Universal Design, Urban Design and building Inclusive communities


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Executive Summary

This report came out of a concern for the role that Universal Design has within the context of designing new urban areas. Since Universal Design is considered a user-centred process the question arises: how can users needs best be represented at an urban scale? And furthermore, how can the interests of new, developing or fractured communities be safeguarded and what mechanisms can be put in place to best address the interests of communities that will evolve in the years ahead?

This report attempts to address these questions in its overall aim; to identify the formal mechanisms that can best ensure that inclusive communities emerge on urban sites (brown field or green field), through a Universal Design Approach

In order to pursue this aim, the research behind the report set out a series of five objectives i.e. to:

• summarise the key definitions and arguments for Universal Design
• examine local Case Studies for evidence of a Universal Design approach
• examine International Case Studies that explicitly seek Universal Design outcomes at an Urban Design and/or masterplan level.
• identify issues that hinder or support the pursuits of an Universal design approach at Urban level.
• reflect on how working at urban design scale may impact on current concepts of Universal Design

Three local Case Studies of urban development in and around Dublin were selected for study. Each at different stages of progress (i.e. pre-development, early building phase, nearing completion). Each are located in different settings (i.e. inner-city; suburban, beyond current city limits). And each had various types / sizes of existing populations, (a surrounding population and small on-site existing population, a large existing population, and no population).

Investigation of the case studies was carried out initially through an introductory interview with representatives of those organisations leading the development, followed by a more extensive examination of the strategic documents that drive, inform and frame those developments.

Following this, international case studies (USA, Norway and UK) who have portrayed themselves from the outset as applying Universal Design principles were selected. These case studies were examined exclusively through their documentation and published mechanisms of development.

It is acknowledged that simple descriptions of intent are not sufficient to ensure a Universal Design Approach. Instead this report seeks to identify how strategic commitment to Universal Design can lead to its integration within the development process through implementation and evaluation mechanisms at multiple levels and various points within the process.

However the majority of the case studies examined in the report are either still in planning stages or within construction phases and could only be examined through
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their documentation. As such, this report aims only to examine the extent to which the case studies strategic intention and mechanisms provide a means to deliver a Universal Designed Environment.

The report highlights a number of recommendations and strategies that can be used to increase uptake and effectiveness of Universal Design in Urban Design contexts: they include:

- Increasing the skill-base for consultation / participation processes amongst those organisations involved in managing the development process. The scale of urban design naturally demands significantly more time and resources to ensure an inclusive and transparent process. (p29)

- Building off and interconnecting with the work of movements and concepts that are driven from within Urban Design and Planning Professions. For example New Urbanism and Slow and Sustainable Urbanisms already share much common ground with Universal Design. (p30)

- Building a strategic approach that embeds and supports a Universal Design approach from the organisation own internal structure, through project business plan, planning and detailed design; and construction phases, by designing mechanisms to review and evaluate both processes and products. (p44)

- Using post occupancy evaluation. On individual building developments, carrying out post occupancy evaluation can sometimes feel like bolting the stable door after the horse has gone, however in a phased urban development post occupancy evaluation can positively and usefully inform future phases. (p46)

- Supporting communities and user groups to best utilize and take ownership of their environments is a necessary component of a Universal Design approach. (p47)

Finally, this report also reveals how placing Universal Design in an urban design context causes some of its underlying concepts to develop. Not least how Universal Design can evolve through Access and Disability; Equality and Inclusion agendas to become a key factor in Design Quality, (p39 and p47) and hence an essential contributor to the health, well-being and economic success of our cities.
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Report Context: Urban Areas

The context of this report is the rapid growth of new urban areas in and around Dublin\(^1\). The Centre for Excellence in Universal Design wishes to see Universal Design principles embedded into the procurement, design, construction, maintenance and management of such environments, ensuring that these new urban areas are developed as inclusive communities or ‘communities for all’.

Universal Design is a user-centred approach. As an area of knowledge it continues to grow and develop, mirroring societal shifts and increased understanding of the nature and needs of specific groups in society.

Much of the knowledge base of Universal Design is gained through user-focused research but also through site-specific consultation, participation, user reviews and post occupancy evaluation. So, when it comes to designing entirely new urban areas where no community currently exists, there is an obvious dilemma. The issue then becomes who represents the, as yet, non-existent communities and what safeguards and mechanisms can be put in place to best address the interests of communities that will evolve in the years ahead.

This report does not address the detailed universal design of buildings nor environments per se. Much information and guidance already exists on those areas, not least, in the publications and guidelines of The Centre for Excellence in Universal Design, the National Disability Authority and other similar organisations across the globe. Instead this report concerns itself with the formal processes and mechanisms that lead to and ensure the adoption and implementation of Universal Design in the procurement of new urban environments and the regeneration of existing areas.

The question that lies therefore at the heart of this report is:

**What formal mechanisms can best ensure that inclusive communities emerge on Urban Sites (Greenfield or Brownfield), through a Universal Design Approach?**

The report also however uses the discussion of urban design as a way to reflect on any adjustments required to our current concepts of Universal Design.

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\(^1\) Developments such as Adamstown, Clonburs, Fingal, Dublin’s Northern Quarter Development (Arnotts), Grangegorman.
Report Structure

The report is divided into four Sections. **Section A** begins an introduction to Universal Design and moves on to an examination of its premises and scope. It concludes with some of the arguments for Universal Design, concentrating on sustainable and economic arguments. **Section B** is the local case study section beginning with a short introduction and then an examination of the three case studies: Adamstown, Grangegorman and Ballymun.

Adamstown is a new urban district on a 193 acre greenfield site adjoining the main Dublin-Kildare railway line, 16km west of Dublin City Centre. It will be the first new town in Ireland since 1980’s and once completed will have a population of approx 25,000. About 30% of the intended residential units and several large infrastructural projects have been completed, including railway station, two primary schools and one crèche.\(^2\)

Grangegorman is a 73 acre, north inner city Dublin site, approximately 1km from the city centre. The site has served Dublin’s health and social needs since the 18\(^{th}\) Century, as a location for a poor house, asylum, fever hospital and more recently as St. Brendan’s Psychiatric Hospital. In its next new phase of development it will become a city-centre campus for the Dublin Institute of Technology (Ireland’s largest third level education institution), provide community health facilities on behalf of the Health Services Executive and a small amount of private residential development. Only a very few existing occupants (HSE Staff & patients) remain on the site. Grangegorman Development agency hope to have approval for the strategic Plan in 2009 and first phase of a two phased construction is planned for 2011-2014.

Ballymun is an existing residential area, 6km north of Dublin City Centre. BRL- Ballymun Regeneration Ltd, established 1997 by Dublin City Council, is leading a large redevelopment of the area to accommodate the existing community and a similarly sized new community with a final total population of 30,000. Ballymun has already undergone eleven years of regeneration with a target date of 2010 for completion. Currently, the process is approximately three quarters complete.

None of the developments considered in the local case studies section have made an explicit strategic commitment to Universal Design in their organisational documentation. It is important however to state that many of those involved in driving forward the work discussed in the case studies have an implicit social commitment to providing for the needs of all people and that

\(^2\) Figures accessed on webpage (Feb 09) ‘Progress on site update January 2009’
http://www.adamstown.ie
indeed some of the organisations, within the period of this report, have begun a process of engaging with a Universal Design Approach.

Section B concludes with some reflections on the three case studies.

Section C examines, again through available documentation, a range of existing international Universal Urban Design Case Studies, located across Norway, USA and UK. These case studies were selected on the basis of their explicit intent to address Universal Design at a strategic and urban level. This section closes with some reflections.

Section D concludes the report with reflections on how implementing a Universal Design approach at Urban Scale impacts on the evolution of Universal Design itself.
Methodology

The investigation of the first series of Dublin-based case studies was carried out through introductory interviews with representatives of those bodies (South Dublin County Council Planning Department, Grangegorman Development Agency, Ballymun Regeneration Ltd) principally tasked with driving forward their respective developments.

The developments were discussed in relation to Universal Design and thereafter investigation of both the Irish and non-Irish case studies was carried out through analysis of the developments’ documentation (ie strategic documents, guidelines, reports and websites etc).

Not only was the strategic intent of organisations considered i.e. aims and ambitions, but also their stated mechanisms to implement and evaluate a Universal Design approach.

The majority of the case studies represented in the report are still in physical construction phases and, as such, can only be considered on the evidence of their documentation. Therefore this report aims only to examine the extent to which the case studies strategic intention and mechanisms provide a means to deliver a Universal Designed Environment that best supports the development of Inclusive Communities.

A future study will be required to comprehensively evaluate whether the case studies discussed did indeed manage to deliver Universal Design at an Urban and Detailed Design level.
Section A: Introduction

When designing a new environment, a development team will typically refer to existing technical guidance and legislation; consult with the client team and where possible the users on their requirements. If possible they will also view and evaluate any existing environments to determine how they have met the client/user requirements, what models of best practice can be built on, or what needs to be altered, improved, extended etc.

However when aiming to design an inclusive, medium to large scale urban development for a green or brownfield site this process can be caught up by the sheer scale of the endeavour; the lack of technical guidance on developing a Universal Design approach to urban design; and the coordination of input that any existing communities or incoming communities can have on the development process.

Perhaps a greater challenge however is that such new development areas are driven, designed and marketed on the hopes of being able to solve social problems, inject economic sustainability and offer new lifestyles; modes of working or learning that will enhance quality of life.

"Welcome to Adamstown. Welcome to the ultimate in town planning. Welcome to the future of modern living in Dublin. Welcome home. Adamstown represents a new era of planning. Specifically designed to be more than just a suburb, it will be a self-contained town, complete with all the amenities you need to live life as it should be."³

Whilst the nature of the above quote may be due to marketing hype, it is also representative of a necessary positivism required to drive such large scale developments forward. In such a context Universal Design must therefore go beyond offering pragmatic critiques focused only on detail and offer mechanisms to embed universal design at strategic level whilst demonstrating its role in adding value to the overall development.

³ Castlethorn Development website on Adamstown http://www.adamstown.info/ accessed on 1st Mar 09
Universal Design?
Although Universal Design has been around as a concept since the mid 1990’s and has a foothold across the globe, many Built Environment Professionals have had only limited contact to it and consequently a few misconceptions and apprehensions have arisen. This section will therefore clarify the terminology of ‘universal design’ and highlight the benefits it brings.

Under the Disability Act 2005, ‘universal design’ “(a) means the design and composition of an environment so that it may be accessed, understood and used- to the greatest practicable extent, in the most independent and natural manner possible, in the widest possible range of situations, and without the need for adaptation, modification, assistive devices or specialised solutions, by persons of any age or size or having any particular physical, sensory, mental health or intellectual ability or disability, And (b) means, in relation to electronic systems, any electronics-based process of creating products, services or systems so that they may be used by any person.

The concept of Universal Design emerged from the areas of ‘barrier-free’, ‘accessible design’, ‘assistive technology’ etc but it also has at its heart an understanding that the learning and experience gained from considering the needs of those most disadvantaged by the built environment – ie people with disabilities, can be applied to contexts that benefit all people. In other words Universal Design does strive to be a ‘broad-spectrum solution that helps everyone, not just people with disabilities.”

Within the wider context of urban design there is still more argument for the definition of Universal Design as outlined in the Disability Act to develop further. To date Universal Design has tended to focus on the single body in space, for example: the wheelchair user in relation to threshold detail; the visually impaired person’s approach to the staircase; or the older persons’ way-finding experience within a complex building plan. But if the goal is to extend beyond accessible environments to the creation of inclusive communities then we also need to understand not only the individual body in space but their interactions and spatial relationships with other people.

It is clearly impossible to consider the disabled person (or anyone) without those they care for and those who care for them; without encounters with neighbours, strangers or work colleagues. This may seem a natural part of life but within the arena of disabled peoples’ lives in Ireland, the concept of ‘visitabilty’ was first embedded in Part M of the Building Regulations as recently as 2000.

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5 Visitabilty- ie the disabled person’s right to have a cup of tea in a neighbours house.
6 Part M is currently undergoing a process of revision
At an Urban Scale there is clearly a need to understand more than one set of
users in isolation and also as part of a diverse, inclusive, accessible and
mixed society. This requires those responsible for the built environment to
understand people’s individual and critical needs but within a landscape of
negotiation and compromise.

Furthermore, Universal Design struggles when it is limited to representing
only the needs of persons of any age or size or having any particular physical,
sensory, mental health or intellectual ability or disability. Such a definition
does little to address the fact that people are not only a composite of their
physical, psychological, physiological, sensory and cognitive profiles but also
their gender, race, ethnicity, educational and economic profiles. Trying to
distil or separate out these multiple identities into distinct parts would
therefore appear to be fruitless.

In summary, the complexity of the urban realm and the multiple identities of
those who occupy it, sets up a challenge for Universal Design to continue to
develop its definition, whilst at the same time, not losing sight of those in
society with the most critical needs.

However much we work at developing an all-encompassing definition of
Universal Design, it is poignant to remind ourselves that most people,
including built environment professions, still do not necessarily see anything
untoward with current approaches to procuring, planning, designing, building
and managing the built environment. In such contexts, it helps therefore to
invert the definition of Universal Design and expose the underlying premise,
which is that:

The built environment excludes and disadvantages certain groups in
society at certain times.

This premise means that Universal Design begins not only from an
aspirational standpoint (i.e. designing for all), but also a critical one. In order
to find new ways to create and maintain environments that cater for the needs
and desires of all people, we must also understand what has prevented us
from doing so in the past and presently. This critical position ensures that we
are better able to address any obstacles or shortcomings that exist in our
processes and skills; obstacles that may potentially prevent even the most
willing and knowledgeable professionals from creating and maintaining
inclusive environments.

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See example of MOSAIC (Mayo) who ‘specifically seeks to mainstream services to marginalised
groups including disability, socially excluded and economically disadvantaged and other minority groups
by bringing together all sectors of society rather than further polarising the provision of services and
activity into discrete and isolated venues and environments’
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Universal Design therefore relies on a holistic, sustainable and evolving understanding of the responsibilities of those who shape the built environment to those who populate it.

The Arguments for Universal Design
Fundamentally, society creates spaces to accommodate people and their activities. There is however a tendency to lose sight of that and focus instead on the activities or the product of those activities rather than the spatial interaction of people. Focusing on the activities rather than the people allows those responsible for creating and managing those spaces to progress through simplified, generic demographic models and representations of ‘the user’. However such models become quickly dated and out of sync with societal changes and expectations.

This is illustrated in a recent publication based on research carried out across a number of UK cities which found that the ‘public spaces’ that people are most drawn to are car boot sales, supermarket cafes, allotments and arts centres. The research went on to argue that ‘public space’ is ‘no longer about predetermined physical spaces but rather an experience created by an interaction between people and space’. The research outcomes fundamentally challenge built environment professions. Not only do the ‘preferred’ spaces fall outside the traditional categories of ‘public space’ – (Car boot sales!), but the professions would regard such spaces as second rate and lacking in design quality. It would seem then that although we can procure, design and build space; it is people’s engagement with it that turns space into place. This raises a serious economic question of why invest in making spaces that people won’t fully use or benefit from?

In addition there is a third and crucial element that determines the relationship between people and space and that is the quality and extent of their social exchanges within that space. After all, towns and cities evolved as places to share ideas and resources; socialise and trade; so it is the nature of the relationships and the degree of interaction that enhances the bond of people to space and confirms its status as a ‘people’s place.’

This is more than the usual public space where urban encounters are momentary and fleeting. It is not enough to create a public space and claim that it will be filled by diverse people, when the only social glue on offer is coffee consumption. Whilst such spaces may be defined as public spaces they are not civil spaces.

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8 People Make Places: growing the public life of cities. DEMOS commissioned by the Joseph Rowntree Trust, 2005
A Universal Design approach builds processes that lead to shared and inclusive civil space. In a well-functioning, accessible public realm, public spaces allow us to build ties to each other and also to our institutions. In such places, society’s interrelationships are tested and consummated; we learn to negotiate, confront, and address our intolerances, impatience, and honest passions. In such ‘real’ space we see the humanity of the other and begin to include the excluded.

Universal Design and Sustainable Communities

A sustainable environment is one that supports a sustainable society or community. Built environments which are inaccessible or exclude people lead to isolated and poorly interconnected communities. Such communities require more external support and resources. Community sustainability is best achieved through the creation of inclusive environments, which combine flexible, usable and adaptable building forms with long term affordability and access to services. Such environments encourage neighbourhoods to evolve and flourish, by supporting and facilitating change, growth and responsiveness to changing needs of built environment users. Flexible environments, which alter and grow with their communities, are less likely to become redundant or abandoned. These sustainable environments enable and encourage interaction and socialisation with others in the surrounding community, as well as with other communities elsewhere.

Inclusive environments allow people to exercise choice, integrate and participate, regardless of their age, ability, gender, etc. A community rooted within a Universally Designed environment finds it easier to develop both formal and informal, fully accessible, networks. Inevitably, this results in a balanced, healthy, less resource-hungry and thus sustainable community.

Universal Design encourages public bodies, private investors and built environment professionals and a diverse range of ‘critical’ users to become co-producers of inclusive, sustainable urban environments.

The Economic argument

Put simply, where an environment is inclusive, it allows more people to access it, work there, pay taxes and buy consumables and services. Universal design offers benefits that directly affect long-term profitability, consumer relations and corporate reputation. This is well illustrated in Imrie’s (2001) case studies of retail and leisure centres, where “the cost/economic factor included the spending potential of disabled people, but also developers' perception of the need to be inclusive.”

Nussbaum (2001) reinforces this: “…the corporation as an institution and the market place as a whole is neither ‘good’ nor ‘bad’ per se. They are motivated by profit, not morality. Thus the most [effective] way of including all differently
abled people is to persuade corporations to design their products and services so that much larger numbers of people can use them, thereby increasing their profits."

IN the same way a Universal Design Approach to the design of new environments offers opportunities to expand markets, draw in new customers and increase business profitability. However, in spite of this, it is evident that many people still associate Universal Design with extra costs. There is evidence of up-front cost, but equally there are case studies, where inclusive design has cost more in the short term but less in the long term by increasing profitability through decreasing life time management costs. Ultimately, the discussion comes down to whether the long-term value of an environment has priority over its short term cost. This is a value that only government and public bodies can embed into the procurement and development processes.

Furthermore, there are clear disadvantages associated with failing to design inclusively. These can include the cost of bad publicity associated with poor design solutions, the creation of hard to let buildings and poor economic viability, the costs associated with the need to undertake remedial works and even the costs of litigation. In addition, there are costs associated with providing care or support to people who are unable to/can no longer use these environments independently or safely. For example, a UK study into the effect of incorporating Lifetime Homes Standards into new housing (Brewerton and Darton, JRF 1997) showed that any additional capital costs would be outweighed by savings – through the reduced need for temporary residential care and home care support)

Taking a wider view, it is important that built environment professionals have an appreciation of the impacts on society of failing to create a more inclusive environment. Lack of inclusion for many groups, including disabled people, but also embracing such groups as single parent families and members of ethnic minority groups, can lead to increased levels of poverty, ill-health, benefit dependency, poor educational achievement and low levels of production. It is difficult under normal circumstance for any economy to support high levels of dependency but the situation is compounded both by the increasing proportion of elderly and retired people in the population (Coleman 2001) and the recent downturn in the global economy.

Perhaps the question:

*How can we afford an inclusive environment?*

Should instead become:

*How can we not afford to provide for inclusion and participation in the economic life of the nation?*

Or alternatively:
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How can we afford to invest in spaces that people don’t fully use or benefit from?
Section B: Local Case Studies

Introduction
All case studies examined in this section\(^\text{10}\) are examples of either new urban development or ongoing regeneration projects in and around Dublin, Ireland. None of the case studies had any stated strategic commitment to Universal Design. They do however all exist within Irish and EU legislation and regulatory frameworks related to disability and equality and since 2006 the context of the Department of the Environment, Heritage and Local Government’s *Sectoral Plan under the Disability Act 2005* (2006).

The Sectoral Plan, developed in consultation with people with disabilities, assists the Department, the bodies under its aegis and local authorities by providing a more coherent structure to deliver an inclusive society with accessible buildings, facilities, services and information provided to all. It has a set of key objectives; those that are relevant to Universal Design and Urban Design (though the language used is ‘Universal Access’) are:

1. To promote universal access to public spaces, buildings and services owned and operated by local authorities and those owned and operated by the Department and bodies under the aegis of the Department.

2. To promote universal access to new developments and heritage sites.

4. To update standards set out in Part M (Access for People with Disabilities) of the national Building Regulations; and provide for more effective enforcement of these standards.

5. To promote and ensure participation by persons with disabilities in decision-making.

7. To encourage and facilitate access to appropriate housing and accommodation for persons with disabilities.

8. To improve access of persons with disabilities to streets, pavements, footpaths, and street crossings, and access from public roads to passenger transport vehicles, through promoting an accessible barrier free pedestrian environment.

\(^{10}\) Case studies were examined predominantly through their existing documentation and websites supported by separate interviews over a 6 month period.
Although none of the case studies adopt the language of Universal Design, the purpose of considering them is to understand the complex contexts of such developments and to identify any existing approaches or mechanisms that already allow for some focus on user needs - such as design guidelines, consultation, participation, user evaluation etc. Such mechanisms might, in the future, allow for closer realignment between strategic development and Universal Design approaches to designing inclusive urban communities.
Case Study 1: ADAMSTOWN

Adamstown is a new urban district on a greenfield site adjoining the main Dublin-Kildare railway line, 16km west of Dublin City Centre. It will be the first new town in Ireland since 1980’s and once completed will have a population of approx 25,000. About 30% of the intended residential units and several large infrastructural projects had been completed by the time of this study (Jan 09).

South Dublin County Council is the Planning Authority for Adamstown and the designated ‘Development Agency’ for the Adamstown Strategic Development Zone (SDZ). The Council prepared a Planning Scheme or ‘masterplan’ (2003) for the phased development of the lands and is now overseeing the implementation of the Scheme by managing the development of Adamstown in accordance with the masterplan and in line with support strategies developed specifically for Adamstown Development: Cycling and ‘Access for All’ Strategies.

The lands at Adamstown are in private ownership, almost all owned by three commercial development companies: Castlethorn Construction, Maplewood Developments & Tierra Ltd. These three major landowners have formed a development consortium known as Chartridge Ltd. in order to provide the infrastructure necessary to develop the lands.

Development at Adamstown commenced at the end of 2004 and is estimated to be complete in 10 to 15 years. It is planned to build 10,000 dwellings, making it home to between 20,000 and 25,000 people on completion. The first residents took up home in Adamstown Castle Development in October 2006 and in January 2009 it was reported on the website (www.adamstown.ie) that 968 units were occupied. Adamstown breaks the mould of low density, incremental development based around the car as the means of transport. Instead it is conceived around the concept of ‘connectivity’, where people can walk or cycle to local facilities and services and easily access public transport links connecting to Dublin city centre.

Connectivity is understood by Adamstown SDZ as synonymous with quality of life and safety. It is also linked to ‘diversification’, in terms of jobs, houses, shops and choice and there is a move away from the dichotomy of houses versus apartments towards a greater range of accommodation: houses, town houses, duplex, etc to meet all needs.

In accordance with the South Dublin County Council Housing Strategy 2001, 15% of all dwelling units within each development area will be social and/or affordable units. It is hoped that this diversity, mix and choice will...

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11 Despite its title: The Access for All Strategy (June 06) remains focused on Disability and more particularly on Physical Access, covering ‘the provision of adequate pedestrian facilities within Adamstown to provide ease of movement for the disabled or mobility impaired’, and ‘the design and provision of disabled car parking facilities and associated infrastructure within Adamstown’.

12 Adamstown masterplan is based on a circle 500m radius around the station. This equates to 8-15 mins walking time from home to station -ie the idea of 1km cities around major transport nodes.
reduce the chance of social polarisation and provide a democratic platform for civil life.

Such ideas of ‘connectivity’ and ‘diversification’ echo strongly with the principles of Universal and Inclusive Design (see Appendix 1), in terms of ‘flexibility in use’, ‘diversity and difference’, ‘choice’ and ‘convenience’.

The development of Adamstown is guided by Adamstown SDZ Steering Group which is made up of Local Government Members, Staff of South Dublin County Council and Members from other organisations such as Irish Rail, Dublin Bus Dublin Transportation Office, Department of the Environment, Heritage and Local Government, Department of Education and Science, Health Service Executive. A consultative process was in place for people adjoining the site, though the experience was that the surrounding population were almost ‘universally hostile’ to the prospect of the development; concerned that there would be extra demand on services, diminishing resources, rise in house prices etc…

Physically, Adamstown is arranged as a set of urban blocks. Each block has a set list of requirements, for example, every 400 houses has a crèche park etc. But although the layout of the overall masterplan is ‘locked down’, each block can differ as it develops through the design process; creating neighbourhood identity and allowing for each block to be modelled individually in terms of traffic, CO₂ omissions etc.

The link between the new occupiers and the spaces they occupy will be encouraged through a community strategy with two dedicated community officers to enable and encourage the development of community associations. At this early stage though with less than 1000 units occupied there is insufficient critical mass to be able to assess the effectiveness of such a strategy. There are also plans to carry out post occupancy evaluation as the development progresses, but no information other than intent was available at the time of this research. Such evaluation, if implemented, has the potential to create a productive feedback between users’ experiences and designers’ concepts.

The link between design and user experience/understanding was illustrated in one anecdote where architects on considering a block to house four schools felt it might appear too fortified. So, with good reason, they decided to arrange the schools in a row in order for schools to spill out onto a car free home zone (a landscaped street) that fed into the heart of the scheme. However, the schools failed to open their gates and fulfil the realisation of the architects’ concept. Consultation helps users (in this case building managers) to overcome practical problems and allow them to understand and adjust normal management practice in order to support bigger, ‘shared’ ideas. This anecdote is also an illustration that the responsibility for an inclusive Urban Environment lies not only with those who plan and design it but also with
those who construct, maintain and manage it. In the case of Adamstown, the
joined up thinking required by Universal Design may be to some extent
supported by the fact that developers are linked to the management
companies. This means that there can be some relationship between
design/build quality, usage and longevity.
Case Study 2: GRANGEGORMAN

Grangegorman is large, relatively clear (a few existing occupants), north inner city Dublin site, just over 1km from the city centre with surrounding communities and identifiable communities (education and health facilities and some private accommodation) ready to occupy it. Grangegorman Development Agency hope to have approval for the strategic Plan in early 2009 and first phase of a two phased construction is not planned until 2011-2014.

Grangegorman is an historic inner city site, being the location of the Houses of Industry for the poor in the 1770’s and the Richmond Asylum in 1814. Throughout the 19th century the site evolved and grew to become a large regional mental hospital, set in a mature and rich landscape.

A Government Inter-departmental working group was set up to review the future of the site and their report formed the basis for a Government decision in 2002 to establish an Agency to develop the Grangegorman site. The legislation to establish the Agency was enacted in 2005 and The Grangegorman Development Agency was established in 2006 to redevelop the former St. Brendan’s Hospital grounds in Dublin city centre as a new campus for the Dublin Institute of Technology (one of Ireland’s largest third level institutions catering for over 20,000 students) and to provide community health facilities supports for the local aging and disabled communities under the auspices of the Health Services Executive.

In Nov 2007 the USA architects/planners Moore Ruble Yudell, in association with DMOD Architects from Dublin, were named the winners of Grangegorman Master Plan Design Team competition for the re-development of the 73 acre site. GDA (Grangegorman Development Agency) is about to go to statutory public consultation on the Draft Strategic Plan that has emerged from their consultants’ masterplan and their first stage construction process\textsuperscript{13}, currently scheduled for 2011-2014.

The Grangegorman Development Agency is tasked with bringing the surrounding communities into the process. Amongst the seven stated functions of the Agency, which include preparing the strategic plan, deciding upon appropriate procurement strategy, carrying out construction and managing handover phases; two functions of the agency stand out in relation to making environments that suits people’s needs, they are:

- Consult with relevant organisations (Dublin City Council, Residents, Public Reps, CIE, …. )
- Arrange for a communications strategy.

\textsuperscript{13} news – March 2009 from website: www.ggda.ie
In order to feed into the consultation process, residents and tenant/community associations in the Grangegorman Neighbourhood were invited in May 2006 to register with the Agency for the purposes of nominating and electing representatives to the Board (one person from the local community elected to a fifteen person board) and Consultative Body (two community reps on a twenty-two+ board). This process has come full circle and a second round of nomination and elections for GDA Board and Consultative Group will take place in October 2009.

Since 2006 the Agency has run a considerable number of consultation events, including: open days; autumn workshops to explore concerns and to provide designers with ideas at the start of their design processes; further workshops to explore designers initial ideas; and a call for more formal responses.

This first stage of the Consultation Process completed with a report ‘The Grangegorman Development: What would you like to see? A Report on the Proceedings of Six Public Consultation Workshops’ and a Report of the Proceedings of 2 consultation workshops with DIT staff. These reports, facilitated on behalf of the GDA by an external body, extensively highlighted and documented the issues arising from the development in a very open and frank manner. In response, GDA published (May 2008) on their website ‘Response Report on how the plans for the Grangegorman Development address the views, concerns and aspirations of the Community as documented in the public consultation process in Autumn 2007’.

This report, structured within the same sections as the ‘What would you like to see?’ reports, very clearly gives a point by point response to the issues raised during the consultation workshops, with the exception of two sections on ‘Relationship between the community and GDA’ and ‘A vision for Grangegorman’. [no explanation is given for the exclusion of these two sections]. It is clear from the amount invested in this document and the ‘Report on Consultation carried out by the GDA leading to a Draft Strategic Plan’ published Oct 2008, that GDA does indeed take their functions of consulting with relevant organisations and arranging for a communications strategy very seriously. Their responses are considered, detailed and a very good example of how to make decision processes informative and transparent.

However, within a Universal Design context, it becomes clear that the Agency does not perceive a significant role for itself in addressing issues relating to people most marginalised in society i.e. immigrants, older people, single mothers etc, unless where legislation, such as that relating to Disabled Access, asks it to. In their responses GDA indicates that these concerns are the responsibility and focus of the two key organisations that will later occupy

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14 Responses contained within the ‘Report on Consultation carried out by the GDA leading to a Draft Strategic Plan’ published Oct 2008 by GDA
the site ie HSE (Health Service Executive) and DIT (Dublin Institute of Technology).

This is an expected reaction; architects and planners often judge that ‘social issues’ lie outside their remit and that access issues are predominantly addressed at detailed building design level as a response to legislation. However in Section C of this report: ‘Universal Urban Design Case Studies’, we will see examples of development organisations that adopt direct responsibility for a Universal Design approach by embedding it, as much at strategic, as at detailed design level. Grangegorman Development Agency has an excellent opportunity in the years head to develop such a strategic approach to Universal Design, particularly when those institutions who will later occupy the site; Health and Education, have such a strong ethos and duty of care to their users combined with a heightened sense of accessibility and inclusion.
Case Study 3: BALLYMUN

Background:
Ballymun is an area of social housing to the north of Dublin, close to Dublin Airport. It was originally conceived as a dormitory satellite town— a large cul-de-sac with only country roads beyond. Its tower blocks, known locally as ‘the flats’, came to symbolize the deprivation, drugs and social alienation that overtook it from the 1970’s onwards. Since the 1980’s the community was very active in campaigning for new housing and facilities and in 1997 Dublin City Council established Ballymun Regeneration Ltd (BRL) to drive forward a multi-billion euro regeneration that is still ongoing (approx 70-75% complete) and anticipated to end in 2010.

Whilst the most visible signs of the regeneration has been the demolition and relocation of the existing population into new housing, the regeneration process is also intended to make the area economically and socially viable, through building a Main street for retail and commercial use; development of neighbourhood centres with a range of uses; and the development of lands bounding the nearby motorway (M50) to generate employment potential (most notably IKEA established a new store on the outskirts of Ballymun.)

In addition, the regeneration has provided facilities to support a range of arts, environmental action, recreational and training opportunities eg new parks, arts, and leisure facilities etc.

Existing and New Populations
In 2006 the total population of Ballymun was approximately 15,000. Alongside this existing community Ballymun will also see the growth of a new community attracted by the construction of privately owned apartments and housing.

It is intended that the final tenure mix will be 44% social and 56% private\textsuperscript{15}, and the final target population for Ballymun will be 30,000. So whilst the profile of the existing community is well-mapped, 50% of the final planned population is unknown. Private housing is also no guarantee of middle-income, home-owning families since much of the initial private accommodation has already been rented to tenants on social welfare allowances\textsuperscript{16}. Designing environments for this new community whose profile is unknown is as difficult as it is for Adamstown or Grangegorman but making both communities (old and new) coalesce to form integrated, sustainable, inclusive communities may prove difficult since, potentially, they could be competing for the same basic resources but with a different set of needs.

\textsuperscript{15} Figures taken from Ballymun Neighbourhood Council Strategic Plan 2008-2011 (p3)

\textsuperscript{16} Since Nov 2008 the private sector has officially not been allowed to rent to tenants on Social Welfare Allowance
Education
An interesting aspect of the Ballymun Regeneration has been the Transition Programme\textsuperscript{17} developed by National College of Ireland (NCI) for Ballymun Regeneration. The programme is run for small groups of residents, mostly people who will end up living in the same street, area. It aims to:

- give residents a chance to meet new neighbours
- provide information about the new homes
- bring people to see their new homes being built
- deal with maintenance, safety and security issues, energy management
- provide information on housing costs, waste management and budgeting

The four module programme is voluntary but over 50\% of residents participate. This is a means to make the process of moving into new accommodation more informed and hopefully more manageable for tenants. But it is also a way to give people the confidence to take ‘ownership’ and pride in their surroundings – a strong aspect of the user-centred approach of universal design.

Consultation
A Masterplan alongside an Integrated Area Plan was submitted to the Department of Environment on the 31\textsuperscript{st} March 1998 after a six month consultation exercise. Six months would appear to be a short time in which to garner feedback from such a large population area and make the appropriate alterations to the masterplan development.

Over the intervening eleven years however detailed design leading to construction and relocation of tenants has been ongoing. It has been a long process, as one resident commented: ‘it’s a lot to ask 15,000 people to live on a building site for 10 years’.

Along the way Ballymun has utilized different levels and types of notification, consultation and participation\textsuperscript{18}. In the planning of new homes for phase one and phase two, BRL used ‘inclusive and participatory’ methods which included: two public meetings at the beginning and the end of the process to allow people to raise concerns; the formation of a Design committee of neighborhood representatives to discuss designs with the architects; and the use of the Area Forums to take responsibility for signing off on final plans.

\textsuperscript{17} Information from interviews and from BRL’s Regeneration News May 2000 Issue 16 and Jul 2000 Issue 17
\textsuperscript{18} taken from unpublished BRL report: Notification or Information: interested parties or affected groups are informed of decisions made. One –way forms of communication used eg newsletters , websites etc Consultation: actively seeking the views of interested parties and affected groups. Participation: when interested groups become actively involved in formation of plans / policies and contribute to decision making processes. (paraphrased from Arnstein’s ladder of Citizen Participation (1996)
However, personal politics surfaced around who was and wasn’t involved or informed about the discussions at the Design Committee meetings and where responsibilities lay. The public meetings became disruptive and individual needs could not be addressed within a committee structure. So the process was altered, taking on board previous information and feedback. Ideas were further developed through one-to-one meetings with residents and a pre-planning exhibition, where residents could discuss issues with the BRL architect and architect of their housing scheme. Following this, changes were made and again the plans were publicly displayed in the Civic Centre.

One-to-one consultation can be very sensitive to the individual tenant’s requirements, however overall this process is much more controlled by the professionals than the community and accountability for decisions on a housing scheme now lies with BRL.

Supporting the community
The community’s voices were initially represented through the Housing Task Force. A local representative was quoted early on in the process as saying: “The development is going to go ahead and we have to be involved,…If we believe in ourselves, nothing will stop us developing Ballymun the way we want it to be developed. It’s a matter of convincing ourselves that we are onto a winner”

(Jan / Feb 1998: Issue 3, Ballymun Regeneration, Redevelopment News)

So community voices were initially strong in the process however as Ballymun has developed so too has the nature of the organisations that support its development and represent the community. In 2005, the Ballymun Neighbourhood Council (BNC) developed out of the original Housing Task Force and is now the nominated body for consultation on regeneration and neighbourhood management in Ballymun. It is funded predominately through BRL. BNC is a partnership based company with representation from residents, Ballymun Regeneration Ltd, Dublin City Council, Ballymun Partnership, the Gardai and local elected politicians.

In its Strategic Plan (2008-2011) BNC acknowledges that its biggest challenge will be ‘to ensure that it strengthens its democratic legitimacy in channeling the voice of ordinary citizens to BRL, the Department of Environment, Heritage and Local.’ This challenge is reflected in the findings of a report, ‘Is anybody listening’ (2006), commissioned by the Community Development Working Group of Ballymun Partnership. The report evolved out of a research programme where 10 local women, trained and supported by Ballymun Partnership carried out 472 face-to face questionnaires and 52 on camera interviews. Their work identified mismatches between the perception of the Ballymun residents and that of the local development and statutory agencies as to ‘how successful they were at engaging with and catering for the local people’.
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It is difficult to assess whether the report, ‘Is anybody listening’, has impacted on the BNC’s Strategic Plan (2008-2011) but certainly the plan is focused on inclusion and written in the language of Universal Design. BNC sets out its understanding of the ‘ordinary citizens’ it intends to give voice to, when it says that it ‘aims to support residents to build strong neighbourhoods, where everyone can contribute with their gifts and talents regardless of age, gender, social status, ethnicity, sexual orientation or marital status’. One of its six strategic objectives is ‘ensuring that everyone is included’ and it states that: ‘… a major challenge for the BNC is to ensure that it becomes more inclusive, especially regarding the involvement of people on the margins (i.e., the disabled, youth, immigrants, etc.)

Such statements are written in the language of inclusion and appear to represent the first strategic and explicit commitment to Universal Design within the regeneration process of Ballymun

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19 Universal Design would also add ‘regardless of physical and cognitive ability and size.’
Local Case Studies: Conclusions

The following paragraphs draw out some reflections and conclusions drawn from the three case studies.

Little reference to Universal Design

Universal Design was not adopted as an explicit design approach in any of the strategic documentation of the development agencies driving the three case studies. Alongside legislative and regulatory frameworks one typically expects to see, as in the case of Adamstown, support strategies or models of best practice as reference documents. However no Universal Design strategies or exemplars were evident in any of the case studies. The inference is that the concept of Universal Design has not permeated to those responsible for the planning and urban design of our environments, however with the implementation of Department of the Environment, Heritage and Local Government’s Sectoral Plan under the Disability Act 2005, this may alter in the years ahead, depending on the effectiveness of the links between sectoral plans, strategy documents and implementation.

Accessibility, in terms of legal responsibilities and regulatory frameworks, is however present, though the case studies tend to understand this an obligation and rarely as a means to create innovative, well designed environments that imbue equality, inclusion and sustainability.

However in the most recent strategy document produced by the Ballymun Neighbourhood Council we see the adoption of language that may signal the beginning of a Universal Design culture.

The Challenges of Consultation/ Participation

A central tenet of universal design is the integral role users play in achieving an inclusive environment.

“Users and other potential consumers should be involved during all parts of the process from the planning phase, through detailed design and on to construction, occupation, management and operation.”

CABE The principles of inclusive design (They include you) (2006)

The Case Studies represented in Section B illustrate how problematic and resource heavy notification, consultation and participation with users can be. Some of Imrie’s (2001: 103) discussion on “user involvement in the production of non-disabling design” mirror the same perceptions as those also referred to by Ciaran Lynch (2008: 19) when he lists the criticisms levelled at
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collaborative planning. Imrie and Lynch’s observations are echoed in the following observations on and assumptions about consultation and participation that were identified in the case studies:

- Regulatory and statutory parameters related to the Built Environment have gone through extensive consultation and as a consequence some Built Environment professionals feel there is no more requirement to consult.

- Those groups in society that need most to be consulted (e.g., disabled / low income etc) since their experiences of the built environment are least understood within mainstream professional knowledges, are difficult to bring to the table and often lack sufficient skills to effectively identify their needs let alone be able to communicate them.

- Those user voices that do readily come to the table are not always representative of the community. Indeed they can be ‘narrow-minded’ and at times exclusively focused on their own agenda, with little awareness of how to compromise or understanding that meeting their needs may be limited by resources and may in turn exclude others. This leads to strained relationships that are not conducive to collaborative working practices.

- User Groups / representatives are unable to comment with competence on the technical aspects.

- It takes more time and money to consult with users than clients and funders account for.

- Built Environment Professionals do not have sufficient nor inclusive management or communication skills to deal with consultation process.

- An inability to manage the amount of information and expectations of those consulted can be detrimental to the community’s ongoing support. Consultation can end up being perceived as little more than a talking shop.

- They is a general perception that if design professionals are left on their own they come up with ‘better’ solutions than working collaboratively with stakeholders.

- Some social issues are beyond the remit of those involved in procuring, designing and managing the built environment.

A large proportion of these criticisms/assumptions can be addressed through investing in enhancing skills (education) and a re-alignment of logistics (time and resources). This is part of the necessary professionalisation of Universal
Design and the acceptance that expert input and guidance is required. An example of such expertise comes in existing guidance available from the National Disability Authority, Ireland in the form of the publication ‘Ask Me: Guidelines for Effective Consultation with People with Disabilities’ which gives some useful strategies on how to access and consult with people with disabilities. It also includes a useful introduction to Disability Etiquette.

But it is the first and the last two criticisms on the list that illustrate where real resistance lies. The first and the last are to some extent a denial of responsibility and the second last is possibly a manifestation of professional insecurity. It would be unfortunate if such ‘human’ reactions were to block the development of a Universal Design approach.

Related Urban Design Concepts: Connectivity
The concept of Connectivity used in the Adamstown Development is one of the principles of an urban design movement called New Urbanism.

Connectivity implies an interconnected street grid network which disperses traffic and eases walking. There should be a clear hierarchy of main streets, side streets, boulevards, alleys etc, enhancing legibility, character and way finding. Such focus on high quality pedestrian network in the public realm makes walking pleasurable.

Connectivity in turn relates to another principle of Walkability. Where most places and services should be within a 10-minute walk of home and work. Pedestrian friendly street design (buildings close to street; porches, windows and doors; tree-lined streets; on street parking; out of sight parking areas; garages in rear lane; narrow, slow speed streets) and in special cases, pedestrian streets free of cars.

As mentioned in the Adamstown case study, such concepts of connectivity, diversification and walkability all resonate with principles of Universal and Inclusive Design (outlined in the Appendix 1) particularly in relation to ideas on interconnectivity and the mutual inter-dependence of people’s lives. It is likely therefore that other movements such as Slow Urbanism, sustainable communities etc also share common ground with Universal Design and as such could provide a useful vehicle to persuade built environment professionals of the relevance and pertinence of Universal Design to their particular professional practice.

Post-occupancy Evaluation
In the case studies there was little evidence of post-occupancy evaluation being significantly and systematically used to evaluate the level of ‘design fit’ to users needs. Of all the user evaluations, post occupancy is the most
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effective since users are better able to respond critically to real space than the virtual spaces of architectural drawings or masterplans. If no platform for user feedback is provided then it can convey a sense that the decision makers already know what they need to know and that no further learning is required. Within phased urban development, post occupancy evaluation is a very possible and potent tool for universal design approach is intelligently resourced and managed.

Design Driven
All of the case studies emphasis the need for Design Quality. International and national architects and urban designers of the highest calibre are appointed and design reviews are used (Ballymun and Adamstown) to ensure delivery of design quality. Universal Design is inherently about good design. If this characteristic of Universal Design can become accepted by those in charge of design reviews then this could present an excellent opportunity to raise awareness amongst project teams. (This argument is further developed on p39, p42 and p47)

Personal Commitment
During the case study interviews it was very apparent that those involved in planning and delivering new communities do genuinely aim to make places for people. It is also a well recognised phenomenon in the early days of most development or regeneration projects, that those employed by the development agencies spend long hours trying to ensure that the various stakeholders and communities feel a valued and integrated part of the process. Nonetheless, Universal Design should not have to rely on the goodwill of individuals. When problems or disagreements do arise, the natural and understandable reaction is to retreat into professional theifdoms and restrict lines of communication. A Universal Design approach therefore has to be built on clear strategies with sufficient resources and mechanisms in place to support the process, through its high and low points.

Support and Education
Moving to any new environment, whether a foreign country or first year student accommodation, requires adjustment to new cultures and the adoption of new ways of living. Community Liaison Strategies and community development workers can support, enable and encourage the interaction of the community with its new environment. Providing training (such as the transition course in Ballymun) on how to establish new gardens or roof terraces, live in car-free zones, or use advanced energy systems helps residents develop confidence in and ownership of their surroundings.
In Design generally and Universal Design specifically we tend to assume that environments should be designed to fit and respond directly to peoples needs but we may also need to consider balancing the equation and investigate how we might equip people with knowledge and skills to better use, control and confidently adjust and temper their environments to their own needs.
Section C: Universal Urban Design Case Studies.

Introduction
In contrast to Section B, the examples in this Section all make specific reference to Universal or Inclusive Design in their strategic documentation. They have been chosen from across a range of countries and at a variety of organisational and development scales (national, regional, municipal). Between them they provide sufficient transferable exemplars that can begin to inform a Universal Design Approach to Building Inclusive Communities.

Norwegian Government Action Plan for increased Accessibility for persons with disabilities: Plan for Universal Design in key areas of society

This Government wide five year action plan, published in Norway in 2005 aimed to increase accessibility for all, directing special focus on people with disabilities including vision, hearing, mobility, cognition and sensitivity to environmental factors (asthma and allergies). The action plan covers all areas of governmental reach and was designed to unify and strengthen efforts to increase accessibility across all sectors of society (physical environment, products, services, information etc). It was drawn up by the Ministry of the Environment and the Ministry of Labour and Social Affairs but its actions impacted on all Ministries. One of the principles that drove it are that “Efforts will be based on user participation at all levels”.

Cooperation with interest groups is understood by the Norwegian Government as increasing the democratisation of decision making processes and enhancing the quality and accuracy of measures. Another key principle of the action plan was “Measures and their impact will be assessed on an ongoing basis”. To support this a centre was established to report independently and annually on the conditions affecting people with disabilities and on the effectiveness of the implementation of the action plan. Crucially the plan stated that most of the measures to promote increased accessibility would form an integral part of ordinary ministerial activity and budgets, but, an additional NOK 186 million (approx €21million) was added to a cross-sectoral budget to support the action plan.

Within the area of the Ministry of the Environment, the following actions specific to buildings and outdoor areas were included:
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<th>Sphere</th>
<th>Measure</th>
<th>Description</th>
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<tr>
<td>Buildings and outdoor areas &lt;br&gt; <strong>BU 27</strong></td>
<td>Increasing knowledge about universal design at educational institutions.</td>
<td>National initiative at all educational institutions with relevant academic fields and educational programmes. Applies to upper secondary and higher education institutions. This initiative is being developed by the Norwegian University of Science and Technology. 2005 - 2006</td>
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<tr>
<td>Buildings and outdoor areas &lt;br&gt; <strong>BU 29</strong></td>
<td>Eliminate 100 critical barriers to accessibility nation-wide.</td>
<td>A national campaign will be launched to eliminate 100 critical barriers to accessibility. The municipalities are invited to submit proposals. Implementation is expected to take place in cooperation between the state and sector authorities, the municipalities and the relevant owners, and will be funded within the available budget framework. 2005 – 2009</td>
</tr>
<tr>
<td>Buildings and outdoor areas &lt;br&gt; <strong>BU 30</strong></td>
<td>Refinement of the training programme “Planning for All”.</td>
<td>Revision of the training programme “Planning for All” and continued use of the package in local and regional course activity. 2005 -</td>
</tr>
<tr>
<td>Buildings and outdoor areas &lt;br&gt; <strong>BU 32</strong></td>
<td>Revise the section on planning in the Planning and Building Act. Increased focus on accessibility considerations and universal design.</td>
<td>The Ministry of the Environment will assess the need to amend the Planning and Building Act to increase the focus on accessibility and universal design principles. The recommendations of the Planning Legislation Committee will be evaluated. 2005</td>
</tr>
<tr>
<td>Buildings and outdoor areas &lt;br&gt; <strong>BU 33</strong></td>
<td>Devise national policy guidelines for universal design in planning activities.</td>
<td>Specification and follow-up of proposals set out in Report No. 23 (2001-2002) to the Storting (Improving Urban Environment) regarding the use of national policy guidelines. National policy guidelines on universal design will be devised to help safeguard the interests of persons with disabilities in planning activities. 2005 – 2006</td>
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**English Partnerships**

English Partnerships is the UK Government’s National Regeneration Agency for England. It aims to support high quality sustainable growth. Within its three core strategic areas, Inclusive Design[^20] sits notably within their ‘Quality and Innovation Objectives’. For English Partnerships Inclusive Design “is a way of designing products and environments so that they are usable and appealing to everyone regardless of age, ability or circumstance by working with users to remove barriers in the social, technical, political and economic processes underpinning building and design.”

[^20]: Inclusive Design is the term used for Universal Design in UK and other countries.
The UK’s Disability Rights Commission\textsuperscript{21} endorsed English Partnerships and their adoption of an Inclusive Design Guidance Note (2007), saying that their actions “place a very welcome emphasis on the need to consider Inclusive Design at a strategic level, as far upstream as possible in the development process.”

The guidance note covers amongst other things:

* Relationship of Inclusive Design to project implementation
* Inclusive Design strategies
* Access Statements and Inclusive Design criteria
* The role of an Inclusive Design Champion and Access Consultant

Whilst the Inclusive Design Guidance Note does not focus directly on the generation of the urban environment there are worthwhile suggestions encapsulated in the Best Practice Section (p4) that are generic enough to apply to any scale of development. These can be paraphrased using Universal Design terminology and summarised as:

- Embed Universal Design in the mission statement/ business plan of the development
- Appoint a Universal Design Champion and Access Consultant as part of the project team. The role of Universal Design Champion is understood as being at a strategic level and as an equal member of the development team, ensuring that Universal Design “is included in the overall concept, and is appropriately defined”. The UD Champion also contributes to the feasibility stage and the development of the full business case. As the project progresses it is suggested that an independent access consultant is appointed to establish and monitor the detailed design. From their roles and positioning within the different development phases, both roles would appear to be quite different but mutually supportive. However the detailed guidance, (Technical Annex 7) indicates a convergence of skills and knowledge base of both roles by suggesting that both should have the core competencies and skills experience as set out on the UK National Register of Access Consultants.

- If existing buildings are present, begin with an access plan. This then can develop into a full Universal Access Statement for the entire development. The Access Statement is revised and evaluated throughout project development.

\textsuperscript{21} Since October 2007, DRC’s responsibilities have transferred to Equality and Human Rights Commission
- Access Statement is gradually converted into user/owner manuals to ensure that access is understood, effectively managed and maintained throughout the lifespan of the built environment.

English Partnerships state on their website that they are currently road testing their Inclusive Design strategy across a few projects and that “The conclusions from this work will inform and assist with the development of a mechanism for our projects and programmes to ensure inclusive design throughout our regeneration and development programme.” The realities and outcomes of these mechanisms therefore remain to be seen.

**Universal Design New York**

New York has perhaps one of the most diverse and dynamic populations of any city in the world. It is within that context that the Office of the Mayor commissioned IDEA (The Centre for Inclusive Design and Environmental Access, University at Buffalo) in 2001 and 2003 to produce the publications *Universal Design New York 1* and *Universal Design New York 2*.

The first publication described and illustrated the concept of Universal Design, presenting it as ‘an innovative design philosophy’. The guide also addressed myths associated with the cost of the approach and aimed to provide a model for other municipalities to follow. It is addressed to the community of people who develop and manage the City’s real estate and infrastructure and aims to help them to understand the concept of Universal Design.

The aim is that access and regulations can come together to create a better environment for everyone when using Universal Design criteria. The document covers 1. General Building and Facility Issues such as Using Circulation Systems, Entering and Exiting, Wayfinding, Obtaining Products and Services, and 2. Specific Occupancy Types Issues such as Cultural Facilities, Public Assembly and Entertainment Facilities, Participant Sports and Recreation Facilities, Temporary Lodging, Workplace Facilities etc. This is predominantly a guide to the elements that make up a city – routes, signs, buildings, facilities and how to make these not only usable but also ‘discoverable’ by people. It sets Universal Design within the seven principles (see appendix 1) of Equitable Use, Flexibility in Use, Simple and Intuitive, Perceptible Information, Tolerance for Error, Low Physical Effort and Size and Space for Approach and Use.

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22 There are some indications that Universal Design New York 3 is forthcoming
The second guide, *Universal Design New York 2* presented the most common Universal Design principles from *Universal Design New York 1* and offered simple, straightforward examples of how to incorporate those principles into real projects. It covers the same headings as the first publication but goes into considerably more detail, being much more focused on technical solutions to problems. The second book is a pragmatic rather than an introductory or discursive document. It is aimed at Design Professionals and is intended to be used during the planning and designing processes, to the extent that it is spiral bond so it can lie flat on the desk of the designer. Each two-page spread features one of the topic areas covered in *Universal Design New York 1*, for example, Exterior Planning and Design, Mechanical Circulation Systems (lifts, escalators, etc), ramps and stairs, street crossings, curbs) The requirements of accessibility codes/standards are dealt with separately from the Universal Design strategies so that it is clear to the designer what the law requires and how universal design extends beyond the legal mandate of accessibility. The publication reinforces the fact that Universal Design goes beyond accessibility by quoting from the Norwegian State Council on Disability, who first expressed in 1997 that:

“Universal Design is a market-driven process intended to create environments that are usable by all people. While considerations for people with disabilities are certainly necessary for Universal Design, they are not sufficient when planning and designing for the whole population. Accommodating the needs and wishes of everyone – e.g., children, the elderly, women and men – is also necessary for universal design”

There is also a useful section that presents the counterarguments to some commonly held myths of Universal Design, such as: Universal Design only helps people with disabilities and older people; Universal Design cannot sustain itself in the marketplace because people who need it most cannot afford it; Universal Design costs even more than accessible design; etc.
London Olympics 2012

The Olympic Delivery Authority (ODA) is the public body responsible for developing and building the new venues and infrastructure for the Games and their use post 2012. ODA’s work is underpinned by six priority themes: two of which are design and accessibility and, equality and inclusion. The Design and Accessibility Priority is supported by three key documents ODA’s Design Strategy (2007), Inclusive Design Strategy (2008) and Inclusive Design Standards.

Inclusive design is at the heart of our design process, and has been since the project began. The Olympic Village, the sporting venues, new transport services, supporting facilities and the Park itself will be accessible to people with a wide range of disabilities both during and after the Games. We want to set an excellent standard of accessibility for disabled people, older people and families with children, which will set a benchmark and act as an inspiration to others.

The first of the documents: the Design Strategy entitled ‘Designing for Legacy’ is a glossy, image-heavy publication that sets out the overall design aspirations and intention of the Olympic development: “design considerations are embedded into our planning, procurement and delivery from conception to the construction of every element of this project”. Design is understood as bringing value to the project, placing a mark of quality on the Olympic experience and building a sustainable legacy beyond the lifetime of the Olympics. Reference to Inclusive design appears throughout the Design Strategy and it is understood as an essential element in the delivery of those aspirations. Unlike previous examples, London Olympics 2012 goes beyond meeting the needs of people with disabilities; it even extends the understanding of inclusive design beyond the idea of equality and inclusive societies to an innate component of design quality. This is a highly significant step forward for the concept of Universal / Inclusive Design.

The Inclusive Design Strategy published in June 2008 sets out their working definition:

Inclusive Design is a process that aims to remove philosophical, attitudinal and procedural barriers in how people think and the way they design, build and manage the environment, building and transport. When something is inclusive, everyone can use it equally, confidentially and independently, regardless of age, disability, gender or faith.

The Inclusive Design Strategy Document makes reference to CABE’s 5 principles of inclusive design (see Appendix 1) and expands upon these principles, stating ODA’s aims to deliver facilities that are:
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**Inclusive** so everyone can use them safely, easily and with dignity,

**Responsive** taking into account what people say they need and want,

**Flexible** so different people can use them in different ways,

**Convenient** so everyone can use them without too much effort or separation,

**Accommodating** for all people, regardless of their age, gender, disability, faith or circumstances,

**Welcoming** with no disabling barriers that might exclude some people,

**Realistic** offering more than one solution to help balance, everyone’s needs and recognising that one solution may not work for all.

The Document also outlines the legislative and regulatory framework that all work has to be carried out within, however it aims to ‘promote really good and positive practices, not just obey minimum standards’.

The Strategy then goes on to set out the mechanisms by which these intentions will be met:

1. **Appointment of a Head of Equality and Inclusion**
   Working with small specialist team to oversee and monitor the strategy;

2. **An Equality and Diversity Board**
   To oversee and monitor implementation of all Strategies related to Equality and Diversity eg Race, Gender, Disability etc. It meets Quarterly

3. **Principal Access Officers**
   One Officer for Built Environment and one for Transport. They are there to champion the inclusive design philosophy and ensure implementation, also in regards to ODA’s partners. The Officers are supported by a team of Access Consultants and in addition each Project team is required to appoint its own access and inclusion experts.

4. **ODA Access and Inclusion Forum**
   Established as a consultation forum specifically focused on inclusive design. It contains representatives of a wide variety of disability, gender, race and faith groups who can provide user and experiential feedback to design team proposals. Project teams must consult this
forum as part of the pre-application consultation required for the town planning process. The access and inclusion Forum meets quarterly.

5. ODA Built Environment and Transport Access Panel
   Established to provide expert strategic and technical advice. Design Teams must formally consult the Panel as part of the town planning process. The Panel also review and agree the ODA Inclusive design guidelines and Standards. It is recommended that project teams regularly involve individuals and smaller groupings of members from this Panel in project design progression to give confidence that design proposals will be considered acceptable when formally consulted on. The ODA Built Environment Access Panel meets monthly.

6. Design Review Panel
   Every project goes through two Design Review panel jointly run by CABE and Design for London. An access specialist sits alongside leading designers on each of the panels.

7. Inclusive Design Standards
   ODA has produced a set of Inclusive Design Standards to be used by all Project teams. The Document deals with a range of elements that make up the external and internal environments. Each element is considered in terms of ‘Design intent’ and ‘Inclusive Design guidelines’. The standards outlined are taken from a range of previously published work, but being the Olympics (a global show-case event with large numbers of diverse people) there are issues one would not normally see in typical inclusive design guidelines but which one could imagine many other users groups would readily welcome in their day-to-day lives. For example:

   "Appropriate lighting conditions are important for Deaf, deafened and hard of hearing people who rely on lip reading to communicate and for partially sighted people to maximise their field of vision. Lighting also has security implications, in particular, where CCTV cameras are used." (p26)

   “Seating areas should provide a choice of different seat designs, for example single seats and benches and some seats should have backrests. As an alternative to standard seating, consideration should be given to the provision of perching seats, either fixed or pull-down, with and without backs, as casual rest places in longer circulation routes. When considering the design of seating designers should note that materials that are cold to the touch are best avoided.” (p18)

“Some disabled people visiting the Olympic Park will need to bring an assistance dog with them. While primarily people with sensory impairments require an assistance dog, people with mobility impairments and wheelchair users may also have an assistance dog. The visit times to the Olympic Park and venues have been estimated as between 5 and 14 hours. It will be essential to provide areas for assistance dogs to be watered and so forth, these spaces are known as dog spending areas.” (p32)

“10-15% of toilets pans and urinals not to align with Mecca” (p61)

8. Monitoring performance
Monitoring comes in the guise of two distinct elements: Client Review and Compliance procedure
Client Review: every project is reviewed at each workstage, from initial brief through to construction drawings. An End of Stage report is submitted for Client Review- Within this report the design teams must explain how their approach matches the ODA’s inclusive design objectives. The Principal Access Officer assesses the approach and comments on the design merits. Without the approval of the Principal Access Officer the project cannot continue.
Compliance Procedure: between Client reviews the Principal Access Officer will regularly work with project teams who are asked to complete compliance report proforma. In these they set out how they have met the ID objectives and where alternative solutions have been used and why. These reports can be accumulated to form the reports for the Client Review process and also act as the basis of the Access Statement required for planning purposes.
These proformas leave an overt and tangible trace of the decision making process throughout the project and acknowledge that design solutions are a reflection of the circumstances, degree of knowledge and best intention at that time.

ODA’s approach to Inclusive Design is extremely comprehensive. It naturally relies on substantial resources but within a context where Universal Design is understood not only as essential to meeting Accessibility and Equality goals but also underpinning Design Quality then it is a cost that is justified on a range of levels.

But it is also important to note that ODA’s work on inclusive design evolves out of a context where the London Plan (Mayor of London) has embedded inclusive design in its planning guidance and the ongoing work of CABE (Commission for Architecture and the Built Environment) whose work is

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24 General toilets designed not face Mecca out of sensitivity for prayer rituals
heavily referenced in the ODA’s documents. CABE’s growing list of publications on the subject of inclusive design and their focus on putting Inclusive Design and Equality on their Campaigns and Research list have been key in the development of Inclusive Design in the UK. They understand Inclusive design as ‘the process of designing, building, managing and populating places and spaces so that they work for as many people as possible, not just some groups.’ And they illustrate the breadth of ‘as many people as possible’ by listing ‘women and older people, lesbians and gay men, people from minority religions and cultures, working class and disabled people.’

Interestingly CABE recognise that in order to embed Inclusive Design into the Built Environment they have to embed it not only into their actions but also in their work patterns and organisational ethos and makeup. To do so they have set five priorities for themselves in respect to inclusive design and equality. Ie

1. Work with others to increase diversity in the built environment professions
2. Promote inclusive and equitable design through our design review panels, enabling schemes and awards, publications and promotion of best practice
3. Pursue with increased rigour accessible and inclusive design and the involvement of disabled people in the development of major schemes that come to CABE
4. Research the links between inclusive design, equality and sustainability
5. Lead by example by building a diverse and representative workforce and family.

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Section D: Universal Urban Design Case Studies

Conclusions

Distinctive roles in Universal Design

English Partnerships’s approach of embedding a universal design champion into the project team from the beginning is an interesting model. From within the process, Universal Design champions are more likely to be successful at: mediating successfully between Universal Design goals and the pragmatics of the process; building Universal Design into the business plan; and, perhaps more importantly, ensuring that indicators of success and progress include reference to Universal Design.

However the description of the role, skills and experience of such people would appear to require more consideration in order that they are distinct from Access Consultants.

This difference becomes apparent in the Olympics 2012 where a Head of Equality and Inclusion is appointed to oversee and monitor the strategy whilst the Principle Access Officers, assisted by Access Consultants advise and monitor at implementation level. Universal Design being both an approach/ concept and a burgeoning area of knowledge and skills requires a range of people to work at strategic, implementation and evaluation levels.

Multi-agency approach and Evaluation

All of the models cited in this section illustrate how Universal Design can be embedded at strategic level. However from the English partnerships approach it can be seen that simply adding Universal Design aims to strategic documents is of little use unless it also runs through all levels of implementation and becomes a measurable indicator of success.

Olympics 2012 being the most developed and comprehensive model of the four illustrates the degree to which Universal Design requires a multi-agency approach ie ‘joined-up-thinking-and-action’ and the significance of monitoring and evaluating the processes and the built outcomes.

Guidance Documents

All the models rely heavily on effective guidance documents. It is unlikely that that this need will ever disappear since the knowledge surrounding it continues to grow. This is most effectively illustrated by the New York Universal Design publications which have evolved as
awareness has grown. It is interesting to note that a universal design approach has also been applied to the design of the publications to ensure they are accessible and practical at the point they are most needed i.e. on the desk of the designer. This also echoes CABE’s concern to embed Universal Design not only into practice but also into ethos and structure of the organisation.
Section C: Reflections on Universal Design?

Universal Design Champions?

The Ideal description of a Universal Design Champion would be one person who acts as a broker between developers and agencies and ensures that users needs are understood and that users, in turn, understand the compromises required between other user groups and other determinants, such as cost and timescale.

However finding this range of skills and insight in one person would be challenging, which is why responsibility for universal design needs to rest across a range of roles at strategic and implementation level. To date most UD experts have been present only at the level of implementation (access officers). But without influence at strategic level, universal design does not become written into the project’s indicators of success and hence there is insufficient resources or leverage to ensure a universal design approach.

Increasingly, Design Review Panels are established within large development agencies or government bodies to ensure the delivery of design quality. Such Design review panels would benefit greatly from having a Universal Design Champion present throughout the reviews. Similarly it would be constructive if user representatives were better informed and skilled in negotiating with designers and decision makers, for environments that better suited their needs.

It would seem therefore that there is no one profile or job description for a Universal Design Champion and that Champions can be drawn from a range of backgrounds and levels. Perhaps a comparison might be made to foundations that identify future leaders in arts, education etc, from a range of backgrounds, and offer them scholarships, support and advanced training to better equip them as leaders when they return to their every-day roles. This might provide a strong model for the development of Universal Design Champions.

Post Occupancy evaluation

There is clearly a role for post occupancy evaluation in Universal Design and particularly when it is large-scale, phased, urban development. It provides us with the closest understanding of how people actually use the spaces designed for them. Post-occupancy evaluation has featured at certain moments along the history-line of architecture, presently few agencies resource the evaluation of their work sufficiently to include post-occupancy evaluation, perhaps this
time Universal Design is the driver behind the re-emergence of post occupancy evaluation.\textsuperscript{27}

The Evolution of Universal Design

As Universal Design becomes embedded within Urban Design contexts, our understanding of it as a concept will naturally expand and evolve.

Already its definition is challenged by the wider context of urban design. Limiting the definition of Universal Design to one focused in the main on disability and the individual, ignores the complex and evolving relationships and identities that exist within a sustainable urban community. Without a robust working definition, Universal Design will lack clarity and potentially suffer from low rates of adoption. However it is possible to expand the definition to take in all users whilst still remaining resolute in its responsibilities to those with critical needs.

In the four exemplars in Section C we start to see how Universal Design can evolve through the three agendas of Access and Disability, Equality and Inclusion and Design Quality. Enhancing Design Quality is understood as not only making ‘attractive environments’ but more crucially, environments that are attractive to as many people as possible – hence increasing their economic value and long-term sustainability. These three agendas have their own champions and key drivers; all can be used to justify and lever more resources, helping to elevate Universal Design onto a more significant and visible platform than it currently occupies.

If we accept that, in order to address future needs, design sometimes has to be a step or two in advance of mainstream society, we may also need to reconsider the role of Universal Design. To date it has been predominately focused on promoting a ‘tight fit’ to existing user needs. In an urban design context however Universal Design may also need to support people to best use and take ownership of their own environments. From such a position Universal Design can not only advocate that consideration of people be placed at the heart of the procurement and design process but also that good quality design be placed at the heart of everyone’s lives. This is a potent place for the proponents of Universal Design to occupy.

\textsuperscript{27} Interestingly, one of the key proponents of Universal Design in USA: Wolfgang Preiser- co-author of The Universal Design Handbook, McGraw Hill (2001), was a leading expert on POE in the 1980’s and co-authored such publications as Post-occupancy Evaluation (1988) and Building Evaluation (1989)
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South Dublin County Council
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Ballymun Neighbourhood Council, Strategic Plan 2008-2011 (April 2008)
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Design and access statements: how to write, read and use them (June 2006).
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Grangegorman Documents:
Report on Consultation carried out by the GDA leading to a Draft Strategic Plan, (Oct 2008), Grangegorman Development Agency

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Universal Design, Urban Design and Building Inclusive Communities


Irwin Altman, Arzah Ts'erts'man, Arza Churchman (1994) *Women and the Environment: a perspective on research, design, and policy*. Springer

Land, P, (June 2006) *Is anybody listening*. Ballymun Partnership, Research carried out by the Solas Development Centre and the working group of the Ballymun Partnership


Olympic Delivery Authority Publications (available through london2012.com website)

  *Design Strategy: ‘Designing for Legacy’* (June 2007)
  *Inclusive Design Strategy:* (June 2008)
  *Inclusive Design Standards*


**Web resources**

‘Supporting Local Authorities in Delivering accessibility’ website: The Good Practice in Accessibility website for Irish local authorities
http://www.la-accessibility.ie
Gendersite: gender and the Built Environment Database: The definitive online resource for gender and the built environment
http://www.gendersite.org/


Olympic park toilets ‘will not face Mecca’ News item on The Independent Newspaper website http://www.independent.co.uk/news/uk/home-news/olympic-park-toilets-will-not-face-mecca-941030.html
Appendix 1: Universal and Inclusive Design Principles

In this report Universal Design and Inclusive Design are understood as the same concept. The variety of principles listed below is indicative of it being an evolving area of knowledge.

**UNIVERSAL DESIGN PRINCIPLES**
These principles date from 1997 and have been widely published. They are accessible through the Centre for Universal Design (USA) website.

Principle One: Equitable Use
Principle Two: Flexibility in Use
Principle Three: Simple and intuitive
Principle Four: Perceptible Information
Principle Five: Tolerance for Error
Principle Six: Low Physical Effort
Principle Seven: Size and Space for Approach and Use

**INCLUSIVE DESIGN PRINCIPLES**
These principles date from 2006 and are published in “The principles of Inclusive Design. (they include you.)” by Commission for Architecture and the Built Environment (UK)

Inclusive design:
1 places people at the heart of the design process.
2 acknowledges diversity and difference.
3 offers choice where a single design solution cannot accommodate all users.
4 provides for flexibility in use.
5 provides buildings and environments that are convenient and enjoyable to use for everyone.

The CABE publication argues that the resultant characteristics of developments with an Inclusive Design approach are:

- **Inclusive** so everyone can use them safely, easily and with dignity.
- **Responsive** taking account of what people say they need and want.
- **Flexible** so different people can use them in different ways.
- **Convenient** so everyone can use them without too much effort or separation.
- **Accommodating** for all people, regardless of their age, gender, mobility, ethnicity or circumstances.
- **Welcoming** with no disabling barriers that might exclude some people.
- **Realistic** offering more than one solution to help balance everyone’s needs and recognising that one solution may not work for all.