

**Brighton and Sussex University Hospitals NHS Trust**

**3Ts Hospital Redevelopment: Stage 2  
Design Appraisal of Access for Disabled People of the 1 to 200 Plans**

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**Draft**

## Introduction

The 3Ts Hospital redevelopment - teaching, trauma, tertiary care, is a major capital development taking place in the City of Brighton. Its aim is to modernise the Royal Sussex County Hospital (RSCH) and expand the services provided for seriously ill and injured patients. There are five key elements of the 3Ts which will be completed in two stages. The five elements are as follows:

- Replace the ageing buildings. The main buildings at the front of the RSCH are nearly 200 years old. This will allow modern facilities to be provided which are welcoming, accessible and purpose-built.
- Neurosciences - Hurstwood Park Regional Centre for Neurosciences is being relocated from Haywards Heath to Brighton.
- Sussex Cancer Centre - the Sussex Cancer Centre is being expanded to include the development of a new chemotherapy day unit, and increased radiotherapy services and a doubling of the number of beds on the oncology ward.
- Major Trauma Centre - replacing the ageing buildings and transferring neurosciences to Brighton will allow the establishment of a major trauma centre for Sussex and the South-East.
- Brighton and Sussex Medical School - the 3Ts redevelopment will mean that within the hospital, state of the art teaching, training and research facilities can be provided.

## Design Appraisal

The following document provides a design appraisal of the 1 to 200 plans for **Stage 2** of the redevelopment. The reason for a design appraisal is to identify potential disability access issues, in order to prevent retro-fit solutions having to be applied later on. Such solutions are often inferior and in many cases more expensive. This report will identify generic issues applicable to the whole scheme, for instance good practice for receptions and waiting areas, lifts, staircases and interview rooms. It will then identify, on a level by level basis, specific issues relevant to each department. The decant arrangements will then be examined.

## **Executive Summary**

The overwhelming impression of the 3Ts development is one in which the access needs of disabled people have been carefully considered. This is highlighted by the considerable input into the scheme that has been made by different groups representing disabled people, The Equality Impact Assessment and the Statement of Minimum Standards relating to disability access and facilities. The plans reflect the work that has been undertaken to date, particularly the minimum standards document. The following section highlights particular strengths of the plans:

- The corridor widths.
- The location of automatic opening doors. This will be commented on in greater detail in the floor by floor analysis.
- The location and number of wheelchair accessible toilets.
- The separation of nappy changing facilities from accessible toilets.
- The care that has been taken in designing the main entrances to stage one and stage two.
- The location of the reception desks and waiting areas.
- The grouping of accessible car parking spaces around the lift lobby thereby minimising walking distance to the lifts and stairs.

Considerable thought has been given to the wayfinding strategy, which is a vital element for ensuring accessibility for disabled people, particularly those people with sight or cognitive impairment: consequently wayfinding information will be vitally important to ensure all users can manage their way round the building effectively. Comments where applicable are included in the floor by floor analysis. It is noted in the minimum standards that a minimum door width of 750mm has been specified. However, an effective clear width of less than 800 - 825mm could result in people with large wheelchairs or poor maneuverability damaging themselves or the door frame and so where possible door widths that will maintain this dimension should be specified.

## Generic Issues

This section builds upon the statement of minimum standards that was produced in 2011.

### Reception Desks

Accessibility at reception desks are vitally important as they are often the first point of contact that a patient, relative, carer or visitor will have with the hospital. Reception desks should have the following characteristics to make them suitable for use by all disabled people:

- Clear visibility from the entrance to the building or the entrance to a department. Where this cannot be achieved, good signage visible from the entrance showing the route to the reception desk should be implemented
- Clear manoeuvring space in front of the reception desk or counter.
- Reception desks should be set to a height suitable for seated and standing users with high and low sections.
- Access for wheelchair users should be provided for both staff and visitor sides of the counter.
- A well signed induction loop should be provided.
- If possible positioning reception desks in front of windows where there is bright sunshine should be avoided. Bright sunlight will cause the receptionist's face to be silhouetted, making lipreading difficult.
- The lighting should be good on both sides of the counter with a minimum of 100 lux.
- Provision of seats near lowered counters would be helpful.

### Waiting Areas

It is important that waiting areas are designed in a way that disabled people can feel at ease. The following issues can help in this respect:

- Acoustics can be important in order to provide noise reduction. This would include providing adequate sound insulation to minimise intrusive noise and avoiding too many hard surfaces.
- Providing a range of seating at different heights between 420 and 580 mm. Consideration could also be given to providing "perch" seats at 650 to 800 mm.
- A mixture of fixed and loose seating provides flexibility of use and space.
- A mixture of seating with and without armrests should be provided.

- Space for a wheelchair user to pull up alongside the seated companion, should be provided.
- One space within or at the end of a block of seating, could be provided for an assistance dog to rest.
- Seating should contrast visually with the surrounding surfaces.

## WCs

The provision of wheelchair accessible WCs is generally excellent throughout the building. In addition to the comment in the statement of minimum standards that wheelchair accessible WCs will be in accordance with BS-8300 the following observations should be noted:

Alarm systems for accessible WCs should have an audio as well as visual alarm and be locally as well as centrally monitored. Staff should be trained in what to do when the alarm is activated. Care should be taken to ensure that the alarm pull cord is not kept tied up so that it is not accessible to someone should they need to activate it from the floor. Cubicle doors should not be fitted with an automatic door closure, instead they should be provided with a horizontal grab rail to assist closing. Although specified in recommended guidance a colostomy shelf is sometimes omitted. Care should be taken to ensure that this is not the case. Similarly two coat hooks at two different levels are important and should not be omitted. Doors to Ambulant accessible WCs should be able to open outwards. This is to allow greater space within the cubicle and to make it easier to open the door if somebody falls against it.

## Changing Rooms

Self-contained unisex changing facilities with space for a companion or assistant of either sex, should be provided, with communal separate-sex changing facilities as an additional provision. Wheelchair users need sufficient space for dressing and undressing while seated or lying down. The following provisions should be provided within the changing facility:

- Vertical grab rails
- Two clothes hooks, one at 1 050 mm and the other at 1 400 mm above the floor
- A towel rail
- A tip-up seat
- A back rest
- Drop-down support rails on the side and far walls
- A horizontal grab rail
- An alarm pull cord

- A mirror
- A wheelchair turning space (1 500 × 1 500) mm
- A horizontal pull rail to help close the door from a wheelchair

### Interview Rooms

Interview rooms should be wheelchair accessible with suitable turning space provided in front of any desks. For patients, relatives or carers with hearing impairments, consideration should be given to either fitting these rooms with individual hearing loop systems or having portable hearing loop systems which can be transferred to the appropriate room. Some systems may allow sound to be picked up by hearing aid users in adjacent rooms; this is known as overlap. Advice should be sought from manufacturers to prevent this. Good levels of lighting should be maintained to aid lip reading for hearing impaired and partially sighted people.

### Lifts

In addition to the points made in section 2.13 of the minimum standards for disability access and facilities it is important that clear signs are provided on the wall opposite the lift entrance or exit to indicate which level the lift is at and what services are on that floor. All lifts throughout the building are in excess of the minimum size required to allow a wheelchair to turn within the compartment.

### Vertical communications

The minimum standards document requires all steps and stairs to comply with BS 8300. Commonly observed issues with new steps and stairs are as follows:

- When viewed from the top stair, colour contrast between nosings can often look indistinguishable creating the impression of a smooth steeply sloping surface. Care should be taken to prevent this from happening.
- At each landing, for each floor level, a clear sign showing the level, and services on the floor should be provided.
- Flights should not contain more than 12 risers between landings.
- The ends of handrails should extend for a minimum of 300 mm beyond the end of the stairs into the level landing. The ends of the handrails should be designed in a way that prevents clothing being caught.

The following table highlights access issues for each floor of Stage 2 of the 3Ts project:

Area	Level	Stage	Current Situation	It is recommended that:
Room Relationship-Radiotherapy – Medical Physics	01	2	<p>The entrance to the building is via a semi circular façade leading to a lobby. A sliding door leads from the lobby to the concourse.</p> <p>There are two fire escapes leading from the southern façade to the left of the main entrance.</p>	<p>There is level access from the walkways to the entrance of the building and that all doorway thresholds and junctions between surfaces are provided to be flush with the interior floor level.</p> <p>Floor surfaces and any matting provided at the entrance do not impede wheelchairs.</p> <p>Where there are full height glass doors and screens they are provided with glass manifestation markings.</p> <p>Any signage at the entrance to the building should be logical and clear and should indicate clearly the location of the reception desk immediately on entering the building.</p> <p>Good transitional lighting levels between the interior and exterior of the building are maintained at all times of the day and in all weather conditions.</p> <p>The two fire escapes are provided with level thresholds to facilitate emergence egress for wheelchair users.</p>

			<p>There are two reception areas adjacent to the lift and stairwell lobbies.</p> <p>There are three waiting areas in the reception area.</p>	<p>The reception desks are provided with a high section and a lower section suitable for wheelchair users.</p> <p>The reception desks are provided with hearing induction loops.</p> <p>That lighting levels at the reception desks are provided at adequate levels to facilitate lip reading for partially sighted people.</p> <p>A range of seating in a range of heights is provided. Some with arms and some without arms.</p> <p>A seating plan is provided spaces for wheelchair users to sit alongside their companions and that spaces for guide dogs are specified.</p>
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Area	Level	Stage	Current Situation	It is recommended that:
Oncology and Palliative Care	03	2	Interview room and seminar/meeting room	<p>A portable hearing induction loop is made available for use within the interview room.</p> <p>Sockets and switches are located at heights that are accessible for wheelchair users.</p> <p>The use of bold patterns on any floor coverings used is avoided as these can be confused for a change in level by some partially sighted people.</p> <p>Where seating is provided some seats with arm rest and some without arm rests are provided.</p> <p>Where tables are provided, a minimum clearance of 700mm to their underside is maintained to allow access for wheelchair users.</p>



			Lift lobby and stairs	<p>A seat is provided in the lift lobby.</p> <p>The stairs are provided with good contrast nosings.</p>
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			<p>Kitchens 1 &amp; 2</p> <p>Sitting/Dining rooms</p> <p>Access to the terrace</p>	<p>Space under the sink is provided for wheelchair users.</p> <p>A range of seating, at different heights is provided in the sitting/dining areas. Some with arms and some without arms.</p> <p>A level threshold with a change in level of no more than 15mm is provided from the dining room door leading to the terrace.</p>
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