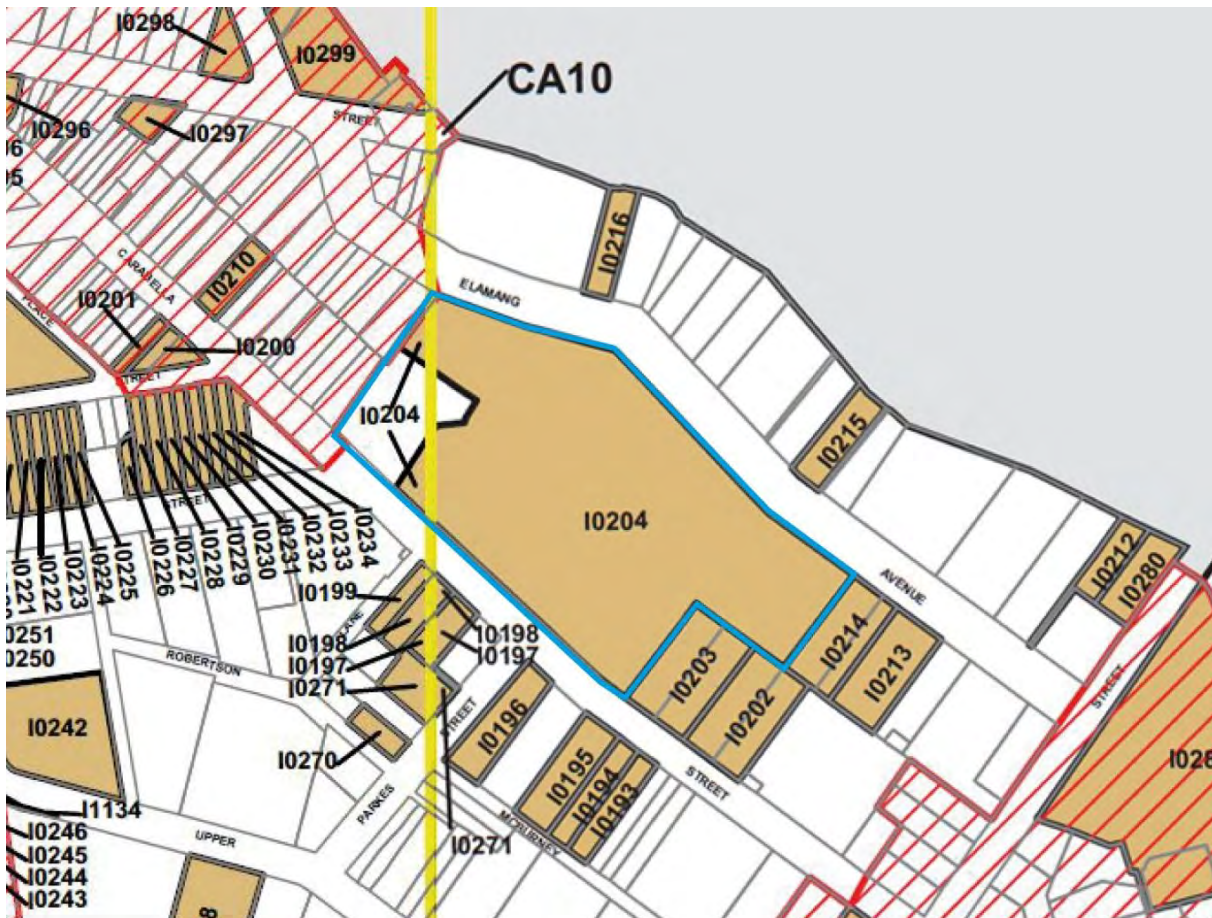
An area of land in the western part of the campus is not included in the listing. This land was purchased by the school in 2010, and includes the Marian Centre and B-Block (Figure 4.2).

There are no items individually listed as heritage items within the school campus.

There are no buildings within the subject site listed on the Australian Institute of Architects Register of Significant Architecture in NSW.

Loreto Kirribilli is not located within any heritage conservation area.

There are several heritage-listed items within the vicinity of the site, and the Careening Cove Conservation Area (CA10) is located to the northwest of the site (Figure 4.1). Refer to Section 4.2 of this report for further information regarding these items and the conservation zone.



Key to heritage listed items:

I0216	29 Elamang Avenue
I0215	17 Elamang Avenue
I0204	Elamang (Loreto Kirribilli)
I0214	Vanduara, 10 Elamang Avenue
I0213	Doondi, 8 Elamang Avenue
I0203	Araluen House, 71 Carabella Street
I0202	Fairhaven, 69 Carabella Street
I0199	58 Carabella Street
I0198	56 Carabella Street
I0197	54 Carabella Street
I0196	Burnleigh, 48 Carabella Street
I0195	44 Carabella Street
I0194	42 Carabella Street
I0193	40 Carabella Street
CA10	Careening Cove Conservation Area

Figure 4.1 The subject site is outlined in blue. Heritage listed items are coloured beige. The red hatched area labelled 'CA10' is the Careening Cove Conservation Area. (Source: North Sydney LEP 2013, Heritage Map Sheet HER_002 and Sheet HER_004 [shown connected], with annotations by GML)



Figure 4.2 Site plan of Loreto Kirribilli: the school's boundaries are outlined in red. The area included in the school's heritage listing is coloured yellow. Araluen House, adjacent to the school, is listed as a separate heritage item. (Source: fjmt, with GML overlay)

4.1.2 Heritage Significance of Buildings and Elements within the Loreto Kirribilli Campus

Although the whole of the Loreto Kirribilli campus is included in the site's heritage listing, the various buildings and elements within the campus make a different relative contribution to the site's heritage value. As such, the buildings within the campus have been graded in accordance with 'grading of significance', as described in the NSW Heritage Office document *Assessing Heritage Significance*, 2001. In this document the various components that make up a heritage item can be graded as exceptional, high, moderate, little and intrusive (Table 4.1). The grading of significance of the buildings at Loreto Kirribilli is summarised in Table 4.2, and illustrated in Figure 4.3.

Table 4.1 Extract from *Assessing Heritage Significance*.

Significance Grading	Justification
Exceptional significance	Rare or outstanding element directly contributing to an item's local and state significance.
High significance	High degree of original fabric. Demonstrates a key element of the item's significance. Alterations do not detract from significance.
Moderate significance	Altered or modified elements. Elements with little heritage value, but which contribute to the overall significance of the item.
Little significance	Alterations detract from significance. Difficult to interpret.
Intrusive elements	Damaging to the item's heritage significance.

Table 4.2 Grading of Significance of Buildings within the Loreto Kirribilli Campus in accordance with Table 4.1.

Building/Component	Grading of the School's Buildings according to Table 4.1	Reason
Western Precinct		
Marian Centre	Little/Moderate—Carabella Street façade	The Marian Centre has only become part of the school campus in recent years and as such it has little historic significance to the school. The building's interiors and north elevation have been altered , although its south elevation (facing Carabella Street) is intact, and features polychrome brick banding. The building makes little contribution to the significance of Elamang, but it makes a positive contribution to the Carabella Street streetscape.
B-Block	Little	B-Block has only become part of the school campus in recent years. It is a utilitarian building of little architectural merit.
Sandstone retaining walls adjacent to B-Block	Moderate	The sandstone retaining walls appear to date from the nineteenth century, and are contemporary with the house 'Tremayne' that once stood on the site of B-Block. The sandstone walls have historical significance as they represent rare nineteenth-century fabric on the site and they are evidence of the past use of the site. Some parts of the walls are intact, but other areas have been altered or modified.
The gymnasium	Little	Built in the 1990s to a design by Leffler Simes Architects, this building is architecturally unremarkable. It has some social significance to the school as part of the building works marking the centenary of the school.
Northern Precinct		
Centenary Hall	Little	Built in the 1990s to a design by Leffler Simes Architects, this building is architecturally unremarkable. It has some social significance to the school as part of the building works marking the centenary of the school.
Science	Little	Built in the 1990s to a design by Leffler Simes Architects, this building is architecturally unremarkable. It has some social significance to the school as part of the building works marking the centenary of the school.

Building/Component	Grading of the School's Buildings according to Table 4.1	Reason
Eastern Precinct		
Music and Performing Arts	Little	Built in the late 1990s this building is architecturally unremarkable, and has little historical significance to the school.
Mary Ward	Moderate	Built in the 1980s, it is one of many school buildings across NSW designed by architect Kevin Curtin. Although the building has some interesting architectural features, the external architectural qualities of the building's main elevation have been compromised by the addition of the Music and Performing Arts building. The building's main interior space, the theatre, is however largely intact . The building is largely blocked from view from both Carabella Street and Elamang Avenue.
Sandstone retaining wall to the south of Mary Ward	Moderate	The wall appears to be contemporary with the now demolished Eversfield (1904), and is largely intact, and in good condition. It has historical significance.
Garbage room	Moderate	A former outbuilding of the now demolished Eversfield (built 1904), the garbage room has lost much of its original architectural quality, with the slate and tiled roof the only legible original features. The building contributes to the Elamang Avenue streetscape.
Southern Precinct		
J-Block (St Joseph's)	Moderate	Built in the 1965 in the Modernist style, the identity of the designer not known. The building has a strong street presence on Carabella Street. The original design has been altered by the top floor addition but otherwise its street-front elevation is otherwise intact.
Chapel building (including presbytery)	Exceptional	The chapel building was the first significant building constructed on the site by the Institute of the Blessed Virgin Mary. It is the spiritual heart of the school, and a landmark of the area, with the tower visible from the harbour and surrounding districts. The original form of the building is largely intact, with the exception of the southern wing (refer below).
Extension to southern wing of chapel	Intrusive	This 1972 addition to the southern wing detracts from the architectural qualities of the original building, and is highly visible from Carabella Street. The form and style of the addition is not sympathetic to the original.
Elamang	Exceptional	Elamang is the only remaining building on the site from the nineteenth century (built 1851). It is an important early house in Kirribilli associated with a prominent local family. It is important to the school as its first building on the campus. The driveway approach to Elamang from Carabella Street is significant as it follows the path of the original approach to the building.
Administration—1921 extension	High	The administration wing is a 1921 eastern addition to Elamang. Although the building's interior has been modified over time and minor additions made externally, the form and character of the building remains legible. It has historical significance as evidence of the early growth of the school. Together with Elamang and the chapel, it forms the core of the school.
Administration—1954 extension	Medium	The 1954 extension has some historic significance as evidence of the growth of the school. The external form of the building remains intact.
Junior School (including the GBC)	Little	The first Junior School building was built in 1960, and has been extended and modified continuously since: it retains little integrity. It has little architectural or historical significance.

Building/Component	Grading of the School's Buildings according to Table 4.1	Reason
Carabella Street boundary wall and gates	High	The rendered and painted masonry wall and the location of the main gates are contemporary with the chapel, and are of historical significance. The wall is a distinctive element of the streetscape.
Campus Core		
Path of the entry driveway to Elamang	Exceptional	The entrance driveway follows the line of the original carriageway to Elamang. The driveway approach to Elamang is an important part of the setting of the building.



Figure 4.3 Diagram summarising the grading of significance of the buildings on the Loreto Kirribilli campus. (Source: fjmt drawing SK-201, with GML overlays)

4.1.3 Landscape

There are no hard landscape elements on site that have been assessed as being of heritage significance, other than the sandstone retaining walls as listed in Table 4.2 and the school's Carabella Street boundary wall. The site's retaining walls, steps, paths, planter boxes and other hard landscape

elements have generally been upgraded or replaced over time as needed, using contemporary materials, and most appear to date from the mid–late twentieth century/early twenty-first century.

The existing trees on the site have been assessed for significance in the arborist's report prepared for the school.² In this report a tree's significance relates to its value in the landscape. There is one tree on the site that is assessed of being of the highest category ('AA') and of high significance, this being the large fig at the northern corner of the campus close to Elamang Avenue (Figure 4.3). This large tree is a prominent part of the Elamang Avenue streetscape.

There are a further 15 trees on the site (and nine adjacent to the site) that have been assessed as being of the slightly lesser 'A' grade, that is 'important trees suitable for retention for more than 10 years and worthy of being a material constraint', and of high significance. These trees are located across all precincts of the campus.

4.2 Heritage Items within the Vicinity of the Proposed Development

4.2.1 Araluen House: 71 Carabella Street

Araluen House is a large detached house adjacent to the Loreto campus' southern corner (Figures 4.4–4.6). Araluen House, including its interiors and rear gardens, is listed as an item of local heritage significance in the North Sydney LEP 2013 (Item I0203) (Figure 4.1). The State Heritage Inventory includes the following Statement of Significance for Araluen House:

Significant example of large domestic residence from the turn of the century. Important (with No. 69 adjacent) as contrast to smaller-scale developments of the period. Good intact example of its style and in a prominent location. Front facades faces harbour whilst a secondary, but also important facade faces Carabella Street. Element in large mansion tradition of the locality. Interior also of significance and the gardens on the eastern side of the building.³

The State Heritage Inventory provides the following description of Araluen.⁴

This building is designed in the Federation Arts and Crafts style. Two storey brick house with multi-gables, projecting three faceted bays, hipped and gabled slate roof with iron ridge caps. Shingle walling to octagonal turret and some wall areas.

Araluen House was designed by James Peddle and constructed c1910. Although Araluen House has been used by the school for educational purposes in the past, it is currently used as the residential home for Sisters of the Institute of the Blessed Virgin Mary, and is not used as part of the school campus.

There are clear views of the house from Carabella Street, although the concrete paved parking area and carport in front of the house detract from its appearance. At the rear of the house (the northeastern elevation) verandahs and extensive areas of fenestration take advantage of the views across the harbour that are afforded by the house's elevated position. Araluen House and its garden are separated from the school campus by timber fencing and high sandstone block retaining walls.

The house has extensive landscaped rear (northeastern) gardens (Figures 4.7–4.9). There is a significant drop in level across the gardens, from a high point adjacent to the house to a much lower area near the northeast property boundary—a fall of some eight metres. There is a gently sloping area adjacent to the house consisting primarily of open lawns. A sandstone block retaining wall topped with a cast iron picket fence runs across the width of the property, defining the edge of this area (Figure 4.7). The stonework of this retaining wall matches stonework used on the lower floor of the house, and was most likely constructed at the same time as the house.

Beyond the retaining wall, the garden descends steeply down to the northeast. This part of the garden consists of terraced garden beds, bordered with dry sandstone walls, dilapidated in some sections (Figure 4.8). Unpaved paths and sandstone stairs crisscross the area between garden beds, which also features natural stone outcrops. Planting is dense and informal, and consists of exotic shrubs and small trees: there is little, if any, native vegetation. At the bottom of the garden (adjacent to the Mary Ward building) is a flat area of lawn and garden about 10 metres in width (Figure 4.9). A large jacaranda tree is located in the northern corner of this part of the garden. A high sandstone wall separates this area from the school campus.



Figure 4.4 The view of Araluen House from Carabella Street. (Source: GML, 2016)



Figure 4.5 The view of Araluen House from the northeast (from the rooftop of the Mary Ward building). This is considered to be the building's 'front' elevation. The vegetation of its garden can be seen in the foreground. (Source: GML, 2016)



Figure 4.6 The northeast elevation of Araluen House, with gently sloping lawn area in the foreground. (Source: GML, December 2016)



Figure 4.7 The sandstone retaining wall with metal picket fence at the edge of the gently sloping lawn. From this point the garden falls steeply to the northeast. (Source: GML, December 2016)



Figure 4.8 The garden features dry stone walls, garden beds, stone steps and pathways. (Source: GML, December 2016)



Figure 4.9 The flat lawn area at the base of the garden. (Source: GML, December 2016)

4.2.2 Fairhaven: 69 Carabella Street

Fairhaven, a detached masonry house dating from the early twentieth century, was designed by James Peddle (Figures 4.10 and 4.11). It is located adjacent to Araluen House on its southeastern side. Fairhaven's northeastern property boundary partly abuts that of the school. It is listed as an item of local heritage significance in the North Sydney LEP 2013 (Item I0202) (Figure 4.1). The State Heritage Inventory includes the following Statement of Significance for Fairhaven.

Significant example of early twentieth century large domestic residence. Important (with its neighbour, No. 71) as a contrast to smaller scale developments of same period. Good example of its architectural style. Part of the large mansion tradition of the locality. The house is set prominently above the street with an elaborately detailed verandah. The garden on the eastern side is terraced down the slopes and includes a swimming pool and a tennis court. The interior is generally intact.⁵

The State Heritage Inventory provides the following description of Fairhaven.

Single storey brick house on a rendered base set tight to the street. Multiple gabled slate roof and terracotta cappings and tall brick chimneys with terracotta pots and an octagonal turret tower. Upper walls in roughcast render with open projecting eaves and decorative eaves brackets to the entrance porch. Boarded and shingled gables and elaborately detailed verandah. Two pane timber framed double hung sash windows. Multicoloured brick wall and piers at entrance. High wall to street with swept stepped brickwork. Modern garage at lower end. Modern extension to rear.

This building is designed in the Federation Arts and Crafts style. Single storey brick house on sandstone basement with slate roof. Boarded and shingled gables; octagonal turretted tower. Multi-gables with terracotta ridge caps, rough-cast walls below eaves and tall brick chimneys.⁶



Figure 4.10 The view of Fairhaven from Carabella Street.
(Source: GML, 2016)



Figure 4.11 The view of Fairhaven from the north (from the roof of the Mary Ward building). (Source: GML, 2016)

4.2.3 Vanduara: 10 Elamang Avenue

Vanduara is a detached residential dwelling that is located adjacent to the school campus on its southeastern side. Built in the early twentieth century, it was designed in the Federation Queen Anne style by James Robertson. The house sits high above Elamang Avenue, set back from the street behind sandstone walls and gardens, and little of the house can be seen from Elamang Avenue or from the school (Figures 4.12 and 4.13). Vanduara is listed as an item of local heritage significance in the North Sydney LEP 2013 (item I0214). The State Heritage Inventory includes the following Statement of Significance for Vanduara.

A very good example of a large two storey, Federation style house set prominently above the street in a large, terraced garden setting with elaborate detailing and massing. Continues local tradition of large mansion-type development. The interior retains original decorative fabric.

The State Heritage Inventory includes the following in its description of Vanduara.

A large two storey, multi gabled brick house on a stone base set high above the road with an extensive garden setting. Terracotta tile roof with half-timbered upper gables on brackets and chimneys with sandstone cappings. Projecting sandstone verandah to the front with terracotta tile roof on turned timber columns with painted brick beyond. Faceted bay doors to the verandah with faceted bay windows above. Leadlights. Side pitched roof porch on turned timber columns with swept timber valance. Large terraced garden to the front with sandstone steps and a high sandstone retaining wall to the street with integrated single, and double garages with moulded flat pediments. High palm tree and high Yew hedge to the front. The house has commanding views over the harbour.

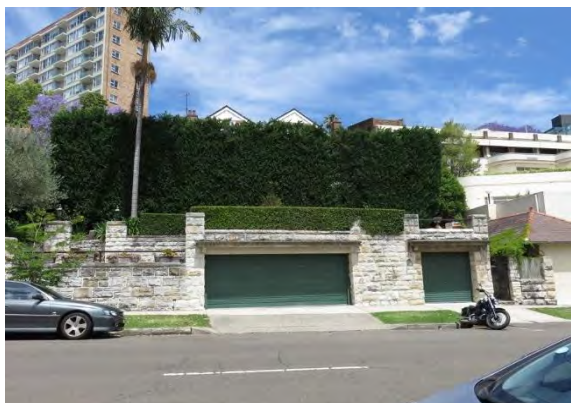


Figure 4.12 The view of Vanduara from Elamang Avenue is largely concealed by vegetation. (Source: GML, 2016)



Figure 4.13 Doondi can be seen on the left, and Vanduara on the right, as viewed from Elamang Avenue. (Source: GML, 2016)

4.2.4 Doondi: 8 Elamang Avenue

Doondi is a large two-storey Federation house set high above Elamang Avenue within a garden setting (Figure 4.13). The house is listed as an item of local heritage significance in the North Sydney LEP 2013 (item I0213). The State Heritage Inventory includes the following Statement of Significance for Doondi.

An excellent example of a large Federation period residence complete with mature garden, it is set prominently above the street. Continues local tradition of large mansion-type development. Intact room configuration and impressive interior detailing with decorative patterned ceilings, joinery and fireplaces.⁷

4.2.5 29 Elamang Avenue

A detached two-storey house is located opposite the school at 29 Elamang Avenue. Designed in the Victorian Italianate style, the building is sited close to the street (Figure 4.14). The house is listed as an item of local heritage significance in the North Sydney LEP 2013 (item I0216). The State Heritage Inventory includes the following Statement of Significance for 29 Elamang Avenue.

An interesting Victorian residence in the Italianate style in an important waterfront location on Careering Cove. Relatively unusual double-frontage to street and waterfront. Possibly the earliest building remaining along the foreshore between Willoughby Street and Peel Street.⁸

4.2.6 17 Elamang Avenue

Located opposite the school, 17 Elamang Avenue is a detached brick house. The house is set low to the street, with little of the house visible from Elamang Avenue except its roof (Figure 4.15). The house is listed as an item of local heritage significance in the North Sydney LEP 2013 (item I0215). The State Heritage Inventory includes the following Statement of Significance for 17 Elamang Avenue: 'An example of a two-storey waterfront house in the Federation Style.'⁹



Figure 4.14 29 Elamang Avenue, street elevation. (Source: GML, 2016)



Figure 4.15 17 Elamang Avenue, street elevation. (Source: GML, 2016)

4.2.7 56 and 58 Carabella Street

Located opposite Loreto Kirribilli is 56 and 58 Carabella Street, a pair of two-storey semi-detached brick houses set high above the street (Figure 4.16). The houses are both listed as items of local heritage significance in the North Sydney LEP 2013 (items I0198 and I0199). The State Heritage Inventory includes the following Statement of Significance for both 56 and 58 Carabella Street.

A fine example of a Federation period pair of semi-detached Federation Filigree houses and one of the best examples in Kirribilli. The house is set prominently above the street with an elaborately detailed verandah.¹⁰

4.2.8 54 Carabella Street

The house at 54 Carabella Street is a two-storey brick Arts and Crafts style house set high above Carabella Street. It is located opposite Loreto Kirribilli. The house is listed as an item of local heritage significance in the North Sydney LEP 2013 (item I0197). The State Heritage Inventory includes the following Statement of Significance for 54 Carabella Street.

An example of the Arts and Crafts style of domestic building, with simple detailing around a symmetrical plan. An important relic of the development pattern of the area, indicating the use of up to date architectural styles. Relates well to the earlier Queen Anne style houses at nos 69 and 71 Carabella Street. The house has a complicated composition with high quality and unusual detailing.¹¹

4.2.9 Burnleigh: 48 Carabella Street

At 48 Carabella Street is a two-storey stone and brick mid-Victorian house set high above Carabella Street behind terraced gardens (Figure 4.18). It is located opposite Loreto Kirribilli. The house is listed as an item of local heritage significance in the North Sydney LEP 2013 (item I0196). The State Heritage Inventory includes the following Statement of Significance for 54 Carabella Street.

A rare example of a mid-Victorian house in its original curtilage. A fine substantial period dwelling which is associated with a local alderman and which has been little altered. Owned by one family for nearly a century.¹²

4.2.10 44 Carabella Street

At 44 Carabella Street is a two-storey late-Victorian brick house set high above Carabella Street (Figure 4.19). It is located opposite Loreto Kirribilli, on a part of Carabella Street where the street is split in level by a stone cliff along its length: the stone cliff and high retaining walls provide a substantial separation between the house and the school. The house is listed as an item of local heritage

significance in the North Sydney LEP 2013 (item I0195). The State Heritage Inventory includes the following Statement of Significance for 44 Carabella Street.

A good example of a late-Victorian Italianate house in an elevated position. Indicative of the mid-nineteenth century development in the area. Original room configuration and detailing evident.¹³

4.2.11 40 and 42 Carabella Street

40 and 42 Carabella Street are a pair of two-storey semi-detached terrace houses (Figure 4.20). They are located diagonally opposite Loreto Kirribilli, on a part of Carabella Street where the street is split in level by a stone cliff along its length: the stone cliff and high retaining walls provide a substantial separation between the house and the school. The houses are listed as items of local heritage significance in the North Sydney LEP 2013 (item I0193 and I1094). The State Heritage Inventory includes the following Statement of Significance each for 40 and 42 Carabella Street.

One of a fine pair of large Victorian semi-detached townhouses in an elevated position commanding extensive views. Most detailing appears intact.¹⁴



Figure 4.16 56 and 58 Carabella Street, street elevation. (Source: GML, 2016)



Figure 4.17 54 Carabella Street, street elevation. (Source: GML, 2016)

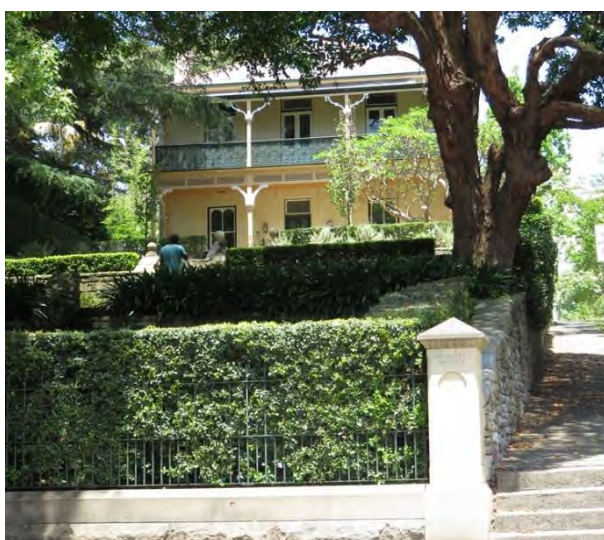


Figure 4.18 Burnleigh, 48 Carabella Street, street elevation. (Source: GML, 2016)



Figure 4.19 44 Carabella Street, street elevation. (Source: Google Earth, viewed 14 March 2017)



Figure 4.20 The terrace houses at 40 and 42 Carabella Street. (Source: GML, 2016)

4.3 Heritage Conservation Areas within the Vicinity of the Proposed Development

4.3.1 Careening Cove Conservation Area

The Careening Cove Conservation Area is located adjacent to the Loreto campus on its northwestern side (Figures 4.16 and 4.17). It encompasses areas of Kirribilli and Neutral Bay centred around and looking into Milson Park and Careening Cove. The Careening Cove Conservation Area (labelled CA10) is listed as having local significance in the North Sydney LEP 2013. The North Sydney DCP 2013 provides the following Statement of Significance for the Careening Cove Conservation Area:

The Careening Cove Conservation Area is significant:

(a) as a largely consistent early 20th century residential area with an unusual and irregular pattern of street layout and irregular subdivision pattern that give the area a particular character.

(b) as retaining much of the urban detail and fabric seen in gardens, fencing, street formations, use of sandstone for retaining and building bases, sandstone kerbing and natural rock faces.

(c) for the amphitheatre like form around the reclaimed Milson Park and the head of the bay.

(d) for the remaining waterfront industrial and recycled industrial development that gives the area much of its character.¹⁵

The North Sydney DCP 2013 includes the following description of the Careening Cove Conservation Area.

The Careening Cove Conservation Area is located around the bay forming Careening Cove and bounded by High Street, Broughton Street and Crescent Place.

The landform slopes to the Bay with a flat area of reclaimed land close to the Cove. The subdivision pattern varies with a grid of rectangular lots that are cut to suit the diagonal street pattern and topography.

The Conservation Area is characterised by two storey, late Victorian terraces, single and two storey Federation and Inter-War dwelling houses and residential flat buildings. The area retains groups of picturesque industrial buildings with associated jetties, slipways, moorings and equipment. The Ensemble Theatre was one of the first recycled industrial buildings in Sydney.¹⁶



Figure 4.16 Looking east along Elamang Avenue, within the Careening Cove Conservation Area. The sandstone retaining walls are a characteristic of the area. (Source: GML, 2016)



Figure 4.17 Willoughby Street, within the Careening Cove Conservation Area. (Source: GML, 2016)

4.4 Endnotes

- ¹ NSW Office of Environment and Heritage, State Heritage Inventory, 'Elamang', database No. 2180066, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180066>>.
- ² Naturally Trees, 'Arboricultural Impact Appraisal and Method Statement, 85 Carabella Street Kirribilli', 24 November 2016.
- ³ NSW Office of Environment and Heritage, State Heritage Inventory, 'Araluen House', database No. 2180007, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180007>>.
- ⁴ NSW Office of Environment and Heritage, State Heritage Inventory, 'Araluen House', database No. 2180007, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180007>>.
- ⁵ NSW Office of Environment and Heritage, State Heritage Inventory, 'Fairhaven', database No. 2180002, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180002>>.
- ⁶ NSW Office of Environment and Heritage, State Heritage Inventory, 'Fairhaven', database No. 2180002, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180002>>.
- NSW Office of Environment and Heritage, State Heritage Inventory, 'Doondi', database No. 2182004, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2182004>>.
- ⁸ NSW Office of Environment and Heritage, State Heritage Inventory, 'House—29 Elamang Avenue', database No. 2180074, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180074>>.
- ⁹ NSW Office of Environment and Heritage, State Heritage Inventory, 'House—17 Elamang Avenue', database No. 2182008, viewed 3 November 2016 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2182008>>.
- ¹⁰ NSW Office of Environment and Heritage, State Heritage Inventory, 'House—58 Carabella Street', database No. 2181533, viewed 14 March 2017 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2181533>>.
- ¹¹ NSW Office of Environment and Heritage, State Heritage Inventory, 'House—54 Carabella Street', database No. 2180013, viewed 14 March 2017 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180013>>.
- ¹² NSW Office of Environment and Heritage, State Heritage Inventory, 'Burnleigh', database No. 2180014, viewed 14 March 2017 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180014>>.
- ¹³ NSW Office of Environment and Heritage, State Heritage Inventory, 'House—44 Carabella Street', database No. 2180006, viewed 14 March 2017 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2180006>>.
- ¹⁴ NSW Office of Environment and Heritage, State Heritage Inventory, 'House—42 Carabella Street', database No. 2181532, viewed 14 March 2017 <<http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=2181532>>.
- ¹⁵ North Sydney Development Control Plan 2013, Area Character Statements, pp C 8–13.
- ¹⁶ North Sydney Development Control Plan 2013, Area Character Statements, pp C 8–12.

5.0 Historical Archaeological Potential and Significance

5.1 Introduction

This section evaluates the subject site's potential to contain historical archaeological resources. It also assesses the heritage significance of known or potential archaeological remains, in order to identify appropriate mitigation measures for the management of the development impacts.

5.2 Historical Archaeological Potential

The assessment of archaeological potential is based on examination of the historical development and occupation of the site with consideration of the current site conditions, including evidence of demolition and construction activities that may have disturbed archaeological remains of past uses.

5.2.1 Relevant Archaeological Studies

To date there have not been any archaeological investigations undertaken within the Loreto Kirribilli school site. A review of previous archaeological studies undertaken within the vicinity of the site identified two investigations which may inform the types of material culture which could be anticipated. A summary of these is provided below.

64–66 Cremorne Road—Godden Mackay 1994

Godden Mackay (now GML Heritage) undertook archaeological monitoring and excavation at the site in February 1994 prior to redevelopment of the site.¹ Historical research indicated that a road leading down to Cremorne Point previously traversed the site and it was hoped that the archaeological investigation would be able to provide more secure dating of the feature which was currently known to have been constructed at some time between 1853 and c1880s. Excavation of a single area measuring 2m x 2m uncovered a row of sandstone 'floaters' (blocks) below the garden topsoil. As the sandstone blocks followed the known alignment of the roadway it was concluded that the remains had formed part of the earlier road surface. However, there was not sufficient evidence to date the remains. In addition, the excavation identified two shallow postholes that may have been supports for a tent thought to have been erected on the site c1904 by the Powell family prior to construction of the existing house in 1906. Alternatively, the postholes may have formed part of a garden shed, fence line or other garden related activities.

Luna Park Archaeological Monitoring—Godden Mackay Logan 2004

Godden Mackay Logan (now GML Heritage) undertook archaeological monitoring at Luna Park, North Sydney, in 2002 and 2003 as part of redevelopment works. A test trench was excavated along the foreshore of Sydney Harbour to look for evidence of a boat shed depicted in an 1891 plan of the site, as well as to study the site's stratigraphy for evidence of disturbance to earlier deposits. Intact stratigraphy was encountered beneath the present asphalt surface at Luna Park, suggesting that the broader site has the potential to contain intact archaeological deposits associated with various phases of use, including early nineteenth-century 'watermen', late nineteenth-century railways and industrial uses of the site in the early twentieth century.²

A cistern and well were also excavated within the Luna Park site. The well had been excavated directly into bedrock, lined with a single skin of sandstock bricks and rendered with grey, sandy concrete. The well was depicted in an 1891 plan of the site created by Sydney Water (part of the same series as Figure 2.11). The cistern was also carved into the bedrock and lined with sandstock bricks rendered

with grey, sandy concrete, suggesting that the two were contemporaneous.³ However, the cistern is not depicted on the 1891 plan of the site suggesting that while houses and water closets were recorded on the 1890 and 1891 plans of the study area, there is still moderate potential for substantial, unrecorded features with sealed artefact deposits such as cisterns at former domestic sites of similar date.

5.2.2 Phases of Historical Development

There are three main phases of historical development which may have resulted in archaeological remains:

- Phase 1: Early land grants (1788–1825);
- Phase 2: James Milson land grant and Miandetta Estate (1825–1903); and
- Phase 3: Early twentieth-century subdivisions and the development of Loreto School (1903–Present).

Phase 1: 1788–1825

The subject site is within land first granted to Robert Ryan. The land was likely cleared and used for cattle grazing or other low intensity uses.

Phase 2: 1825–1907

The site became part of James Milson's land grant in 1825. Records indicate he used the property as a residence and depot for his regional farms. Historic plans indicate that most of the site was divided between the estates of the four properties associated with the Milson family: Elamang, Coreena, Tremayne and The Hermitage built between 1850s–1860s. In addition to the four mid-nineteenth century houses, plans indicate the addition of outbuildings and stables, driveways, and landscaped garden features by the late nineteenth century.

Phase 3: 1904–Present

This phase is characterised by redevelopment and expansion, resulting in significant changes to the layout of the site. The subdivision of part of the Elamang estate in 1903 facilitated the construction of five new houses in the eastern part of the site between 1904 and c1910. Following this, the site underwent a number of successive stages of redevelopment during this phase resulting in the demolition of most of the earlier properties and requiring areas of deep excavation and terracing of the site which had a substantial impact on the survival of archaeological remains across portions of the site.

5.2.3 Analysis of Site Disturbance

The degree of disturbance to each site feature is assessed on a scale as minor, moderate or major:

- Minor disturbance—the area or feature has been subject to activities that may have had a minor effect on the integrity and survival of archaeological remains.
- Moderate disturbance—the area or feature has been subject to activities that may have affected the integrity and survival of archaeological evidence. Archaeological evidence may be present; however, it may be disturbed.