ATKINS



Hampstead Heath Ponds Project



Notice

This document and its contents have been prepared and are intended solely for The City of London Corporation's information and use in relation to the Hampstead Heath Flood and Water Quality Management works Walters & Cohen assumes no responsibility to any other party in respect of or arising out of or in connection with this document and/or its contents.

Document history

Job number: Document ref:		
200	ber: Document ref:	

Revision	Purpose description	Originated	Checked	Reviewed	Authorised	Date
Rev 1.0	Draft	JW	CW	CW		20/06/14
Rev 2.0	Final	JW	CW	CW		30/06/14

Design team

Client: The City of London Corporation

Lead Environmental Landscape Architect: Atkins

Panel Engineer: Atkins

Environmental Consultant: Atkins

Planning Consultant: Atkins

M&E Engineer: Atkins

Architect as subconsultant to Atkins: Walters & Cohen Architects

Structural Engineer as subconsultant to Walters & Cohen Architects: Jane Wernick Associates

Contents

Notice

Document history Design team

1. Introduction to buildings at Kenwood Ladies' Bathing Pond

Executive summary Site context Planning context

2. **Brief**

3. **Site analysis**

Local character
Visibility
Trees and vegetation
Existing buildings
Site constraints and opportunities
Options appraisal

4. **Design principles and concepts**

Layout plan
Proposed use
Scale and massing
Appearance, materials and architectural treatment

5. Access to the building

Pedestrian access Vehicular access

6. **Stakeholders consultations**

7. **Appendices**

Appendix A Drawings of existing buildings Appendix B Drawings of proposed buildings

1. Introduction

Executive summary

This Design and Access Statement describes the proposed new changing and lifeguard facilities at the Kenwood Ladies' Bathing Pond on Hampstead Heath. The project forms part of the Hampstead Heath Ponds Project, the aim of which is to improve the safety of several dams on the Heath and prevent them from failing in extreme rainfall and major storms. For further detail of the Hampstead Heath Ponds Project, please refer to Atkins' Planning, Design and Access statement, Environmental Statement and Sustainability Statement. The proposed new buildings replace the existing facilities but provide the same accommodation, i.e. modest changing and toilet facilities for swimmers, and welfare and observation facilities for lifeguards. The existing buildings are not listed and there is no change to the use.

The Kenwood Ladies' Bathing Pond forms part of a chain of ponds known as the Highgate Ponds. The area of the existing buildings is 97m2, the area of the proposed buildings is 121m2. An access deck of 100m2 is provided, which matches the area of the existing access deck. The proposed new buildings are located in the same location as the existing buildings and makes use of existing piles and as much of the existing deck as possible. The marginal increase in floor area is necessary to ensure that the new buildings comply with current Building Regulations and the Equality Act. Section 2 of this Design and Access Statement provides details on the brief and includes an area comparison between the existing and new facilities.

The existing buildings were built in 1991 and replaced an older facility that was destroyed by fire. For a number of reasons the existing facilities are no longer fit for purpose. As part of the Hampstead Heath Ponds Project, a new spillway is required to the west of the existing buildings as well as the restoration of the crest of the existing dam, which will increase in height. As a result, the lifeguard welfare facility currently located in temporary accommodation on the dam crest and new spillway will be lost. It is not possible to accommodate these welfare facilities in the existing buildings, as these are already too small to meet the requirement of users and lifeguards. The reason behind the decision to replace rather than retain the existing buildings is explained in more detail in the options appraisal in section 3.

The proposed new buildings will be lower in height and less bulky in appearance than the existing, and will use materials that are in keeping with the character of Hampstead Heath and the Kenwood Ladies' Bathing Pond in particular. The design team has gone to great lengths to avoid any adverse impact on the natural and historic environment of Hampstead Heath. Access to the buildings from the Heath remains unchanged, and landscape improvements are outlined in Atkins' Sustainability Statement and Environment Statement.

The proposed buildings are the result of extensive stakeholder consultation and design reviews over the past two years. Please refer to Atkins' Sustainability Statement and Environment Statement for the landscape strategy to the area immediately surrounding the new buildings and the sustainability statement that addresses climate change adaptation measures. The consultation process is detailed in section 6 of this report.

Below is a summary of key project details:

Gross internal floor area of existing building [excluding concrete deck] 97 sqm

Gross internal floor area of new building [excluding concrete deck] 121 sqm



Figure 1.1 Aerial photograph of Kenwood Ladies' Bathing Pond

Site Context

Hampstead Heath is a public open space of enormous local and regional importance, which is recognised by its designation as Metropolitan Open Land. The Heath provides much-needed breathing space away from the urban environment of London. The Heath is the largest open space in northwest London and receives over 7 million visitors a year. There are around thirty ponds on the Heath, forming an essential part of the character of the Heath. All are man-made, built as reservoirs for drinking water around 300 years ago and fed by natural springs. There are substantial dams containing most of the ponds, generally made of earth. Other than acting as reservoirs, the ponds also contribute to the Heath's diverse wildlife habitats and provide much-loved open-water swimming facilities.

The Hampstead Heath Ponds Project focuses on eleven of the ponds on the Heath, known collectively as the Highgate chain, situated on the northeast side of the Heath. The Kenwood Ladies' Bathing Pond is situated along the Highgate chain. The City of London has a legal obligation to improve the safety of the dams while maintaining the natural environment.

The Kenwood Ladies' Bathing Pond is open to the public every day of the year, and is open to women and girls over the age of eight. The current buildings were built in 1991 following a fire. They are accessible from Millfield Lane to the northeast of the Heath and from the southwest path within the Heath. The new buildings will be located on the existing concrete deck. The proposed design is the result of careful consultation with all stakeholders. The buildings are modest and simple, replacing and improving the existing facilities without compromising the beauty and seclusion of the bathing pond.



Figure 1.2 Panoramic view of Kenwood Ladies' Bathing Pond

Planning Context

This Design and Access Statement pertains solely to the proposed buildings, and not the surrounding engineering, landscape and environmental works. The Design and Access Statement addresses use, layout, scale, appearance and access.

The proposed buildings promote sustainable design and construction measures as follows:

The orientation of the buildings has limited glazing to the south elevation, and includes a retractable canopy to provide summer shading to the northwest elevation. The buildings have a compact form with a low surface area to volume ratio to reduce heating demands. Energy-efficient light fittings and low water consumption sanitaryware fixtures will be incorporated in the buildings, as well as rainwater harvesting tanks for flushing toilets to reduce water consumption. For further details on the environmental and sustainability strategy refers to Atkins' Sustainability Statement and Environment Statement. The use of renewable energy and sustainability material would be considered at the next design phase. The proposed non-domestic buildings have a floor area of less than 500m2, so a BREEAM assessment is not required.



Figure 1.3 Guide map to Hampstead Heath

2. Brief

Walters and Cohen's brief for the work at the Kenwood Ladies' Bathing Pond is to replace the existing buildings with new buildings located on the existing deck. The existing buildings are in no longer large enough to accommodate the needs of lifeguards and users, and changing rooms and toilets do not meet current building standards and regulations. Most importantly the new buildings will address safety, equal access and welfare issues as follows:

Improved changing rooms, shower and toilets to meet requirements in line with the Equality Act (EA) and National Building Regulations

Improved lifeguards' observation area for safety of swimmers

Improved lifeguards' office and rest area

Improved observation of swimmers

Improved crowd management and observation on the deck area

Existing accommodation schedule

Room names	Description	Area
Lifeguard area	Observation area	
	Office space	
	Kitchenette	
	wc	
	Shower	34 sqm
WC area	Washbasin	
	wc	
	Accessible WC/ first aid	17 sqm
External changing area	Changing cubicles	
	Communal changing area	24 sqm
Internal changing area	Shower/accessible shower	
	Communal changing area	20 sqm
Platform area	External covered area	
	External non-covered area	
Plant room		2 sqm
Platform area		100 sqm
Gross internal area		97 sqm

Proposed accommodation schedule

Room names	Description	Area	
Lifeguard area	Observation area		
	Office space		
	Kitchenette		
	WC		
	Shower/ first aid	46 sqm	
WC area	Washbasin		
	WC		
	Accessible WC	22 sqm	
External changing area	Changing cubicles		
	Communal changing area	24 sqm	
Internal changing area	Shower/accessible shower		
	Communal changing area	26 sqm	
Platform area	External covered area		
	External non-covered area		
Plant room		3 sqm	
Platform area		100 sqm	
Gross internal area		121 sqm	

3. Site analysis

Local character

The seclusion of the pond, with mature trees and hedgerows to the entire perimeter of the pond, creates a quiet, peaceful and relaxing environment for swimmers. The most prominent feature is the emerald green pond surface enhanced by the surrounding mature trees.

The changing rooms for swimmers and the lifeguard's accommodation are modest. Despite the overwhelming beauty of the surrounding landscape, the butterfly roof profile of the existing building, with its dark green plastered walls and brown timber facia, appears out of context with the character of the pond and the Heath. Paths leading to the changing room and lifeguard facilities are surfaced with hardcore and topped with gravel. Low level black iron fencing on either side of the path leads swimmers to the pond from the Millfield Lane side, and timber fencing from the Heath side. Over time, the fencing and timber posts have blended in with the dark trunks of the trees, and become less visible.

The architecture of the proposed buildings is modest in height and scale and uses materials that are in harmony with the landscape, and will not compete with the natural beauty of the pond setting. The new buildings are clad in timber, stained to blend in with the dark trunks of the surrounding trees, so the built form is part of the surrounding landscape.

Visibility

The Kenwood Ladies' Bathing Pond is in a secluded part of the Highgate chain of ponds. Mature trees and hedgerows edge the entire perimeter of the pond. The proposed buildings, situated on the existing deck, are not visible from main public footpaths within the Heath. The seclusion of the pond will be maintained to minimise the visual impact and the effects on users, and maintain the spirit of place.

Trees and vegetation

Please refer to Atkins' Sustainability Statement and Environment Statement for further details.



Figure 3.1 View from east corner of the pond



Figure 3.2 View from the existing deck toward the Heath beyond

Existing buildings

The existing buildings provide facilities for swimmers to change and shower. The lifeguard's facilities include an observation area as well as related welfare facilities for the lifeguards who safeguard the pond 365 days a year.

The existing buildings are no longer fit for purpose. The loss of ancillary lifeguard facilities due to the proposed spillway and restored dam crest mean that safe operation of the pond will not be possible. The current buildings do not meet the requirements of the building regulations or comply with the Equality Act.

The ways in which the current buildings meet neither safety requirements, nor current building standards, are as follows:

- 1. Limited window area restricts the lifeguard's lines of sight and view over the entire water surface of the pond.
- 2. Current equipment and first aid area is not accessible from the deck, and is now used as a welfare area for the lifeguards.
- 3. Lifeguards' shower area is remote from the observation area and there is no designated toilet for lifeguards.
- 4. Current disabled toilet doubles as a first aid room and is not adequate in size.
- 5. No designated disabled WC and no disabled shower with level access to meet standards set out in the Equality
- 6. Limited natural light and ventilation to internal changing room.
- 7. Store room serves as a plant room, which does not comply with health and safety requirements.
- 8. Congestion on the deck on busy days caused by swimmers queuing for the toilets and to get into the pond.
- 9. Limited covered area for protection from the sun or rain.



Figure 3.3 Disabled WC doubles as first aid room



Figure 3.5 Limited natural light and ventilation



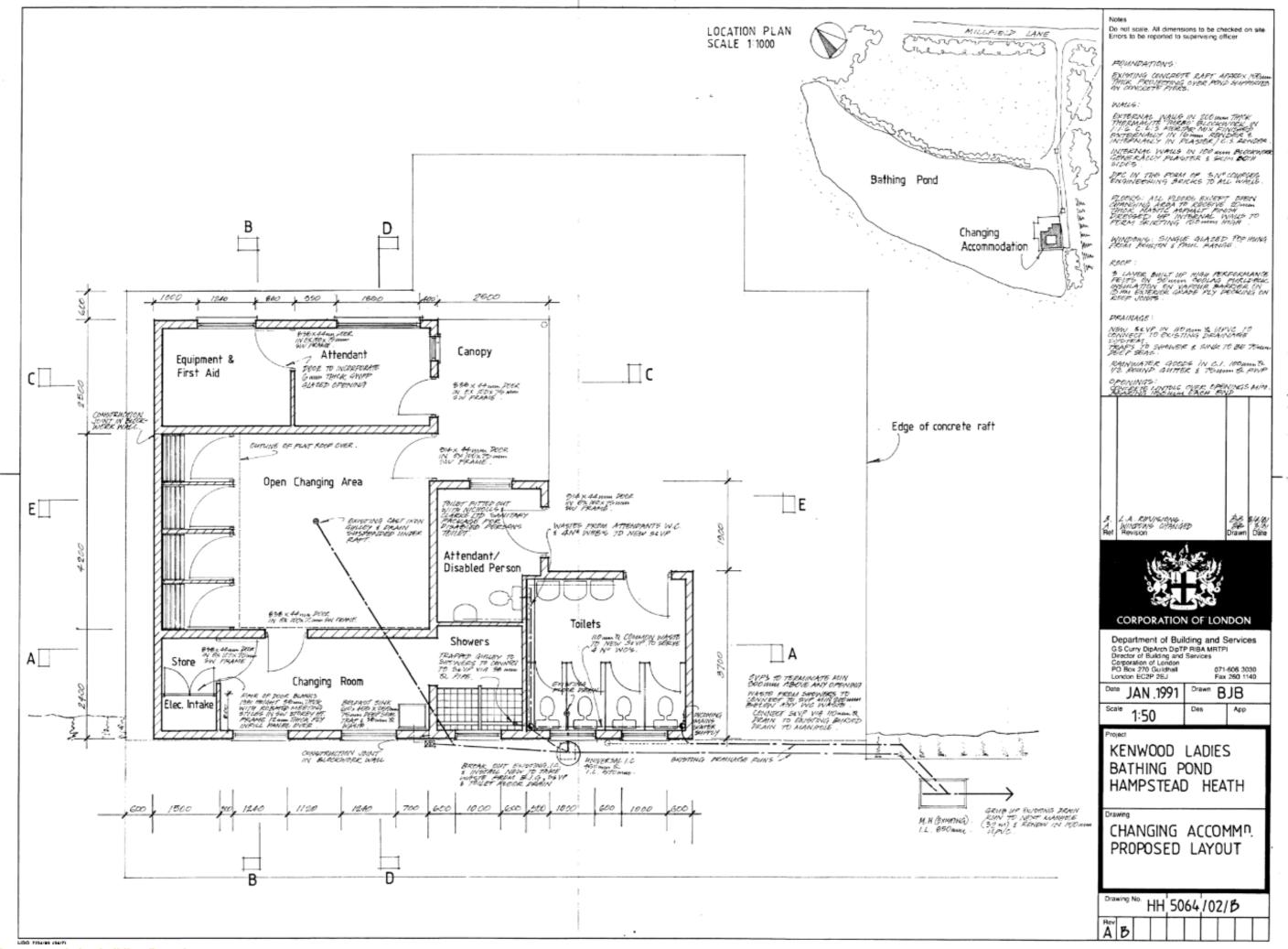
Figure 3.4 Lifeguards' welfare area remote and small



Figure 3.6 Shower area not accessible



Figure 3.7 Limited window area obstructs lifeguards' sight line of the pond. Bulky roof profile



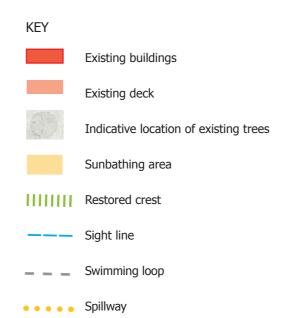
Site observations and opportunities

The site constraints we have designed to are:

- 1. The restored crest, which forms part of the dam restoration work, is situated along the path between the Kenwood Ladies' Bathing Pond and the Bird Sanctuary pond. It was deemed unsuitable to have a building on the restored crest.
- 2. The spillway, which forms part of the dam restoration work, is situated to the southwest corner of the pond. It was deemed unsuitable to have a building on the spillway.
- 3. The view corridor through the northeast corner of the pond is much-loved by the swimmers, and provides a visual connection to the rest of the Heath. It was deemed unsuitable to have a building blocking views over the Bird Sanctuary pond.
- 4. The meadows to the north and south are designated areas for sunbathing, and the lifeguards would not be able to see the entire length and width of the pond. It was deemed inappropriate from a safety point of view to have a building located on the meadow.

The site opportunities are:

- 1. Provide lifeguards with an observation area that has clear sight lines of the entire pond to improve the safety of swimmers.
- 2. Reuse existing concrete deck and piled foundations, resulting in reduced tree removal and general disruption to the Heath.
- 3. Provide improved facilities for lifeguards and swimmers that are sustainable, robust and sensitive to the unique environment of the Kenwood Ladies' Bathing Pond.



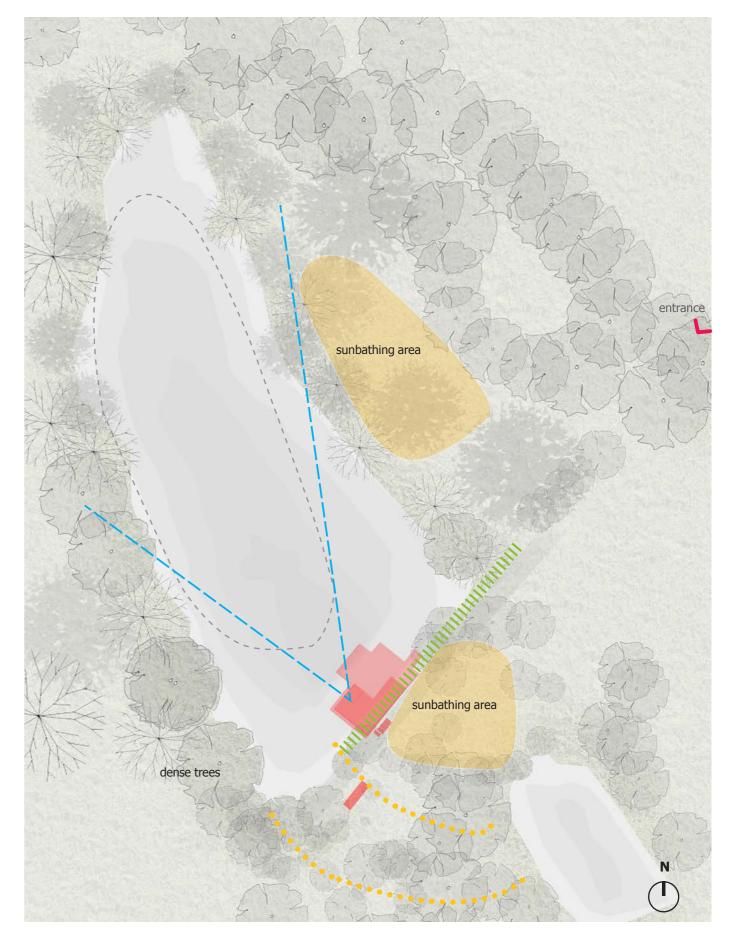


Figure 3.9 Existing site plan

Options appraisal

We have undertaken extensive consultation with stakeholders, lifeguards, City of London and team of engineers to arrive at the proposed scheme. The options we considered along the way are described below:

Option 1

Advantages

- Opportunity to locate the buildings on the water with a floating pontoon foundation
- No building on restored crest, allowing engineer to survey dam and carry out future maintenance work

Disadvantages

- Buildings take up too much of the area used for swimming
- Buildings limit lifeguards' sight lines of the entire water surface

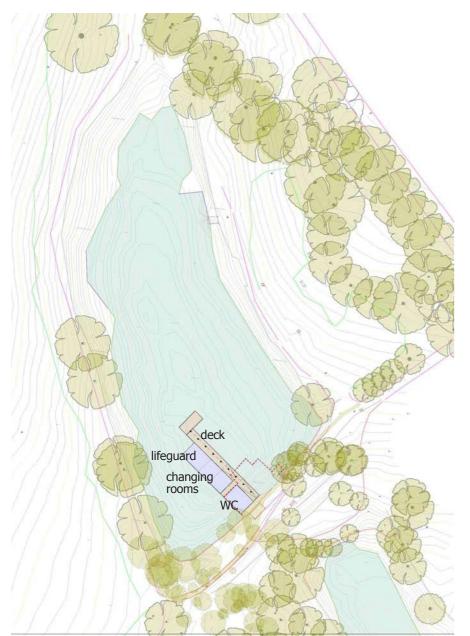


Figure 3.10 Option 1

Option 2

Advantages

- Building along edge of restored crest would not disrupt swimming loop
- Lifeguards have views of the entire pond
- Not building on restored crest, allowing engineer to survey dam and carry out future maintenance work
- Emergency access to north meadow sunbathing area for lifeguards to attend to swimmers

Disadvantages

- Trees to northeast edge of restored crest removed
- Access to platform area from boardwalk could be difficult to monitor
- View corridor to the northeast edge of the pond cut off while swimming

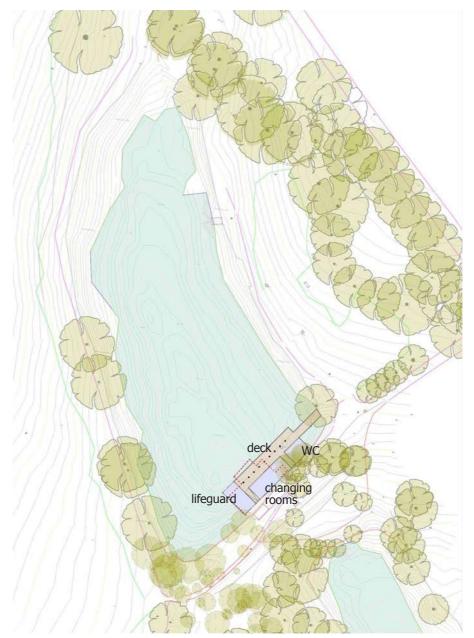


Figure 3.11 Option 2

Options appraisal

Option 3

Advantages

- Building along edge of restored crest would not disrupt swimming loop
- Swimmers have views of the entire pond
- No building on restored crest, allowing engineer to survey dam
- Retain existing trees to northeast edge of raised crest

Disadvantages

- Platform takes up too much of the area used for swimming
- View corridor to the northeast edge of the pond cut off while swimming

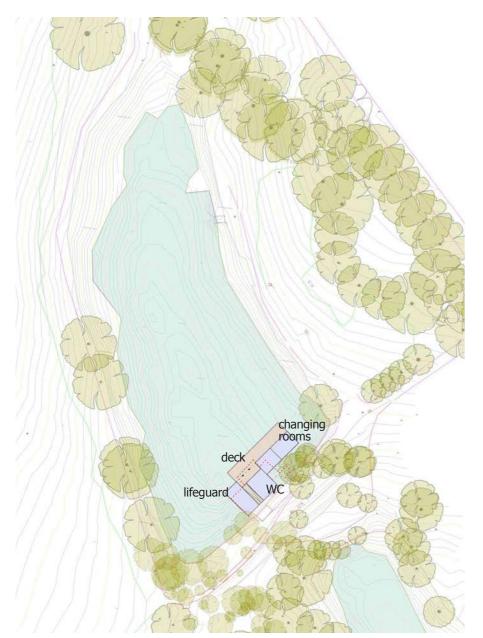


Figure 3.12 Option 3

Option 4

Advantages

- Building along edge of restored crest would not disrupt swimming loop
- Swimmers have views of the entire pond
- No building on restored crest, allowing engineer to survey dam
- Retain existing trees to northeast edge of raised crest
- Lifeguards have sight line and view out to the full extent of the pond

Disadvantages

- Platform deck is high over the water level to clear the spillway area
- Swimmers would enter water where water is shallow
- Changing room areas could lack natural light and ventilation

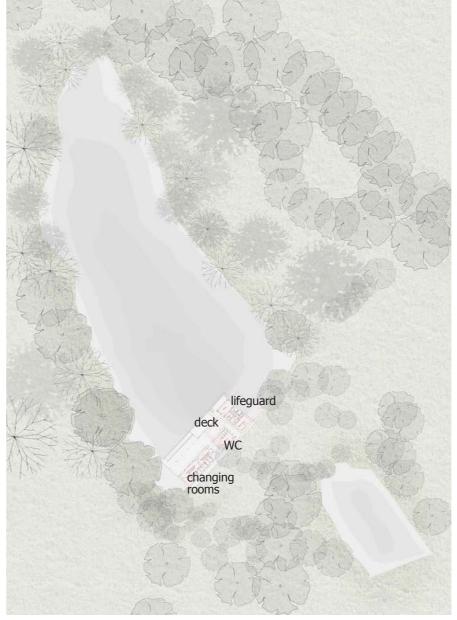


Figure 3.13 Option 4

Options appraisal

Option 5

Advantages

- Existing concrete deck and pile foundations could be retained and reused
- Swimmers have views of the entire pond
- No building over spillway with simpler structure foundation solution
- Retain existing trees to northeast edge of raised crest
 Lifeguards have sight line and view out to the full extent of the pond

Disadvantages

- Building projects too far into swimming loop
 Deck area could be overshadowed and in the shade next to lifeguard facility

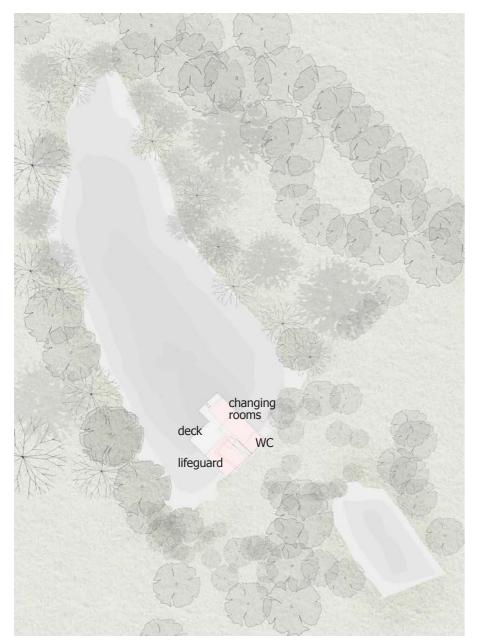


Figure 3.14 Option 5

4. Design principles and concepts

Layout plan

The proposed development has resulted from a carefully considered options appraisals for the site. The proposed new buildings will be set on the existing concrete deck and will reuse the existing concrete pile foundations.

The new buildings are arranged in two blocks: the lifeguard's facilities, and the changing room and toilets for swimmers. Our brief was to re-provide the accommodation that exists on site at present and to remove the temporary containers that currently provide some of the required accommodation. The lifeguard's facility includes an observation area for two lifeguards on duty, designated WC and shower for lifeguards, and a welfare area with kitchenette, lockers and a small office. A first aid room is located within the lifeguard's facilities, and is accessible from the deck area.

The changing provision includes external communal changing with four enclosed cubicles, an internal communal changing and shower area with accessible shower, an external shower area, toilets, an accessible toilet and a small plant room.

The existing deck has three ladders to allow swimmers to access the water, and a hoist to assist disabled swimmers in and out of the pond. The hoist is also for use in emergencies for rescue. There is a lower area of deck that is used as an emergency casualty platform by the lifeguards.

The new buildings are modest and simple, providing basic facilities for swimmers to enjoy the pond, and for the lifeguards safeguarding the swimmers.

Proposed use

The new buildings at the Kenwood Ladies' Bathing Pond will continue to be used as a changing room for the swimmers and for the lifeguard's facilities. The increase in gross internal floor area, from 97m2 in the existing to 121m2 in the proposed, is to accommodate an accessible toilet and shower as set out in the Equality Act.

The area of the existing deck, occupied by the new buildings, will match the existing area of usable deck to avoid overcrowding on busy days, for access in and out of the pond for swimmers, and for emergency purposes. It is also crucial that the deck remain on one level so that the lifeguards can supervise and safeguard the swimmers.

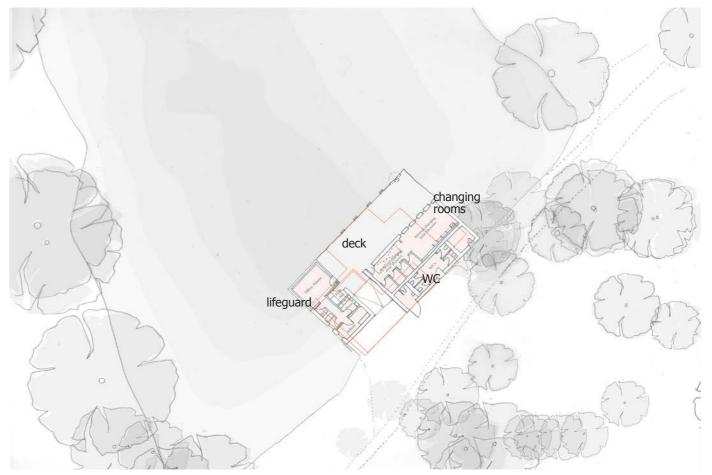


Figure 4.1 Sketch of proposed scheme



Figure 4.2 Proposed ground floor layout plan

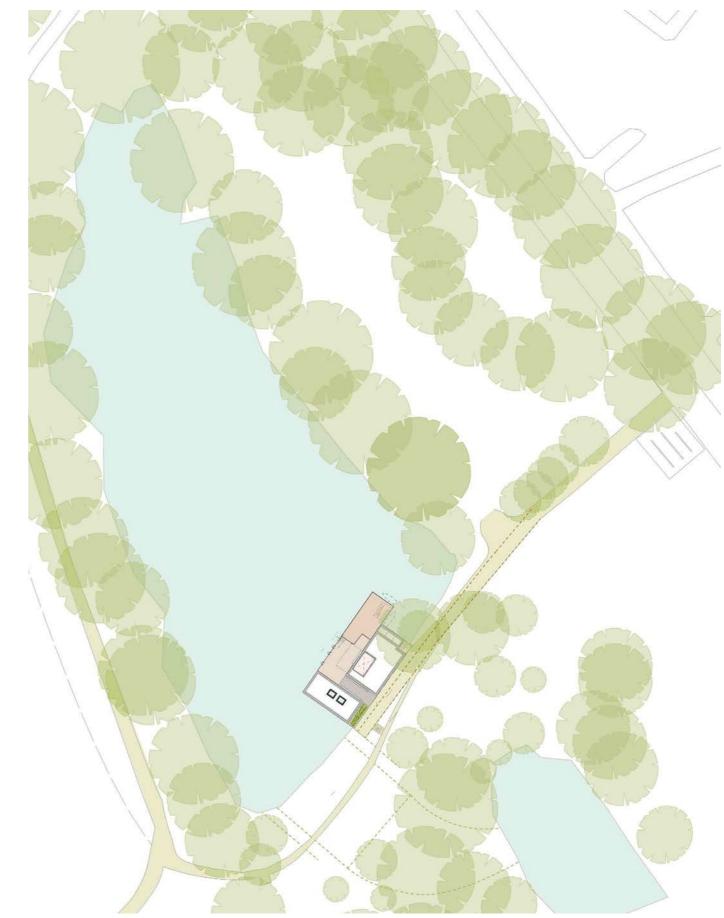


Figure 4.3 Proposed site plan

4. Design principles and concepts

Scale and massing

The current building has a butterfly roof profile with a maximum height of 3.7m. The roof is very visible from the northeast access path from Millfield Lane and the existing dark green plaster and stained dark brown timber roof profiles emphasise the height and bulk of the existing.

The proposed buildings are only 3.2m in height with flat roofs to reduce the bulk of the buildings and their impact on the surrounding landscape. The proposed buildings use a vertical motif in the timber cladding and window shape to emphasise and reflect the verticality of the surrounding mature trees. The new buildings blend into the landscape, reducing their visual impact on the pond.



Figure 4.3 Woodland area of the Heath



Figure 4.4 Path along one of the many ponds



Figure 4.5 Public toilet facility clad in dark timber

4. Design principles and concepts

Appearance, materials and architectural treatment

The materials and detailing of the proposed buildings are modern and crisp yet sympathetic to the local character of the Heath. The materials have been carefully chosen to reflect the trunks of the surrounding trees. The architectural detailing and language of the proposed buildings suggests 21st century language for new pavilions on the Heath. This new pavilion typology could be used at other bathing ponds and locations across the Heath.

The proposed new buildings respect the natural character of the Heath, its diverse mosaic of habitats, the secluded setting of the pond, and the cultural and social heritage of the site. The architectural materials and treatment of the proposed buildings include:

- 1. Reuse and adaptation of the existing concrete deck and pile foundations to support new buildings rather than demolishing the existing concrete deck, reflecting our commitment to sustainability.
- 2. Dark (black) stained timber cladding. In this process the weathering of natural timber is enhanced to protect it from cracking and splitting over time. The translucent stain allows the wood grain to be visible, yet protects it from rapid weathering. Staining provides an easy maintenance solution, and allows the timber to expand and contract without showing visible signs of deterioration over time.
- 3. Window and door frames will be timber, dark in colour to match the stained timber cladding. Generous areas of glazing are required to provide unobstructed views of the pond for the lifeguards. Windows in the changing room area provide glimpses of the surrounding landscape as well as natural light and ventilation.
- 4. The building fabric will be designed to meet current Building Regulations, and will reduce the heating demand and primary energy consumption. The thermal envelope will have a good level of insulation with minimal thermal bridges, high performance windows with insulated frames and good airtightness.



Figure 4.6 Vertical timber cladding with natural weathering finish

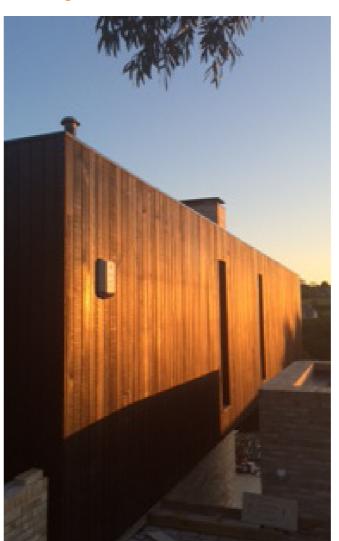


Figure 4.8 Vertical timber cladding, stained in black



Figure 4.7 Vertical timber cladding, stained in dark colour

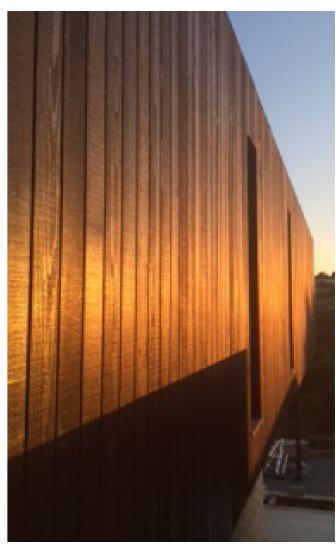


Figure 4.9 Detail of the wood grain visible beneath the black-stained timber



Key plan

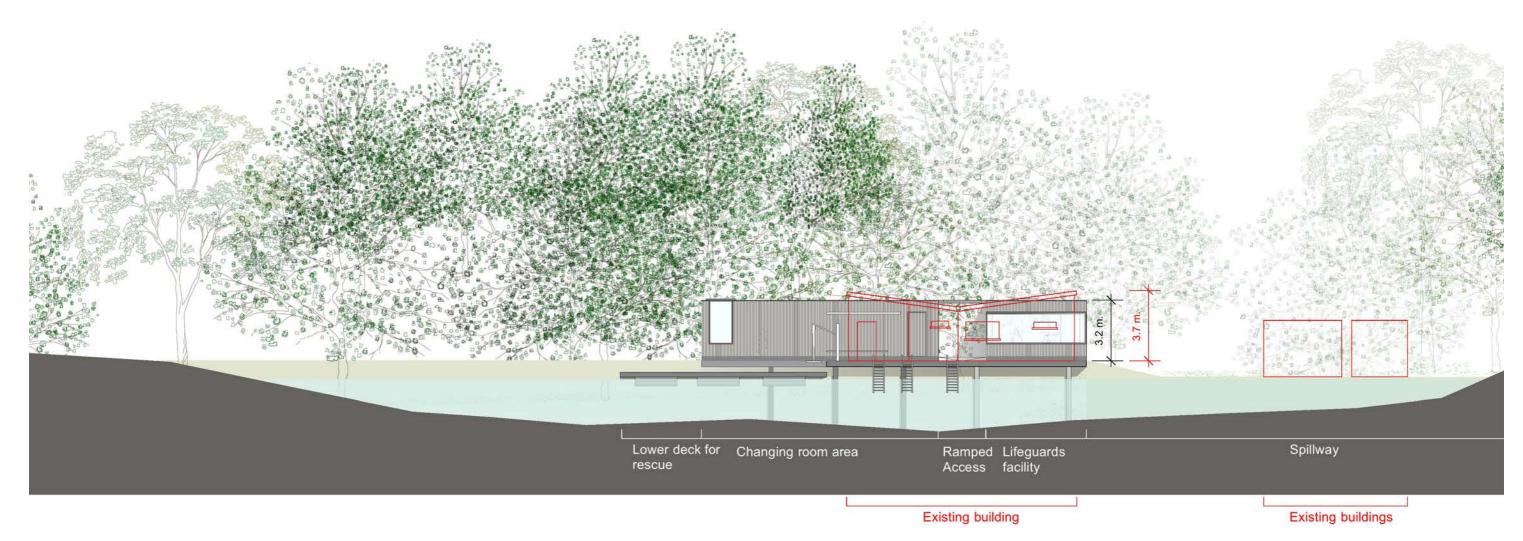


Figure 4.10 North elevation



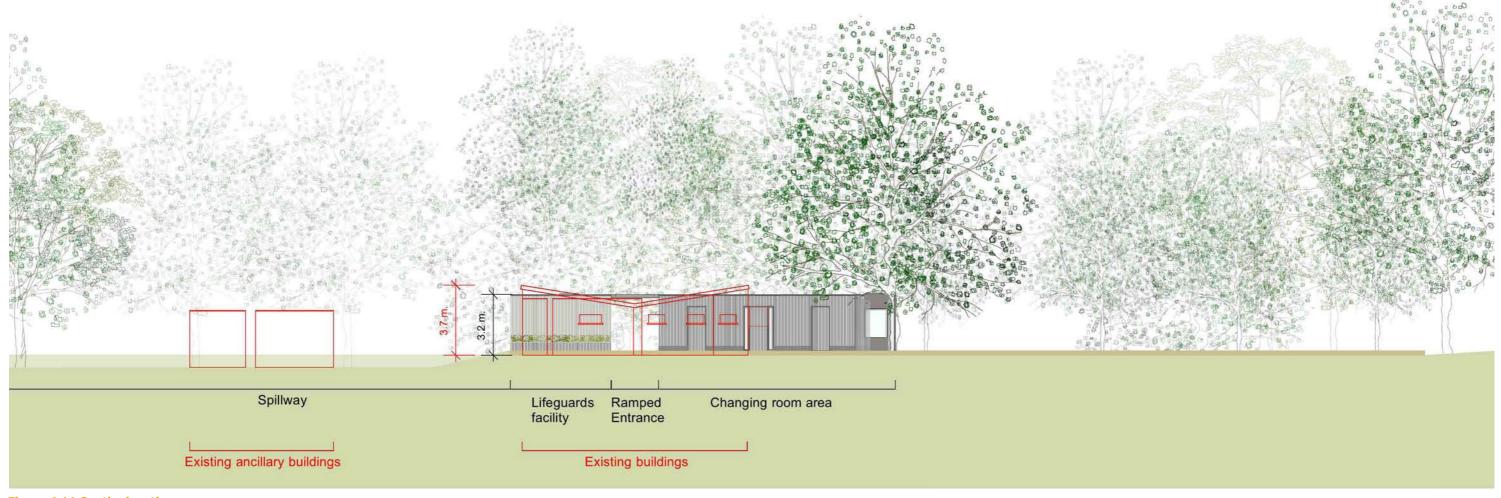
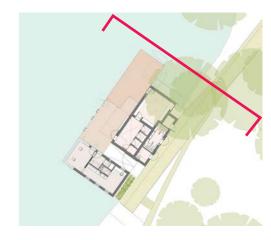


Figure 4.11 South elevation



Key plan



Figure 4.12 East elevation





Figure 4.13 West elevation

Existing buildings



Key plan

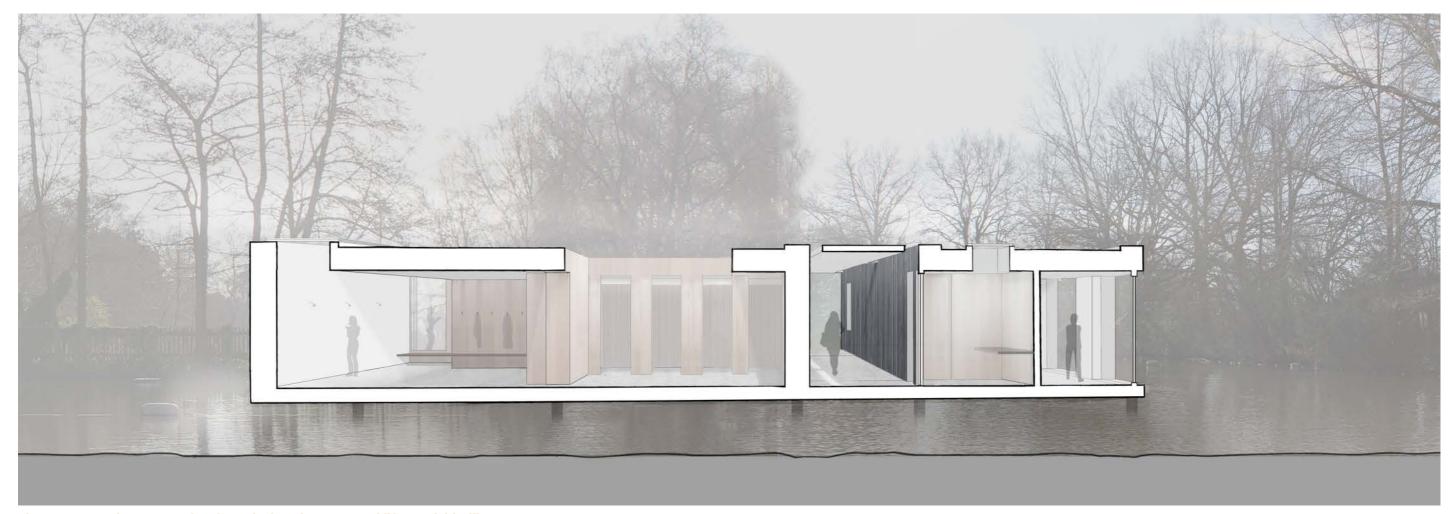
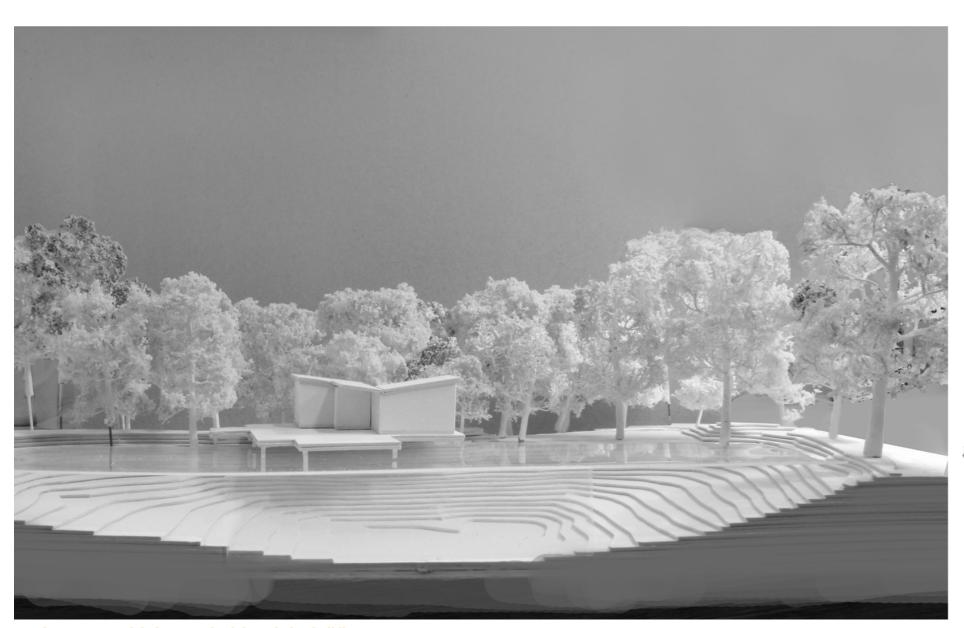


Figure 4.14 Section perspective through changing room and lifeguards' facility



Figure 4.15 Internal view of the changing room, illustrative purposes only



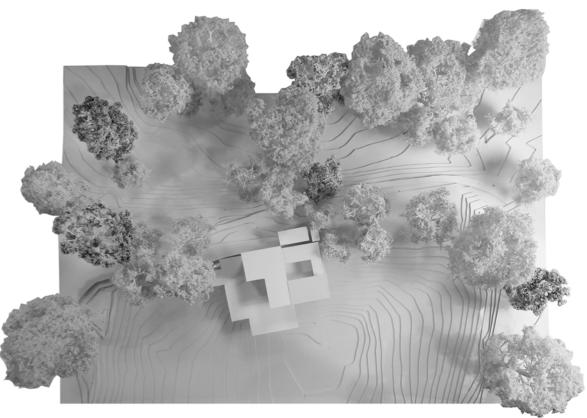


Figure 4.16 Model photograph of the existing buildings



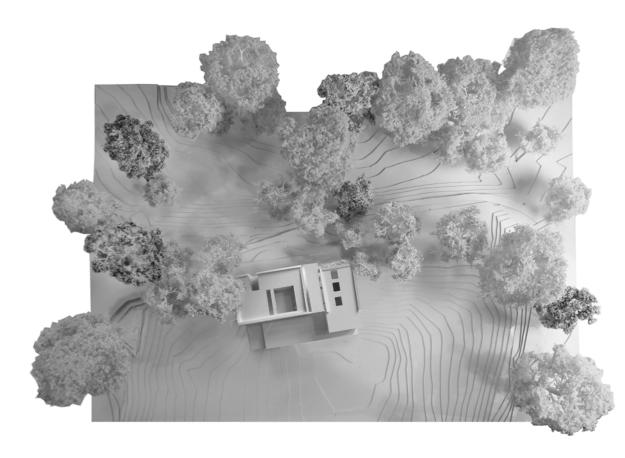


Figure 4.17 Model photograph of the proposed buildings

5. Access to the building

Pedestrian access

The main pedestrian access to the buildings will continue to be from Millfield Lane to the northeast. It is central to the brief that the new buildings provide universal access for all swimmers. All buildings are single-storey so no stairs or lifts are required. Access from the path to the deck is via a ramp at 1:28 ratio from the access path to the deck. The buildings are designed in accordance with EA requirements.

Vehicular access

Vehicular access to the buildings would be for emergency and maintenance vehicles only. Please refer to Atkins' Sustainability Statement and Environment Statement for details on the material and level of the access path.

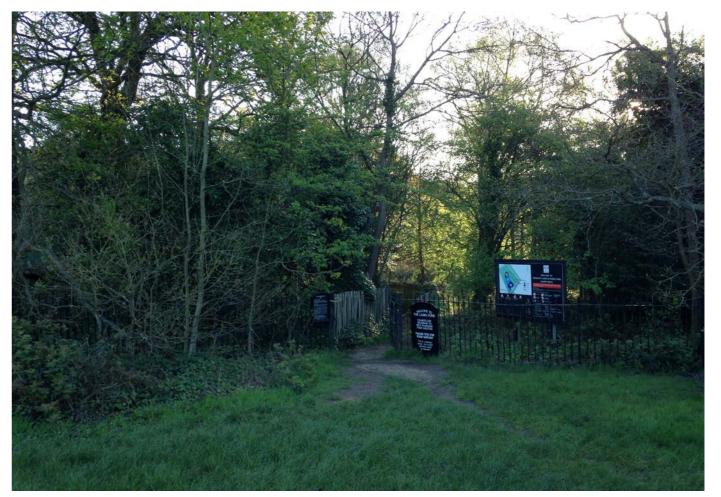


Figure 4.18 Access from Heath side



Figure 4.19 Main access from Millfield Lane

6. Stakeholders consultation

06 March 2012

Walters & Cohen Architects presented initial ideas on new building to members of Kenwood Ladies' Pond Association [KLPA], an organisation of women swimmers who promote the interests of the users of the pond, represent their views to the authority responsible for Hamptead Heath and cooperate with staff in the proper running and maintenance of the Pond.

05 November 2013

Walters & Cohen Architects and the City of London met with members of KLPA and lifeguards to discuss the brief of the building.

07 February 2014

Walters & Cohen Architects, the City of London and Atkins met with Chair of KLPA and lifeguards at the pond to discuss the design options and receive feedback.

27 February 2014

Walters & Cohen Architects presented options design to the members of KLPA at the Staff Yard at Parliament Hill. This event was publicised on the KLPA's website.

24 April 2014

Walters & Cohen Architects, the City of London and Atkins met with Chair of KLPA to discuss design options build over proposed spillway.

22 May 2014

Walters & Cohen Architects, the City of London and Atkins met with Chair of KLPA and lifeguards to discuss updated design options and received feedback.

03 June 2014

Walters & Cohen Architects met lifeguards to discuss updated design options and received feedback.

10 June 2014

Walters & Cohen Architects presented options design to the members of KLPA at the Walters & Cohen Architects' office. This event was publicised on the KLPA's website.

18 June 2014

Walters & Cohen Architects met with swimmer with special needs to review accessibility and access requirements.

o' Pond nd, per running		
iscuss the		
at the pond		
Parliament		
n options		
o discuss		
ck.		
hen		
s		

7. Appendices

Appendix A Drawings of existing buildings

7. Appendices

Appendix B Drawings of proposed buildings

1008-PD1000A Site Plan 1008-PD1010A Ground Floor Plan 1008-PD1011A Roof plan 1008-PD1200A Section AA 1008-PD1201A Section BB 1008-PD1202A Section CC 1008-PD1300A North Elevation 1008-PD1301A South Elevation

1008-PD1302A East Elevation 1008-PD1303A West Elevation

Walters & Cohen Architects
2 Wilkin Street
London NW5 3NL
United Kingdom

T: +44 (0)20 7428 9751 F: +44 (0)20 7428 9752 E: mail:waltersandcohen.com