Design for All

Centre for
Universal Design
Australia

Guest Editor : Chair, Dr . Jane Bringolf, BSSc, MBA, Ph.D, Churchill fellow,
Centre for Universal Design, Australia(CUDA)

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October 2021 Vol-16 No-10

Guest Editorial and Introduction

Dr Jane Bringolf, BSSc, MBA, PhD, Churchill Fellow.

Jane is Chair of Centre for Universal Design Australia (CUDA), a registered charity seeking a more inclusive world. A recipient of a Churchill Fellowship in 2004, Jane travelled overseas to investigate organisations pursuing universal design, accessible environments and assistive technology. She later completed a PhD in urban studies focusing on universal design in housing. Jane gained her grounding in universal design as Executive Director with the Independent Living Centre NSW. She wants to see a world where designers and policy makers automatically consider the diversity of the population and create inclusive built environments, products, services, and communications. Her passion for the topic is based on forty years working in the community sector. She writes regularly on universal design and inclusive practices and curates the weekly newsletter for CUDA. Jane also contributes to various advisory panels and education sessions on universal design. She now commits her time to Centre for Universal Design Australia and chairs the Board of Directors.

Editorial

Dr Jane Bringolf

If we take Design for All seriously as a research topic, we should also have regard for what we do with that information. We should also have regard for how we communicate that information. I therefore challenge the current ways in which some academics use the topic to forge a niche in an academically competitive world without due regard to the people they are reflecting in their research. For example, discussing the so-called differences between universal design and inclusive design is more about a discussion between academics than doing something tangible to benefit marginalised groups. There is so much more work to be done in overcoming structural barriers to inclusion. So why are we not doing it?

It is true that some co-design and participant action research in the universal design space is being carried out. But these examples are usually one-off projects to solve a particular social problem. Research that turns into guidelines or recommendations is useful but often ends up on a shelf. Why is that?

If we are encouraging designers to include more customers and users in their products and places, why aren't we encouraging academics to include more readers? Plain language summaries of research articles are still rare. Academics write in ways that make their work inaccessible to the majority. Why would they do that?

Apart from the academic content of articles, there is the visual presentation to consider. Tightly written text in Times New Roman in small font is not conducive to a long reading session. Likewise, large bolded, Italicised font is overpowering and also difficult to read for people with good eyesight. Digital publications can take

advantage of web software that adjusts to the type of device the reader is using. More readable layouts with easy navigation are used in blog pages. So why publishers are still using book layout?

With that said, the articles in this edition of the Newsletter deviate from the style of previous contributors and have more of a journalistic flavour. By doing so, they ask the readers to reflect on the purpose of the publication and the way in which it is presented both content-wise and in visual format. For a topic that is based on human rights and inclusion, it is essential that academics consider who they are writing about and who they are really writing for.

This edition has different topics all provided by board members of Centre for Universal Design Australia. First, I provide an overview of how the Everyone Can Play guide was devised by using universal design principles from beginning through to the published document. Emily Steel updates us on the development of the ISO standards for cognitive accessibility and Penny Galbraith describes her experience of delivering a universal design training program in Sri Lanka. The City of Sydney is a case study by John Evernden about accessible street signage. Phillippa Carnemolla provides an overview of her research on the social participation of people with intellectual disability and how people with intellectual disability were recruited as researchers. The topic of ageism in the work life context is discussed by Philip Taylor where he challenges stereotypical notions of older and younger people.

Creating an inclusive playspace guideline in Australia: A participant perspective

Dr Jane Bringolf

Abstract

Playspaces bring children and adults together for fun and social interaction. They help create a sense of neighbourly belonging. However, they are rarely designed for the inclusion of all community members. Late in 2017 the New South Wales state government launched their inclusive playspaces policy. In Australia, local government authorities (councils) are responsible for parks and playspaces. Consequently, the aim became one of educating and encouraging councils to upgrade current playspaces and create new playspaces using universal design principles. The task was to move council staff from the modular equipment found in catalogues to designs that are more inclusive, accessible and engaging. It was recognised early in the project that a guideline document would be necessary but insufficient to effect this kind of change in design thinking. Hence a universal design process for designing the guideline was required. That meant collaboration and co-design with councils and other stakeholders. The result was a guideline that was itself universally designed. The participative and collaborative process educated and informed the stakeholders as well as those designing the guideline. The success of the guideline was recognised with a national award from the Institute of Landscape Architects for Community Contribution. The purpose of this paper is not to comment on or evaluate the outcome of the guidelines *per se*. Rather, it is to document the inclusive isnd participatory approach from a participant perspective.

Keywords: *Playspaces, universal design, local government, guideline*

Introduction

Play is widely recognised as an important part of a child's physical and social development. Play is also fun, and designated playspaces at a local level offer children and adults an opportunity to interact informally. Ensuring that everyone can participate in play activities is therefore important for all children and their parents and care-givers. However, children with disability as well as parents with disability are often excluded from the benefits of play and related social interaction because playspace designs are not accessible and inclusive.

Playspaces in New South Wales (NSW) range from a swing and slide set in a pocket park in a residential area to large scale regional playspaces in parklands that offer a wide selection of activities.

There are several guidelines and frameworks for councils, practitioners and the broader community on the design and development of inclusive playspaces. For example, Touched by Olivia Inclusive Playspace Guidelines, and the IDNR Accessible Playground Toolkit.

These guidelines contain useful information and are set out in logical formats. However, a document alone does not encourage implementation or understanding of why and how a playspace should be inclusive. Educating stakeholders about the "why" as well as the "how' were considered an essential factor for the success of the project.

What follows is an account of the guideline development process from a participant perspective.

Background

In NSW, local government authorities (councils) are responsible for the design and upkeep of playgrounds and playspaces. Many councils refer to catalogues of modular playground equipment, which by default, become the playspace design especially in small parks. Larger regional playspaces are usually designed by landscape architects and contain a greater choice of activities. However, few parks and playspaces are accessible. This caused a movement in specialised playspaces for children with disability which are fenced and accessed only with a special key. While these are accessible for wheelchair users, they are not inclusive.

The next wave of playspaces was given the name of "All Abilities Playspaces". This terminology also signals that these playspaces are somehow "special" because they are designed for children with disability rather than everyone. Consequently, it does not meet the aim of being inclusive for social and communal interaction. The aim of the project therefore was to make all playspaces inclusive for anyone and everyone of any age.

In November 2017, the NSW Minister for Planning announced state-wide funding to create inclusive playspaces based on universal design principles. In a media release the Minister, Mr Roberts, said, "I want all playgrounds in NSW to be reviewed as part of an in-depth audit that will see them assessed and rated against universal design principles. To make it happen, we are introducing a clear set of playground and park design guidelines for councils and developers to follow…"

The NSW Department of Planning, Infrastructure and Environment (NSW Planning) became responsible for the project and the allocated budget of A$20m over five years which was to be awarded to councils through a grant application process. This budget allocation was important, not just to encourage councils to participate, but also to show that this policy statement had a commitment to action.

The project involved a three-fold undertaking. The production of a guideline document was the headline task. A less obvious, but essential task, was to use the document-making process to educate stakeholders about inclusion and universal design. This was to increase the likelihood of successful implementation. A second less obvious task was to find ways to communicate the design guidance in a straightforward and engaging way. A universal design approach encapsulates all three tasks. Hence the project took a universal design approach to the process, the design guidance, and the design of the document itself.

The Office of Open Space and Parklands within NSW Planning was given carriage of this initiative. The first task was to devise an inclusive process for developing inclusive playspace guidelines.

Participatory Action Research

Participatory Action Research (PAR) is an approach to community development that involves researcher, practitioners and participants working together to examine a problem and change it for the better. This approach is usually associated with solving a social problem with the people who are affected by the problem. The process attempts to find ways to take action to ameliorate or remedy the situation using the input and experience of those experiencing the problem. Through an iterative process it provides

an opportunity for all stakeholders to share understanding and knowledge and consequently this method is sometimes known as Action Learning.

PAR also involves actors who have a stake in the outcome of the process. It is typically used where service providers and governments want to deliver high quality and responsive services such as health and education to vulnerable populations. Importantly, the process itself, through participating, contributing, and learning, encourages the community in question to own and accept responsibility for the decisions and outcomes, and if appropriate, act on them. It is therefore more than a simple community consultation. Rather it is an iterative process that is well-documented and where the ideas and solutions are evaluated through a continuous feedback loop. It was during the succession of meetings and workshops that it became evident that this process most closely matched the elements of the PAR methodology.

The PAR method is mostly used directly with community members, that is those most affected by the decisions. In this case it was those who would be using the guideline, that is, council staff who were then expected to use an inclusive process to consult with their communities in the development of new playspaces. Members of advocacy organisations and universal design champions were taken as de facto representatives of those who use playspaces.

Method

A small group of people who had experience in inclusive playspaces, universal design, and local government processes were invited to the first exploratory meeting and workshop. Also

included in the group were Office of Open Space and Parklands staff, and a representative from a consulting landscape architecture firm as observers. The landscape architecture firm were commissioned to provide technical design expertise. Terms of Reference were developed and agreed by all parties.

On the basis that it was not possible or desirable to have all relevant stakeholders at all discussions and workshops, an iterative approach was devised in four parts, each building on the one before. This is conceptualised in Figure 1.

The group that first met for the exploratory process became the core reference group with the name "Advocacy Group". The Advisory Group consisted of a larger group of stakeholders, and the Key Stakeholder group included a broader representation. Community and Industry Representatives were included towards the end of the project.
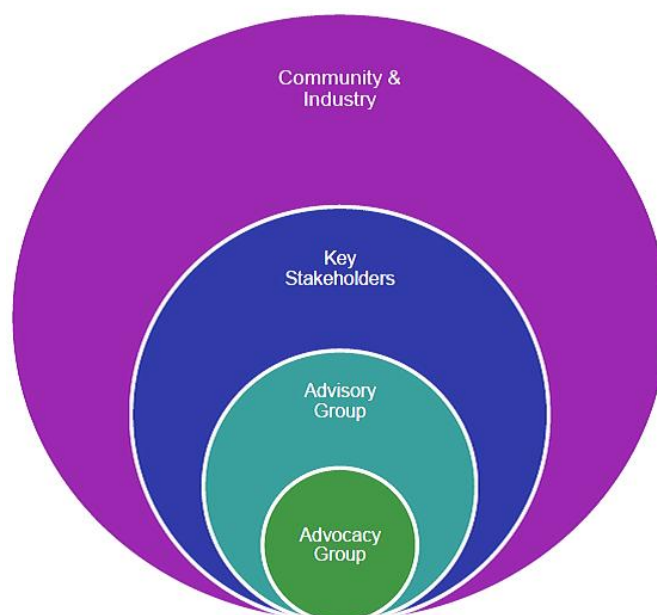

Figure 1: Four tiered iterative approach to participatory and inclusive development of the Inclusive Playspace Guidelines (source: NSW Planning)

The Advocacy Group was a small working party of champions for universal design and inclusive playspaces, together with representatives from councils that had established inclusive playspaces. A small group allowed for roundtable in-depth discussion, analysis of ideas, and knowledge sharing. NSW Planning staff gathered the knowledge shared, reflected on the information and planned the next iteration in the process.

The firm of landscape architects consulting on the project attended all meetings and workshops. They provided technical design guidance and worked with the 8 Goals of Universal Design by Steinfeld & Maisel, to contextualise them into playspace terminology at the commencement of the process. This was an important step because it framed the work going forward. The 8 Goals were transitioned to the 6 Design Principles: Find, Fit, Choose, Join In, Thrive, and Belong.

It was acknowledged that not all councils would be willing participants in this new initiative, many having reservations about cost and ability to comply. Council areas in NSW vary considerably in size, staffing levels and budgets. Consequently, the financial and staffing abilities of all councils were considered in the process. The guideline, therefore, needed to be persuasive, educative and easy to apply. An iterative and participative approach – a universal design approach – would assist with the acceptance of the project at a local level.

The process in detail

The process commenced by working with the small Advocacy Group. Steinfeld and Maisel's 8 Goals of Universal Design were used as a starting point for discussion. Briefly, the 8 Goals are:

Body Fit, Comfort, Awareness, Understanding, Wellness, Social Integration, Personalisation, and Cultural Appropriateness.

To assist with conceptualising and operationalising the 8 Goals in the playspace context, six key elements were identified: being able to find things easily; being able to physically access equipment and places; being able to choose activities; the ability to join in with others, being able to develop motor skills, and to have a sense of belonging. The chart below shows how the 6 elements link to the 8 Goals. See Table 1.

Find	**Awareness and Understanding**
Fit	**Body Fit and Comfort**
Choose	**Personalisation and Understanding**
Join In	**Social Integration and Cultural Appropriateness**
Thrive	**Wellness, Comfort, and Understanding**
Belong	**Social Integration**

Table 1: 6 Key elements linked to the 8 Goals of Universal Design

Further discussion of the 6 elements resulted in a distillation of words to plain language. They were expressed as: Can I Get There? Can I Play? and Can I Stay? The Advocacy Group also discussed the most appropriate use of language and terminology to ensure the concepts of inclusion were emphasised. This meant ensuring language did not default to terms that represent disability. For example, it was agreed that "all-abilities" and "accessible" were not to be used anywhere in discussions or in written drafts. To support the concept of universal design, the terms "checklist" and "compliance" were also avoided.

A document based on the three key elements and six principles was taken to the first Advisory Group (second tier group) workshop to seek feedback. The title of the guideline was affirmed as "Everyone Can Play".

The second tier Advisory Group was formed by inviting all councils in NSW and other stakeholders to participate in the first workshop. The Advisory Group eventually comprised approximately 50 participants: council representatives, professional stakeholders, community group representatives, play equipment suppliers, childhood educators and academics. The Minister for Planning opened the workshop with a short encouraging address to reinforce his commitment to "Everyone Can Play".

The workshop process began with a video of personal stories from families who related their experiences of playspace design and how it can exclude and include. This set the scene for the small group work that followed in the workshop. The thoughts and ideas generated in the workshop were followed by a feedback session and an open forum for questions, discussion and comment. A professional facilitator was engaged to lead and guide the process. Members of the Advocacy Group and Office of Open Space and Parklands staff were also present at the workshop to monitor and record feedback.

The Advocacy Group met again to review the feedback from the workshop and made amendments to the draft document accordingly. A second and final Advisory Group workshop was organised to present the latest iteration of the document for analysis and comment. Specific workshop questions that encouraged detailed interrogation of the document were used. The Advocacy Group met immediately afterwards to review the

feedback and discuss next steps. The initial three elements, Can I get there? Can I Play? Can I Stay? were reaffirmed. Minor re-adjustments to the document were agreed.

Document design

The design of the document was a critical factor in communicating the information to the target group – council staff, landscape architects, and play equipment designers. The content of the guideline was drawn from participant feedback and NSW Planning policy. The challenge was to take a universal design approach to language and to visual presentation within the document. Images, headings, graphics, colour, size and type of font were all carefully considered. Fun and play were the key elements of the design style as depicted in Figures 2-4. This was a major shift for a government document which usually has set standards for official publications.

Figure 2: Front cover of the guideline

The document uses photographs, case studies, and personal stories from children, parents and grandparents to explain the importance of inclusive playspaces. The final pages of the document have a checklist based on the 6 principles devised at the beginning of the process. Figures 2, 3 and 4 illustrate the design style of the guideline.

Hard copies of this draft were printed and distributed and used to elicit further feedback. With the document in hand, staff from the

Office of Open Space and Parklands visited regional councils in NSW with the purpose of explaining the guideline and to gain further feedback.
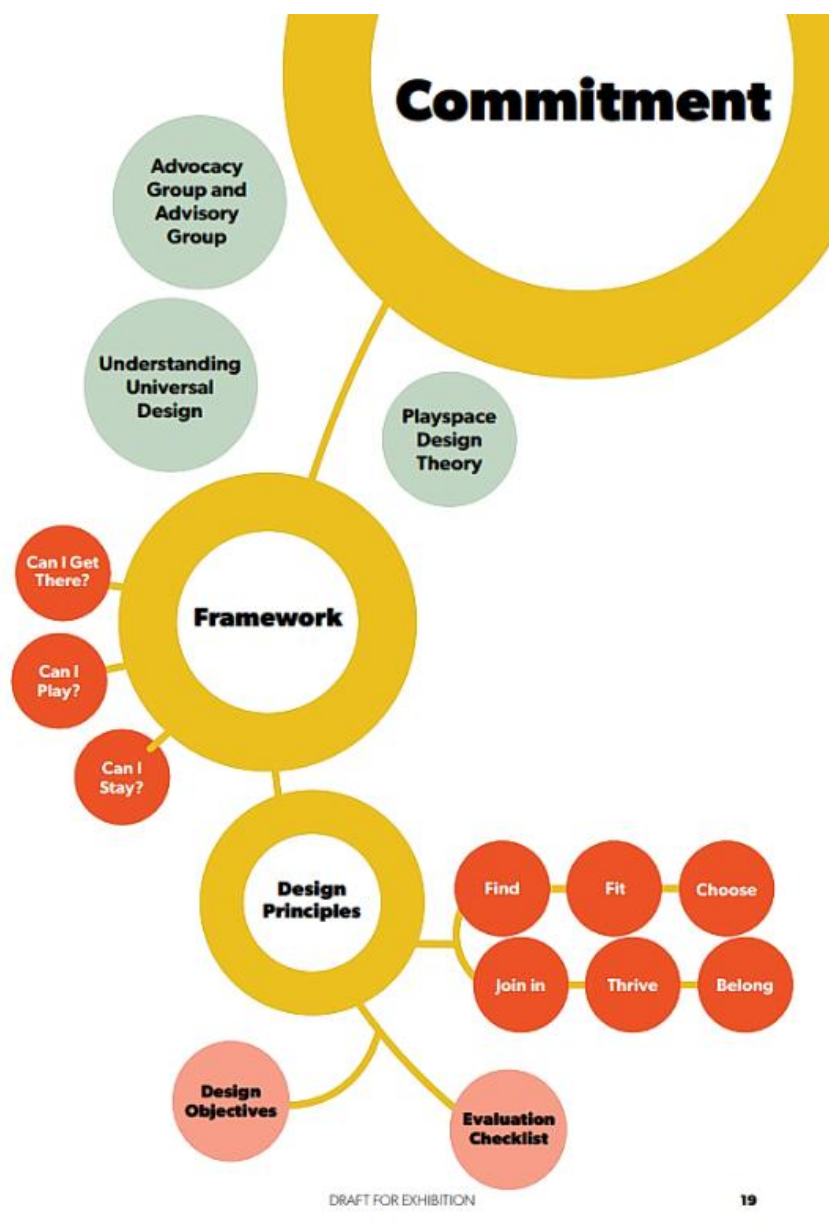
Figure 3: A page from the guideline showing the key elements

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e penultimate draft document was then used as the basis of a final one hour workshop at the annual Parks and Leisure Australia Conference to gain further feedback.

When it comes to determining if a playspace is truly inclusive, it is important to consider the wider context. Look outside, around and through the playspaces and ask: Can I get there? Can I play? Can I stay?

Can I Get There?

A considered location and layout, adequate signage and wayfinding and accessibility will ensure everyone can find their way to, in and around the playspace.

Can I Play?

The play experience as a whole, including the equipment and surfacing, should enable everyone to experience a variety of challenging and engaging play opportunities in a way that suits them.

Can I Stay?

Sufficient consideration of safety, amenities and the wider environment and landscape will ensure everyone can stay at the playspace for as long as they would like.

20   DRAFT FOR EXHIBITION

Figure 4: The three Can I's

The guideline was also provided in digital format on a designated website. with more examples, videos of family stories, and comments from Advocacy Group members. The style of the webpages included the same principles as the printed document. The online resource includes several short videos featuring the

experiences of participants in the process, and the three Can I's are expressed in the words of adults and children.

The project was undertaken within 15 month period, and Everyone Can Play was launched in early 2019. The process for developing the content took eight months. The final months included two months for the statutory public exhibition time, and time for the last fine tuning before the Minister signed off on the project.

Figure 5 following shows the cyclical iterations of knowledge sharing and commentary implemented and who was included in each knowledge sharing cycle.
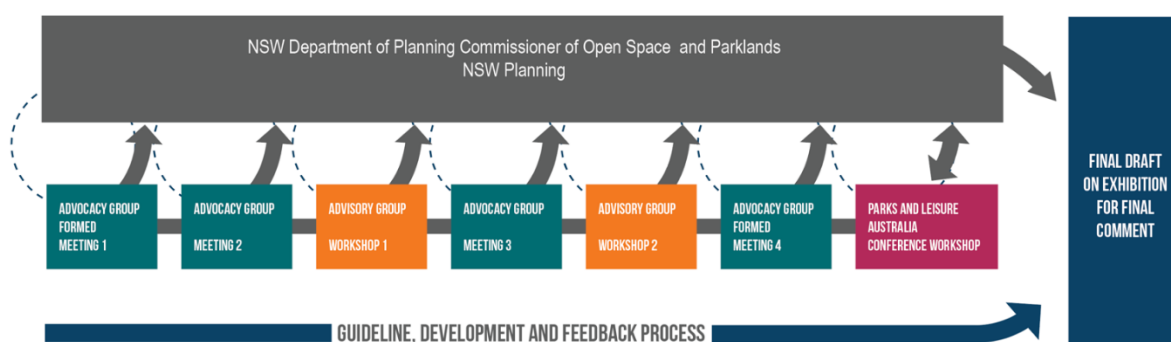

Figure 5: Diagram showing the participatory process employed in the development of the guideline. Represents the flow of participatory research and cycles of knowledge sharing and building.

Advocacy Group feedback and analysis

Following the conclusion of the cycle of meetings and workshops, the reflections and comments of Advocacy Group members on the guideline development process was sought.

A two part question was asked in a survey questionnaire.

Question: Considering your role in the Advocacy Group and attendance across the subsequent meetings and workshops in the development of the Everyone Can Play guideline,

> a) *What do you feel worked well as a part of the inclusive process? For example, who was present, how people engaged, the nature of knowledge sharing and gathering, what you liked most; and*

> b) *What could be done differently next time?*

The responses to the two-part question were tabulated and analysed according to content. These responses provide insight into how a participatory and inclusive approach to developing universal design guidelines can be replicated or improved for future applications.

Five features were observed as significant definers of the guideline development:

- *Innovative thinking beyond a "checklist" of universal design features*

- *Understanding the possibilities of multiple platforms to educate and inform universal design practice*

- *Use of language in an inclusive context*

- *Effect of participatory process at multiple stakeholder levels*

- *Process of translating universal design principles and goals to an industry relevant guide*

- *Having the three Can I's… (Can I get there, Can I play, Can I Stay) makes it easy to remember*

 While the three Can I's were developed in the playspace context, it was soon realised that these three basic concepts could be

applied in other settings: Can I get there, Can I do what I went there to do, and Can I stay for as long as I need or want to, and feel welcome and comfortable.

Conclusion

The aim of the initiative was to devise a guideline document that would be both appealing and useable by council staff responsible for playspaces with the information they need in a format they can use and understand, which would encourage creative inclusive design outcomes.

Contextualising the 8 Goals of Universal Design into the 6 principles for playspace design was an important first step. Maintaining the universal design approach with the document style was also a key factor in making the document useable and accessible to stakeholders.

The process of developing the guideline from first exploratory ideas through to the style of the document was universally designed. It served to educate stakeholders, overcome resistance, and is now an exemplar for others to follow. Can I get there? Can I play? and Can I stay? remain the key memorable phrases. The simplicity of these statements can be applied in any context with "play" being replaced by any action. Such simplicity is the essence of universal design.

Epilogue

The Everyone Can Play guideline won the 2019 **National Landscape Architecture Award** for Community Contribution. The Jury citation was:

Everyone Can Play provides a comprehensive suite of principles, case studies and "tool kit" examples that support more inclusive play spaces in New South Wales. The well-presented and easily accessible document advocates for three core considerations – Can I Get There? Can I Play? and Can I Stay? – informed by detailed research, design thinking and extensive engagement. The guidelines empower councils, community leaders and design professionals to design and deliver more inclusive, safe and attractive play spaces and settings.

The guideline content was developed throughout 2018. In 2021 the Office of Open Space and Parklands called the Advocacy Group together to review the guideline and update the content. The content will be based on further feedback from stakeholders and shifts in community expectations. The key elements to be added are acknowledgement of First Nations people and connection to country; nature and water play; and connection to place and play.

References

Australian Government Institute of Family Studies (2015). "Participatory Action Research". Accessed 29 September 2021. *https://aifs.gov.au/cfca/publications/participatory-action-research*.

Daily Liberal News, 7 September 2018. Everyone Can Play in NSW roadshow pulls into Dubbo. Online. *https://www.dailyliberal.com.au/story/5630297/dubbo-regional-council-playgrounds-may-become-more-inclusive/*. *Accessed 29 September 2021.*

Indiana Department of Natural Resources, "Accessible Playground Toolkit: Ideas and information to help Indiana communities create accessible playgrounds for all users". Accessed 29 September 2021. *https://www.in.gov/dnr/outdoor-recreation/files/or-accessible-playground-toolkit.pdf*

Landscape Australia (11 October 2019) "2019 National Landscape Architecture Awards: Landscape Architecture Award for Community Contribution. Online. *https://landscapeaustralia.com/articles/2019-national-landscape-architecture-awards-landscape-architecture-award-for-community-contribution/*. *Accessed 29 September 2021.*

NSW Government, Department of Planning, Industry & Environment, "A new standard for inclusive kids play spaces". Media release 8 November 2017. Accessed 29 September 2021. *https://www.planning.nsw.gov.au/News/2017/A-new-standard-for-inclusive-kids-play-spaces*

NSW Government, Department of Planning, Industry & Environment, "Everyone Can Play" Online.

https://www.everyonecanplay.nsw.gov.au/. *Accessed 29 September 2021.*

Steinfeld, E., & Maisel, J., (2012). The 8 Goals of Universal Design. Online. *http://idea.ap.buffalo.edu/about/universal-design/. Accessed 29 September 2021.*

Touched by Olivia Foundation, "Inclusive Playspace Guidelines". Online Inclusive Playspace Guidelines – Touched by Olivia. Accessed 29 September 2021.

Wadsworth, Y. (2006). "The mirror, the magnifying glass, the compass and the map: Facilitating participatory action research". Handbook of action research: The concise paperback edition, 322-342.

Yogman, M. (2018) "The Power of Play: A Pediatric Role in Enhancing Development in Young Children". In Pediatrics. Vol 142, No.3. Accessed 29 September 2021. https://pediatrics.aappublications.org/content/pediatrics/142/3/e20182058.full.pdf

Emily Steel is an Occupational Therapist who has worked as a clinician, manager and researcher in Australia, the United Kingdom and the Netherlands. Her research has investigated policies and practices for implementing disability rights and providing assistive technology in Europe and Australia. She is the Australian delegate on the International Standards Organization (ISO) cognitive accessibility working group. She is a member of the Board of Directors of the Centre for Universal Design Australia and active in promoting universal design strategies to make products and systems easier to understand and use. She was awarded a Fulbright Scholarship in 2020 for postdoctoral research to be carried out in the USA.

Universal design informs cognitive accessibility standards

Dr Emily Steel

This article describes the background behind the International Standards Organization's (ISO) working group on cognitive accessibility, how it operates, and its work to date.

Background

While assistive products are designed to enable people with disability to function and participate in important life domains, universal design is for everyone. Mainstream products in personal (e.g., smartphone) and public domains (e.g., transport ticket machine) can be designed or configured to meet the needs of most people and are usually less expensive and stigmatising than assistive products. In a world where people use smartphones to organise and negotiate their working, social and recreational lives, people with cognitive impairment can be marginalised or excluded because user interfaces on phones or touch screen devices are confusing or not adapting to individual users' needs and preferences.

With consumer advocacy, industrial and clinical innovations, standards and legislation, we have improved the design of the built environment and products for consumers with physical or sensory impairments. Now the aim is to do the same for people with cognitive impairment and the broader neurodiversity across society. Rather than writing discrete standards for diagnostic groups such as acquired brain injury, dementia, dyslexia, autism, or depression, the ISO cognitive accessibility working group has

adopted the **Universal Design for Learning (UDL) Guidelines** to promote better design for all people.

Work to date

The working group has published two standards since forming in 2015:

1. **ISO 21802:2019 Assistive products — Guidelines on cognitive accessibility — Daily time management**

This document provides guidelines for the design of products to support daily time management. It addresses the features and functions known to increase the accessibility of products and systems for time management. It gives examples of user needs in relation to daily time management functions followed by design recommendations.

2. **ISO 21801-1:2020 Cognitive accessibility — Part 1: General guidelines**

This document presents guidelines for the design and development of cognitively accessible systems, including products and services and built environments. It is structured around three concepts adopted from the UDL guidelines: (1) motivation and focus; (2) representation and understanding; (3) action. It emphasises the importance of engaging people with cognitive impairments in the development of mainstream and assistive products.

A third standard is under development:

3. **ISO/CD 21801-2 Cognitive accessibility — Part 2: Reporting the cognitive accessibility of products and technologies**

This document establishes requirements for reporting the cognitive accessibility of products and systems, giving examples of the applicability of recommendations given in ISO 21801-1. Designers wanting to report on the cognitive accessibility of a specific product can use this guidance along with any relevant existing standards and accompanying test methods

How does the working group operate?

The working group is coordinated by a Chair and Secretary and nominated members of the working group who lead the drafting of specific documents. Members of the working group are from participating ISO countries, such as Sweden, Japan, Denmark, USA, Spain, Australia, and Canada. The group includes people with disability, academic and industry researchers, product designers and developers. Meetings are held several times a year depending on the stage of the projects and deadlines set by ISO.

Prior to COVID-19, meetings were mostly online with occasional hybrid (combining virtual and in-person) workshops hosted in different countries and held over two or three days. With all meetings since March 2020 held online, the time of day is varied, and the agenda includes breaks. These measures acknowledge the different time zones, circadian rhythms and processing styles of members and seek to increase both productivity and conviviality through participation.

The content and drafting process for the General Guidelines (ISO 21801-1:2020) was led by members of a Swedish organisation called Begripsam. Members of Begripsam include people with disability and people with diverse cognition who are committed to research, development and evaluation of products and services that meet the needs of all people. Their skills and experience in

hosting online and hybrid workshops was necessary to ensure effective teamwork. For example, a key recommendation arising from Begripsam's early work was for data collection and analysis to be conducted over several sessions. The Swedish term "study circles" describes a process where researchers meet weekly from 3-10 times, and work together on whatever the group decides, with a leader who facilitates discussion. There are valid reasons why members may need more time and several opportunities to contribute to the working group, so the Begripsam team often meets in small groups between ISO workshops to reflect on, create or edit ideas and solutions.

Working in accordance with the ISO directives has constrained the generation and expression of more inclusive working practices at times, but also led to constructive debates and consensus. For example, a sophisticated grasp of English is required to follow the rules for the use of verbal forms so that a clear distinction can be made between requirements, recommendations, permissions, possibilities and capabilities.

While ISO documents usually specify how values are to be measured and stated, this has proved challenging because cognitive accessibility is a relatively new area of standardisation with efforts focused on building consensus on the central concepts and characteristics. The ISO directives promote the principle of consistency to help the user understand documents or series of associated documents. The leadership of Begripsam has demonstrated that people with diverse cognition can and should be included in standards development and review.

Future work

Several proposals for future projects are being considered by the working group, based on known issues for people with cognitive impairment such as medication management, indoor navigation, and emergency response systems. Many of the domains of interest represent challenges with navigating in time and space. The working group will also revise the general guidelines on cognitive accessibility, with the intention of learning from their application and improving with each iteration.

The working group is keen to integrate the experiences and findings from consumers and research teams into the revision of the general guidelines on cognitive accessibility and the development of new ISO standards. Topics already discussed for standards development include assistive products for personal medication management, systems to support indoor navigation, and systems to support money management. Cognitive accessibility standards will continue to be based on principles of universal design to promote participation of all people in all aspects of society.

If you are interested in finding out more about this work, or contributing to the development of the Standards, please contact the *Technical Committee Secretariat*.

References

1*.   CAST (2018). Universal Design for Learning Guidelines version 2.2. Retrieved from* http://udlguidelines.cast.org

2.   International Organization for Standardization (2019). ISO 21802:2019 Assistive products — Guidelines on cognitive accessibility — Daily time management. ISO: Geneva

3.   International Organization for Standardization (2020). ISO 21801-1:2020 Cognitive accessibility — Part 1: General guidelines. ISO: Geneva

4.   Begripsam (2021), Välkommen till Begripsam!. Retrieved from https://www.begripsam.se/

5.   International Organization for Standardization (2021). ISO/IEC Directives, Part 2 - Principles and rules for the structure and drafting of ISO and IEC documents (Ninth Edition). ISO: Geneva.

Penny Galbraith: **FAIB, FRICS, PhD, Accredited Access Consultant.**

Penny is a built environment professional with a career long interest in accessibility and universal design. She is a Fellow of the Australian Institute of Building (FAIB); a Fellow of the Royal Institution of Chartered Surveyors (FRICS), an Accredited Member Association Consultants in Access Australia (ACAA), and a Consultant Member National Register of Access Consultants (UK). She holds a PhD in Construction Management. Consultancy roles have covered a range of clients and built environment forms including Underwater World, State Library of Queensland, Princes Pier, master planning senior living villages, NW Rail Link, and more recently helping the City of Greater Geelong determine 'what accessible looks like'. Penny has worked internationally on major projects related to access, universal design and inclusion. Strategy, research and futures thinking underpin Penny's work.

A universal design approach to addressing the inaccessibility and disrepair of the built environment in Sri Lanka

Dr Penny Galbraith

Abstract

The combination of accessibility regulations, a rich architectural and cultural history, and recent civil war poses considerable challenges for remedying a damaged and run-down built environment. Sri Lanka has a commitment to removing barriers in the built environment for people with disability and as such has a set of robust regulations that are prescriptive and retrospective. However, drafting and translation errors have made it difficult to achieve these objectives. Consequently, there is a poor level of understanding and compliance with regulations leading to a seemingly intractable combination of difficulties.

A project funded through the aid program of the Australian Department of Foreign Affairs sought to overcome these difficulties through a training program. It was decided that a robust understanding of universal design principles would provide participants with different ways of thinking about the problems and solutions. Lessons from Australia were shared including whole-of-journey transport planning. Community and industry engagement was a central theme to taking more strategic and universal design approach to solving complex problems.

Keywords: *universal design, distressed assets, access regulations, training program*

Introduction

The Sri Lankan Government has several legislative and policy commitments to ensure public facilities are accessible for people with disability. However, the effective implementation of these protections requires further support.

The Australian Human Rights Commission (AHRC) worked in partnership with the Human Rights Commission of Sri Lanka (HRCSL) to improve disability access in Sri Lanka, particularly regarding public environments and transport. The project commenced in 2016 as a short targeted funded initiative by the Australian Department of Foreign Affairs and Trade (DFAT), through its aid program.

Phase 1 of the project began with a scoping study and stakeholder consultations regarding the project objectives, together with training on disability access rights, legislation and policy, and the complaints handling functions of both the AHRC and HRCSL. Phase 2 of the project was to provide technical advice and training to technical staff and advocacy groups.

This paper relates to Stage 2 of the DFAT project which was to provide technical training and advice to improve outcomes for people with disability accessing public environments and public transport. The training was provided in Colombo over 3 days for delegates from across Sri Lanka.

More than 80 delegates attended the training. They comprised HRCSL staff and technical staff responsible for compliance with the regulations, including architects, engineers, town planners, transport operators and civil society organisations.

Historical background

The history of Sri Lanka provides some context to the project. Prior to European domination, the two main ethnic groups in Sri Lanka were the Sinhalese and the Tamils. These two cultures lived in separate areas mostly due to the geography of the country.

In 1502, the Portuguese arrived, monopolising the spice trade slowly taking over all but the Kandyan Kingdom in the central highlands. The Dutch were also keen to dominate the spice trade when they arrived in 1602. By 1658 they had forced out the Portuguese.

The British saw the strategic importance of Sri Lanka and after more than 150 years the Dutch ceded their control to British protection in 1796. The British gained full control of the island by 1815 when they conquered the Kingdom of Kandy. Tamil workers were brought from India by the British to work in their tea plantations and this is when cultures began mixing across wider geographic areas.

A strong nationalistic sentiment emerged last century and in 1948 Sri Lanka became fully independent. However, ethnic tensions between Sinhalese and Tamil peoples began to escalate in the 1950s and 1960s. Changes to laws began to favour Singhalese people and exclude the Hindu and Muslim Tamil-speaking population. Riots and general unrest continued throughout the 1970s and a massacre in 1983 led to the start of a civil war that continued until 2009 (BBC News, 2018; Lonely Planet, 2018).

The of the 26-year civil war prevented investment in the renewal and repair of the built environment and transport networks. Consequently, the urban infrastructure was left in disrepair and in

some cases abandoned and obsolete. These buildings, transport and urban infrastructure are referred to as distressed assets. This includes many of the heritage buildings that are of cultural importance (BBC News, 2018; Lonely Planet, 2018).

Transport

Public transport in Sri Lanka consists of trains, buses, tuk tuks, and to a lesser extent, private car taxi and internal flights. Pedestrian traffic is also considered a mode of transport, and this is reflected in Sri Lanka's accessibility regulations. Buildings associated with these modes of transport include stations, bus stops, taxi ranks, and airports. (Democratic Socialist Republic of Sri Lanka, 2006)

Bus and train fleets are from a time when user needs and accessibility were not considered. Buses typically have very high floors accessed by steep steps to the front and side of the vehicle and minimal space internally. Trains have more potential to create space, but floor levels are also high, compared to the platforms. In smaller towns and villages, many stations boarding platforms are absent and the distance between the train floor and the ground is greater.

Public domain

The public domain includes all public spaces and footpaths. In the cities and towns, there are extensive footpaths. In smaller towns and villages, footpaths, sealed or otherwise, are minimal.

Where accessible features are present, they are often inconsistent, or in isolation. For example, in Colombo tactile guiding blocks for people who are vision impaired are present at road crossing points along the Galle Face Green. This is in stark

contrast to the approaches to the Fort Railway Station which is in significant disrepair. Multiple trip hazards, uneven surfaces, steps, and narrow access ways create barriers for people with vision and mobility impairments. These environmental barriers also become barriers to education, employment and essential goods and services.

Public buildings

Public buildings, including transport related buildings, vary in the degree of accessibility they offer. However, there are multiple barriers to overcome because the public spaces were designed decades or centuries ago. Barriers include stepped entrances, unequal steps, lack of handrails, narrow or heavy doors, difficult to use hardware, lack of accessible sanitary facilities, steep ramps, incomplete or missing signage, poor or no lighting, high counters, narrow passageways, poor colour contrast and lack of tactile guiding blocks.

Barriers to inclusion

Substantial discrimination occurs within Sri Lankan society due to the access barriers posed by the distressed asset base. CBM Australia (2018) notes that 39 percent of people with disability have never attended school. The rates of unemployment are higher among people with disability as there is limited access to education and training.

The impact of civil war has resulted in higher rates of physical impairments and mental illness than would be expected in the general population. CBM Australia estimates that 27.6 percent of the population in the conflict areas in the North Eastern province experience severe post-traumatic stress. Landmines and

unexploded ordnance continue to cause injury and death with children accounting for 30 percent of the casualties.

Apart from physical barriers, CBM Australia states that people with disability typically face discrimination and stigma. Superstition about disability as a form of punishment for wrongdoing in a previous life exacerbates the discrimination and stigma.

The barriers to inclusion noted in Sri Lanka's National Policy on Disability are:

- *Environmental and transport accessibility barriers*
- *Communication barriers (sign language, Braille and access to telephone)*
- *Cultural barriers (stigma and superstition)*
- *Assistive devices (and lack of availability)*
- *Societal and family expectations (negative view of helplessness) (Ministry of Social Welfare, 2003).*

Sri Lankan access regulations

The Sri Lankan Government key policy and legislative commitments for accessible public facilities for people with disability are:

- *The Protection of the Rights of Persons with Disabilities Act, 1996, provides protection for people with disabilities against discrimination in employment, education, and access to the built environment (Democratic Socialist Republic of Sri Lanka, 2006).*
- *The Disabled Persons (Accessibility) Regulations were introduced in 2006, with amendments made in 2009*

> *(Democratic Socialist Republic of Sri Lanka, 2006)(Democratic Socialist Republic of Sri Lanka, 2009).*
> - *The United Nations Convention on the Rights of Persons with Disabilities (UNCRPD) was ratified in 2016 (United Nations, 2006).*

The intent of the accessibility regulations to achieve accessible environments is commendable. However, in practical terms, the regulations and regulatory process make this difficult to achieve and compliance levels are low.

The *Disabled Persons (Accessibility) Regulations* 2006, as amended, is the main source of regulatory minimum requirements. Their scope is far reaching covering building design elements, transport conveyances, transport buildings, and public footpaths and road crossings. The Regulations are prescriptive and provided in three languages, but there are minimal penalties for non-conforming design and construction.

Prescriptive regulations are easier to achieve for new construction, with minimal site constraints and to new transport conveyances. Applying prescriptive regulations to a diverse and distressed asset base is another matter – they are frequently difficult to achieve and require many adaptations.

The Regulations also include several conflicting clauses and diagrams, as well as incomplete diagrams and missing dimensions. In addition, errors occurred in the translation between each language version causing further confusion. A pragmatic, informed approach was required.

The challenge was to develop a training workshop to enable participants to work within the constraints of the regulations and the design of built infrastructure to mitigate as many of the

difficulties as possible. Practitioners also needed tools to understand user needs within the design process. A good starting point was the principles of universal design.

Applying universal design

Universal design was the ideal place to begin, not least because of its emphasis on users.   The UNCRPD under article 2, defines universal design as:

> Universal design means the design of products, environments, programmes and services to be usable by all people, to the greatest extent possible, without the need for adaptation or specialized design. "Universal design" shall not exclude assistive devices for particular groups of persons with disabilities where this is needed (United Nations, 2006).

Building on this definition, it was emphasised that:

- *Universal design is NOT another word for designing for people with disabilities because it is focused on all people.*

- *"To the greatest extent possible" means that it is not a Utopian ideal, rather a practical, as well as conceptual approach.*

- *The focus is on mainstream goods, services and environments; not on adapted or specialised.*

- *Design is the emphasis.*

Participants were introduced to the basics of universal design and a general overview of diversity at the beginning of the workshop. This was followed by specific detail on disability to help participants understand why certain design features are important, and to dispel common myths and stereotypes about

disability. For example, a series of slides were shown to demonstrate different levels of vision impairment and how this affects what they can and cannot see. Similarly, for hearing impairment, a series of sound scenarios were played, to illustrate the effect of mild, moderate and severe hearing loss in different environments. The spatial requirements for wheelchair users and people with mobility difficulties were also explained.

Disability was discussed from a bodily impairment perspective so that participants gained a better understanding of the importance of design detail. The difference between the impairment or medical model of disability and the social model was explained and how the medical model creates attitudinal barriers. The importance of the social model was emphasised for creating equitable outcomes for people with disability.

Thinking about all users, not just people with disability encouraged participants to think in more holistic ways and to apply different perspectives to solving design challenges. Discussion about the design standards, the people who benefit, and how to mitigate site constraints for accessible outcomes most of the time provided a better understanding that designs for people with disability are good for everyone, and that universal design requires thought, not cost.

Strategy and prioritisation

It was clear from the brief time in Sri Lanka, was that the scale of the challenge could not be addressed overnight. Strategy and prioritisation would be crucial to achieve universal design outcomes. Further, adopting a universal design approach would allow maximum leverage for the available budget, contributing to sustainable and cost-effective outcomes.

Playing catch-up with investment also allows an opportunity to avoid mistakes and to learn from the journey travelled by other countries towards removing barriers in the built environment. A good example of this is Australian experience of implementing Disability Standards for Accessible Public Transport 2002 (Transport Standards).

The second review of the Transport Standards led to the recommendation of a 'Whole-of-Journey' approach. If a public transport system is to be accessible it needs to factor in all aspects of the journey from home and the return journey. This includes the decision to travel, planning the journey from beginning to end, transport stops and services, interchanges, service disruptions, and supporting infrastructure. Sharing lessons of this type enables participant to achieve outcomes more quickly without a lengthy learning process thereby minimising mistakes along the way (Commonwealth of Australia, 2002; 2017).

Workshop scenarios

To conclude the training, a series of scenarios were devised and divided between groups of participants. Each scenario involved addressing a challenge and identifying user groups, stakeholders, challenges, opportunities, prioritisation, and possible strategies to achieve equitable outcomes. Each group presented their ideas for broader discussion with the whole group. This process showed the importance of community and industry engagement and lively and thought provoking discussions ensued.

With an understanding of universal design participants were able to apply multiple perspectives and understanding to solve design problems and address the key issue of achieving accessibility of

distressed assets. Universal design can, and will, contribute to achieving sustainable and equitable outcomes for the built environment and transport services in Sri Lanka.

References

BBC (2018, February 26). https://www.bbc.com/news/world-south-asia-12004081

CBM Australia (2014). Sri Lanka Disability Information Sheet. https://acfid.asn.au/sites/site.acfid/files/resource_document/SriLanka-disability-factsheet.pdf

Commonwealth of Australia (2002). Disability Standards for Accessible Public Transport. https://www.legislation.gov.au/Details/F2005B01059

Commonwealth of Australia (2017). The Whole Journey: A Guide for Thinking Beyond Compliance to Create Accessible Public Transport Journeys. https://www.infrastructure.gov.au/infrastructure-transport-vehicles/transport-accessibility/whole-journey-guide/guide

Democratic Socialist Republic of Sri Langa (2006). Disabled Persons (Accessibility) Regulations, No.1 of 2006

Democratic Socialist Republic of Sri Lanka (2006, October 25). Protection of the Rights of Persons with Disabilities Act, No. 28 of 1996. Sri Lanka

Lonely Planet https://www.lonelyplanet.com/sri-lanka/history

Ministry of Social Welfare (2003). National Policy on Disability for Sri Lanka.

United Nations (2006). Convention on the Rights of Persons with Disabilities. https://www.un.org/development/desa/disabilities/convention-on-the-rights-of-persons-with-disabilities.html

John Evernden: BSc (Tech) Civil Eng; BAppSc Ecotourism

Over many years John has used his civil engineering background at local government level to help create public domains that consider all aspects of equitable and dignified access for people of all ages, capabilities and backgrounds. His skills also include ecotourism and the sustainability of the natural environment as well as the built environment. John is also an accredited access consultant.

Tactile Street Name Signs: City of Sydney Case Study

John Evernden

Background

Visitors to cities rely on street name signs and other wayfinding cues to navigate successfully. However, cities evolve over time and this leads to haphazard signage and wayfinding cues. Many visitors to a city rely on a smartphone app to guide them around, but there is still a place for the humble street name sign. The City of Sydney embarked on a project to develop street name signs that both sighted and non-sighted people could use. This paper explains the project and outcomes.

Introduction

Street name signs are usually found on posts and walls. They can also be hanging from an awning (Picture 3); or hanging from an overhead structure. Sometimes they are embedded into the footway (Picture 4). Too often, wherever they are, they cannot be found or read by many people, particularly those who have vision impairment. People with good vision are not able to locate or read a street sign if it is poorly located or merges into the background (Picture 5).

Picture 1: A standard pole street sign

Picture 2: Wall mounted sign

Picture 3: A hanging sign

Picture 4: Sign embedded in footway

**Picture 5: Difficult to find or read the King St sign.
Arrow indicates position.**

City of Sydney case study

In 1990, the City of Sydney, a municipal authority in Australia, decided to replace its many different street name signs with a single design, white text on a dark green background. Although the new signs are attractive, many people still have difficulty finding and reading them.

The task was to develop and design a sign that could be found and read by people with low vision or who are blind. But where should such a sign be placed?

Traffic light poles at street intersections are common in most urban areas. Many have a pedestrian push button to activate the "walk" sign when the traffic stops. In Australia, these buttons have an auditory signal – a slow beep for "don't walk", and a rapid beep in conjunction with the "walk" sign.

As most pedestrians know that the traffic signal pole has the push button, it was logical to place tactile signs here as well. Together with the Association of Blind Citizens New South Wales we developed a Braille and tactile sign that could be placed adjacent to the audio-tactile pedestrian button on traffic signal poles.

Several materials were evaluated. Wooden signs were rejected as they are easily damaged. Metal was rejected because metal surfaces can become very hot during a Sydney summer, and people who touch-read cannot afford to burn their fingertips. Plastic was also rejected because it did not provide sufficient tactility for people who read by touch, and because it reflected light which blurred the text for a person who has low vision.

Recycled rubber was becoming popular for many different purposes, and this became our choice of material. To get the

Braille and the raised lettering onto the rubber we needed the reverse of a rubber stamp. Consequently, it was a stamp manufacturer who produced the signs.

The result was black rubber signs with raised gold-coloured street names in upper case Arial Rounded lettering, followed by property numbers. The gold against the black was an excellent colour contrast. The same details were provided in Grade One Braille (left justified).

Picture 6: Black rubber signs with gold lettering

The signs are read from top to bottom, just as we read from left to right across a page. The first number is that immediately behind the reader, and the second number is followed by the letter R or L, to indicate that the second property number is to the right or left of the reader.

In the City of Sydney, the audio tactile buttons always face the footway. Consequently, the black rubber signs were placed adjacent the audio tactile button on the right-hand side of the traffic light poles as the pedestrian faces the kerb.

For more than twenty years, the rubber signs served the City of Sydney well. Eventually the rubber deteriorated in the harsh summer conditions, and the adhesive began to break down. It was time for a review.

A working party was set up with two access consultants, representatives from Vision Australia, Guide Dogs NSW/ACT, Association of Blind Citizens NSW, and People with Disability Australia. The group was guided by internationally renowned sign designer Minale Tattersfield.

The black rubber signs were replaced with aluminium. They were designed with white text on a black background, and the upper case text was replaced with sentence case. All other elements and placement of the original signs were retained. The space below the text allows the addition of QR Codes that can provide directional or community information that can be read by Smart Phones.

Pictures 7 and 8: Black aluminium signs with white lettering

The new signs are also found on the right hand side of the pole as the reader faces the kerb and are read from top to bottom. Pictures 7 and 8 show the signs at each end of a city block. Picture 7 Reads, "York Street 14 – 26L". This means the property number 14 is directly behind the reader and the property number 26 is to the reader's left. Similarly, Picture 8 reads "York Street 26 – 14R". This means the property number 26 is immediately behind the reader and number 14 is to the right.

Signs are fixed to traffic signal poles, at a standardised height approximately 1000 mm above the footway, with the mid-length of the sign level with the audio-tactile button. This height allows the signs to be read at close range by people with low vision, and touch-read by people who read raised lettering or Braille.

The City of Sydney erected two thousand of these Braille and tactile street name signs on traffic signal poles at pedestrian crossings. Although the signs were originally designed for people who are blind or vision impaired, it was discovered that they also provide independence, convenience and dignity for many others. For example:

- *Older citizens whose sight has deteriorated, and those who have lost stature are easily able to find the signs at a convenient height and location. As we age we realise how much we have relied on 'landmarks' to assist our orientation. Over time, 'landmarks' such as recognizable buildings disappear or alter in appearance, but street names generally remain the same. So, locating a familiar street name provides comfort and avoids disorientation.*

- *People who are deafblind have very few cues in the public domain to allow them to navigate a path of travel without having to rely on personal assistance. Some depend heavily on 'touch' to inform their surroundings. These easily accessible Braille and tactile signs provide important guidance.*

- *People who have a speech or hearing impairment who may not be able to ask for directions or hear the reply.*

- *The height of the signs enables children, people of short stature and people who use a wheelchair to find their location.*

- *People who have a cognitive disability such as dementia or acquired brain injury are reassured when they recognise a familiar street name.*

- *As Braille is an international form of reading, visitors from anywhere in the world who read Braille can find their way around the City of Sydney.*

The signs are intuitive, accessible, equitable, easy to find, easy to read and readily available to everyone. They embody the 7 Principles of Universal Design (1997) and meet all 8 Goals of Universal Design (2012).

Standardisation is a key element in navigation for people who have a sensory, cognitive or physical impairment. As the format of the Braille and tactile signs is standardised, and as they are always fixed at a standard height and location, the design could be adopted by cities anywhere in the world.

Conclusion

Smartphone apps such as Google maps assist many people to get around a city. However, not everyone has a smartphone and internet connection. In addition, Wi-Fi connection can be erratic especially in the vicinity of tall buildings. Wayfinding apps and other devices are also available for people who are blind or have low vision. However, these rely on pairing with digital ambient technology. The City of Sydney project shows that universally designed street name signs still have a role to play in helping people navigate a city independently. The signs are reliable, constant and consistent, and give city pedestrians the confidence to navigate city streets with ease.

References

North Carolina State University(1997). The Principles of Universal Design.

https://projects.ncsu.edu/ncsu/design/cud/about_ud/udprinciplestext.htm

Steinfeld, E., & Maisel, J. (2012). Goals of Universal Design.
http://www.buffalo.edu/access/help-and-support/topic3/GoalsofUniversalDesign.html

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Opportunities to support social inclusion for people with intellectual disability at a local level

Dr Phillippa Carnemolla

Abstract

Local government is a tier of Australian government responsible for public administration within a geographically-localised area. The role of local government authorities (councils) is increasingly expected to extend beyond being a service provider, to showing community leadership.

Embedded within the local community, councils are well placed to lead the wider community towards social inclusion. For this reason, an inclusive research team at the University of Technology Sydney (UTS) undertook a project to explore ways of building the capacity of councils in Australia to include people with intellectual disability in all aspects of everyday life. The research team also investigated the level to which councils engage and include people with intellectual disability across community and civic life.

The research team included people with intellectual disabilities as core team members as well as co-facilitators of the research activities. Nine focus groups were conducted with forty-five people with intellectual disabilities from six different council areas across two states of Australia (New South Wales and Victoria). The World Health Organization's (WHO) Age Friendly Cities 8 domains framework (2007) was used as a framework for data analysis and identifying opportunities for change.

The study was designed to demonstrate the value of engaging with people with intellectual disabilities and found that they are

able and willing to contribute. However, they are rarely asked their opinions about their experiences in the local community.

Keywords: Intellectual disability, social inclusion, research methods

Overview of the method

Recruiting, preparing for and facilitating focus groups by and with people with intellectual disabilities required attention to be given to the design of all communication materials, as well as the structure and the delivery of the focus groups. The participants came from metropolitan and rural areas of New South Wales and Victoria.

All participants had lived experience of intellectual disability and resided in the local area where the focus groups were conducted. The participants were given the option of either participating in a one-to-one interview or a focus group and all participants, except for two,

Everyone with an intellectual disability was welcome with no limitations or boundaries set on communication requirements, such as whether they needed to be verbal or non-verbal. Of the 45 participants, 43 communicated verbally and 2 participants used alternative communication methods to contribute to the discussions, accompanied by a known support person.

What the research asked

The purpose of the study was to understand the perspectives of people with intellectual disabilities on their local community, with a focus on council services, public places and personal

experiences in the local community. The research was driven by the following research questions:

- *What do people with intellectual disabilities know about councils and what they are responsible for?*

- *What types of local places or services and facilities are utilised and valued by people with intellectual disabilities in their local area?*

- *How do people with intellectual disabilities experience the range of services and facilities offered by their council?*

- *What types of improvements to local services and places do people with intellectual disabilities want to see?*

The research questions were framed in everyday language with the key question "What if you do if you were boss of your local council?" This question encouraged participants to talk about themselves and what they wanted in their local community. They were also asked about what they like to do and where they like to go.

What the research found

People with intellectual disability have valuable information to share with councils. However, they are excluded from social and civic interactions and consequently, their needs and preferences are not understood or implemented. Grouping people with intellectual disability under the generic term "people with disability" risks leaving them out unless communication and engagement strategies are made more accessible. Briefly, the research revealed that people with intellectual disability want their council to:

- *Provide accessible information (in a range of formats) about what is happening in the community and how to participate*

- *Provide someone to speak to – or even better, face to face contact*

- *Employ people with intellectual disability*

- *Find ways for people with intellectual disability to feel safer and more welcome in the community*

- *Get to know local people with intellectual disability*

- *Help people with intellectual disability to access better transport*

- *Improve public toilets and safer pedestrian crossings*

- *Offer quiet spaces at noisy, busy events*

Unfortunately, people with intellectual disability continue to be excluded from many aspects of community life and civic decision making. Intellectual disability is less visible than other forms of disability. By speaking with people with intellectual disability and respective councils, this research found there are many opportunities for improvement. Some require specific funding, but there are also opportunities for improvements by just taking a different approach. People with intellectual disability should be able to take their rightful place as equal citizens of all communities. Consequently, some changes are necessary.

A framework for analysis and change

The World Health Organization's (WHO) Age Friendly Cities framework is a useful tool for assessing the needs of any marginalised group at the urban scale and at local government level. It also worked well as a framework for reporting the findings of the research in this case.

The eight domains of the WHO framework are: Outdoor spaces and buildings; Transportation, Housing, Social participation, Respect and social inclusion, Civic participation and employment, Communication and information, and community and health services. Councils do not have direct control of transportation, housing or health services. These are the responsibility of state governments. However, they can advocate for improvements.

Outdoor spaces and buildings were a key topic in all focus groups. Lack of accessible facilities, wayfinding and navigation were of particular concern. Street signs were in the wrong places or not making sense to participants. Availability of clean toilets prevented some from going to parks and other places.

Although transportation is not a council responsibility, accessible transport infrastructure and services were an issue for most participants. Also, participants did not feel safe using public transport.

Housing is also outside the remit of councils but once again, lack of accessible and affordable housing was discussed in the focus groups.

In terms of social participation, participants wanted to have events were friendly and where they could meet nice people. This desire highlights how excluded and poorly people with intellectual disability feel in the community.

Related to social participation, the domain of respect and social inclusion was of particular concern. Participants did not feel welcome or safe everywhere in their local community. A change in attitude towards people with intellectual disability is sorely needed. For example, shop staff needs training to help people

with intellectual disability to complete a shopping task without making them feel as if they don't count or pushed away.

When it comes to communication, the message from people with intellectual disabilities is diversity and flexibility. What this means is providing a range of communication types and pathways to accommodate individual preferences (email, telephone, direct person-to-person, texting, etc.).

Councils are required to develop and update disability action plans. However, council community consultations for these plans do not include people with disability and consequently their voices are left out of civic affairs which mean nothing changes for them.

Council staff are generally trained to help people with various disabilities, but it seems less so for people with intellectual disability.

Summary

People with intellectual disabilities who participated in this research highlighted that practices that influence inclusion span not only the physical accessibility of space, but inclusive communications and social inclusion.

Participants want to know what is available and how to get around the community. The role of place and space in supporting people to feel safe, socially connected and included was a strong theme in the data. Public spaces, such as train stations, were physical places where people often did not feel safe. Conversely, the participants said they enjoyed visiting their local café and regularly seeing people they knew. They often had favourite shops and locations where there were familiar faces and people who they could chat with and stay for a while to chat and feel happy.

For some participants, this was a café, for others, it was the local pool or shopping centre.

The results from the focus groups indicated that the information people valued most included knowing about community events, to know where there are safe, physically inclusive places to go, and how to get around their community. They also want respectful encounters with people in the community. Currently, they find people are impatient, unkind or unfriendly.

By adopting the 8 domains of the WHO Age Friendly Cities framework for action, councils can improve the participation of people with intellectual disability. It also provides a framework for community consultations.

This study shows that people with intellectual disabilities aspire to contribute to their local community and can add value and perspectives to the progression of inclusive practices and environments. It also shows that people with intellectual disability can build confidence through their participation in research projects and community engagement activities provided there is peer support and validation of their views.

Given our findings about safety and respect in public space, there is an opportunity to further research how the designs of built environments impact community attitudes and behaviours from a social inclusion, respect and well-being perspective.

This research study forms part of a wider project designed to enhance the capacity of councils in Australia to include people with intellectual disabilities in all aspects of citizen life. For further information on this study see "**If I Was the Boss of My Local Government**" and "**Towards inclusive cities and social sustainability**".

References

Carnemolla, P., Kelly, J., Donnelley, C., Healy, A., & Taylor, M. (2021). "If I Was the Boss of My Local Government": Perspectives of People with Intellectual Disabilities on Improving Inclusion. Sustainability, 13(16),   9075.
https://www.mdpi.com/2071-1050/13/16/9075

World Health Organization, Global Age-friendly Cities: A Guide (2007).
https://apps.who.int/iris/bitstream/handle/10665/43755/9789241547307_eng.pdf?sequence=1&isAllowed=y

Carnemolla, P., Robinson, S., & Lay, K. (2021) "Towards inclusive cities and social sustainability: A scoping review of initiatives to support the inclusion of people with intellectual disability in civic and social activities". City, Culture and Society, Vol 25,

https://doi.org/10.1016/j.ccs.2021.100398

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The persistent problem of ageism in the cause of inclusive ageing

Professor Philip Taylor

Abstract

Ageism is often expressed as a phenomenon of older adults, but it can also apply to younger people. Stereotypes of older adults have emerged in the quest to overcome ageist attitudes. These include pronouncements about characteristics of older adults such as wisdom, reliability, and being more productive. However, the evidence does not support these claims. The issues are more complex and intersectoral and are less about age and more about other characteristics. To counter the current discourse, five interrelated principles are proposed for the basis of an evidence-based advocacy on ageing and work.

Keywords: age discrimination, age stereotypes, older workers

Introduction

In many nations much public policy and advocacy is presently focused on prolonging working lives in response to ageing populations. While older people's employment has not solely been considered through an age discrimination lens this issue has received much attention. Reports regularly conclude that age discrimination is commonplace, and the phenomenon is primarily associated with older ages.

In Australia, advocacy has emerged in the cause of overcoming age discrimination but much of this is ageist. To illustrate, in a speech titled *The Economic Impacts of Ageism* given by Emma Dawson of social policy think tank Per Capita at an event organised by leading Australian advocacy organisation Council on the Ageing in 2019, she refers to ageism as being an "entrenched and widespread prejudice", stating that the 'root of the problem can be found in the dominant narrative in our political and social discourse that frames ageing as almost entirely a negative experience'. She explains that 'many older people want to keep working but are shut out of the labour market due to ageism in the workforce'. Yet, she claims elsewhere in her speech that "repeated studies, both here [Australia] and overseas, have shown that older workers are more productive (they are less likely to spend time at work on Facebook!), more reliable, less likely to leave their jobs every two to five years, and bring experience and complex problem solving abilities to the workforce that have taken years to develop".

In evaluating these comments, it is important to consider critiques of research and advocacy concerning issues of age and work. Firstly, the logic of *age* equality would seem to preclude an especial focus on older people and standard definitions consider that ageism can be experienced at any age. From such a standpoint the age advocacy outlined above might be considered overtly ageist. Furthermore, disregarding experiences of age discrimination or arguing that it is widespread may be considered ageist if contradicted by the evidence. And research indicates that the health of those experiencing ageism or age discrimination may be adversely affected. So, what does the evidence have to say about older workers' productivity, experiences of ageism and how best to make the case for their employment?

Are older workers more productive?

Puzzlingly, age stereotypes are often presented as facts about older workers' capabilities. So-called business cases for older workers promoted by advocates regularly make reference to their supposed greater loyalty, reliability and experience compared to younger people. But commentators have warned against lessening the impact of diversity messaging by legitimising the use of age stereotypes.

Also, such arguments do not have a solid basis in evidence. Research indicates that the relationship between age and job performance is complex. Further and perversely, it seems that the very arguments put forward for employing older workers - that they are more committed, loyal and experienced - may risk confirming manager perceptions that they are unsuited to modern workplaces. Consequently, even disregarding the ageist overtones of present 'age' advocacy, articulating a business case for older workers is not easy.

Are older workers vulnerable?

Is age discrimination widespread and ongoing? It seems not. Advocates often quote from a survey commissioned by the Australian Human Rights Commission (AHRC) which found that approximately a quarter of older people report experiences of age discrimination (but notably not that three quarters do not) but other national surveys have found that the incidence of perceived age discrimination against older workers is lower than this and perhaps declining.

What of the notion that age discrimination is a phenomenon only or mostly experienced by older people? Again, evidence suggests

otherwise. Research indicates that while older jobseekers are more likely to experience age discrimination, it is younger people who are more likely to experience it in the course of their employment.

Why does this matter?

In recent times in Australia a fake age advocacy has emerged that makes unsupported claims in the face of contradictory evidence, uses empirical research selectively and lacks sound conceptual underpinnings. Its intentions appear ideological rather than to accurately inform public debate and as such might be considered to be akin to a form of propaganda. In such advocacy ageism and age discrimination are narrowly conceived, misunderstood and inaccurately described, operating to the detriment of both younger and older people.

What can be done about it?

Five interrelated principles should form the basis of an evidence-based advocacy on ageing and work. The first concerns the role of advocacy in informing public understanding. To illustrate, inflated claims regarding the prevalence of age discrimination may have seeped into the public consciousness, perversely to the detriment of efforts to prolong working lives. For instance, according to research perceptions of ageism in society are a commonly reported reason for retirement.

Second, instead of drawing on stereotypes a more effective advocacy may be constructed on a foundation of age neutrality, that questions the relevance of age for employment decisions, overcoming the problem of advocacy being open to accusations of ageism, and consequently of muddling the public discourse. The

present advocacy standpoint also risks older people being mistrusted, considered irrelevant and deemed only suitable for roles requiring 'traditional' skills.

Third, whatever a person's age, it is how the multiple aspects of their identity intersect that impacts on how they experience inclusion and exclusion at work. Age discrimination, thus, may be experienced differently by workers of the same age depending on the context. To meaningfully address age-related issues a range of other factors must also be taken into account.

Fourth, older and younger workers are more accurately viewed as complements than competitors but there is a popular view that lowering unemployment among younger people will be achieved by older people getting out of the way, even among the latter's advocates. Thus, according to older people's advocacy organisation National Seniors Australia recently in response to the economic downturn caused by the global pandemic, early retirement 'would potentially free up some of the jobs that could go to younger workers or workers in their 50s struggling to find employment. Maybe even reduce the official unemployment figures, at a time when it's heading skyward!'. Yet, according to economists, in terms of jobs there is no pie that must be equitably distributed. Labour markets do not work like that.

Fifth is the discarding of the traditional three phase notion of the lifecycle (education, work and retirement) instead encouraging a more diversified, flexible and dynamic life pattern. Such an approach would move beyond policies centred on certain phases of life or certain age groups, by introducing a global approach, offering individuals rights and resources that make them the authors of their own life courses.

In acknowledging that age inclusivity is an issue for people of all ages, not only for older people, a better approach might involve commencing a generational dialogue concerning the causes of ageism and how it can be overcome. This is particularly important during a period of unprecedented economic and social upheaval, when rates of youth unemployment rose dramatically in many countries in 2020 and there is considerable current public debate concerning the societal value of older people. At this time, it is critical that age advocates get their messages straight. For more information on Philip Taylor's work see, "The enduring myth of endemic age discrimination in the Australian labour market". doi:10.1017/S0144686X21001112.

References

Australian Human Rights Commission (AHRC) (2016) Willing to Work. National Inquiry into Employment Discrimination Against Older Australians and Australians with Disability. Sydney: AHRC *https://humanrights.gov.au/our-work/disability-rights/publications/willing-work-national-inquiry-employment-discrimination*

Dawson E (2019) The economic impacts of ageism. Speech to the COTA Australia National Policy Forum, National Press Club, Canberra, June. Available at *http://percapita.org.au/2019/06/17/speech-the-economic-impacts-of-ageism/*

Ryan S (2016) Why Recruiting Mature Age Workers Makes Good Business Sense. Available at *https://blog.jobactive.gov.au/why-recruiting-mature-age-workers-makes-good-business-sense*

Taylor, P and Earl C (2016) The enduring myth of endemic age discrimination in the Australian labour market. Ageing and Society, 1-10. *doi:10.1017/S0144686X21001112.*

Letter from the Chairman's Desk

By Sunil Bhatia PhD

One day I noticed that the local authority started a drive against dengue mosquitoes and a person was carrying a fog- gun at the bicycle carrier was moving lane by lane. Fumes were spreading in my house and I realized the breathing problems. It immediately made me think about designing fumes? The role of fumes came into existence when our ancestors understood the proper management of fire. The first problem of learning the management of fire was generation by rubbing stone or carries via dry tinder or log. As the ignition problem was solved the next challenge was management of smoke that controlled the life of the fire. Observation made them think of an outlet of smoke otherwise fire will extinguish by its own. The role of smoke was known from the learning of fire management but various applications came later. Smoke has an inbuilt character that spreads everywhere in the air wherever the density is low, lost presence by mixing into the air, and turns transparent as air. Another is it reduces visibility. The more thick smoke, the lower the visibility. Topmost character of the smoke is that it presence in air lower the oxygen level and suffocates , creates breathing problem and even high presence can kill the person or extinguishes fire. Forest fire is controlled by igniting fire from opposite where in the direction fire is forwarding for creating an envelope of smoke in the air for blocking the supply of oxygen for

the fire. In the Second World War, gas chambers were designed for mass murder.

I remembered that honey hunters carry the fire torch for generating thick fumes and keep close to beehives. Suffocation due to fumes makes the soldier bees run away from the hives and that moment they break for taking out stored honey. Even our primitive people used the fumes for hunting and used smoke for prey come out from hideous place in the cave or hole in the ground where there was a possibility of living prey . The suffocation due to the presence of carbon that block the supply of oxygen made breathing difficult for prey and came out from such conditions for life and at that moment people killed the hiding prey with weapons.

One day I was sitting in a hotel with some guests and noticed that other table customers was served with charcoal smoked food in a piping hot way and smoke was coming out of the tray in which food was served. Here the scent of smoke was used for enhancing the taste of the food. A potter was using smoke for coloring the outer surface by giving a different texture to his designed pots. When infantry army advances for enemy territory , they use fogging tools for creating a curtain for invisible to enemy.

I am thankful to *Dr Jane Bringolf, BSSc, MBA, PhD, Churchill Fellow* for making such a great effort in a very short time for the special issue of October 2021 Vol-16 No-10. Her commitment and zeal is clearly reflected in this special issue.

Lambert Academic publication for celebration of 150th special issue by publishing a book by compiling editorials "Design For All, Drivers of Design" translated in eight different languages from ENGLISH into French, German, Italian, Russian, Dutch and

Portuguese.   Kindly   click   the   following   link   for   book.
 "Morebooks", one of the largest online bookstores. Here's the link
to it:

https://www.morebooks.de/store/gb/book/design-for-all/isbn/978-613-9-83306-1

With Regards

Enjoy reading, be happy, and work for the betterment of society.

Dr. Sunil Bhatia

Design For All Institute of India

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Tel 91-11-27853470®

Forthcoming Issues

November 2021 Vol-16 No-11

***Prof. (Dr.) Mandeep Singh** is presently Head Industrial Design (second tenure), former Dean (2015-17) and has held position of Head Architecture (2017-19, 2014-15) Head Urban Design (2011-14) Industrial Design (2005-10). He is full time faculty in SPA Delhi since 1986. His PhD topic Seismic Conscious Architecture resulted in Evaluation Tools for Architects, which an architect can use to evaluate built form in absence of an engineer with seismic considerations.*

In addition to teaching since last 34 years and guiding many design and research projects, he has designed many buildings, Urban Design and Industrial Design projects. He won many design awards notable being part of team member which won First Prize

of Urban Design of GGSIPU University, first prize of HUDCO competition of low cost housing etc.

During his tenure in Industrial Design program as Head (2005-11), he has worked with students on many design assignments especially on issues related to common man notable areas being Design for Elderly, Design for Physically Challenged, Design for Safety and Security, Energy Efficient Products etc.

He was also been invited/organized following conf./workshops, notable being Indian Design Council program at Tokyo, Japan, Planned and Exhibited students work of SPA in Venice Biennale, organized many other exhibitions of students of B.Arch and M.Arch (I.D.) in SPA.

He has been consultant, advisor and peer reviewer to many public and private sector, notable being World Bank, NDMA (on Architecture curriculum), CPWD (Rajghat, C Hexagon), Shri Mata Vaishno Devi Shrine Board, Reliance Infrastructure, advisor to Ministry of Defence for National War Memorial Competition, Selection and suggestion committee of Republic Day Tableaux (2019-21),Competition Commission of India, Basmati Export Development Foundation, Golchha Organization (Nepal) are among few notable ones. He was also associated by Bureau of Police Research and Development (BPRD) for creating identity of Police Station and conducting architectural competition.

Due to his vast experience of designing many projects, recently he has also associated with clients in selection of architects and advisor for various projects which include hotel, hospital and industrial projects. He has also been invited as jury member in selection of architects. Ranchi High Court is one such example. He is also associated with other academic institutes as member board of studies, faculty selection, jury member etc.

He has also written many papers for National and International Conferences, notable being Multidisciplinary approach to earthquake engineering in 7NCEE at Boston and Public Transportation for Elderly and Disabled - Transed 2007 at Montreal, and Habitat Earthquake and Reconstruction at World Congress on Natural Disaster Mitigation, in addition to co-author of papers with Phd scholars (list is enclosed). In addition to Six PhD scholars he is guiding, four of the scholars guided by him have been awarded Phd.

Major Projects:

Prof. Mandeep Singh has been involved in institutional consultancy work of SPA as project in charge. The important projects include, Lawn 5 & 6 of C-Hexagon, Rajghat development, Urban Design proposal of Vaishno Devi shrine, Design of DurgaBhawan, Yatri management at Bhawan and Bhairon proposal at Vaishno Devi, Urban Design proposal for Nursing college for shrine board, institutional building for National Institute of Open Schooling (NIOS) headquarter building in Noida, factory for Machino Polymers and interior for SFAC and National Horticulture Board.

Africa Origin Designer year 2021
December 2021 Vol-16 No-12

Ricardo Gomes, IDSA

Professor Ricardo Gomes has been a faculty member in the School of Design at San Francisco State University for over 29 years. He was the Chair of the DAI Department from 2002-2012.

Prof. Gomes coordinates the Design Center for Global Needs and the Shapira Design Archive Project in the School of Design (DES).

This non-profit international research and development center is dedicated to promoting responsive design thinking methods and solutions to local, regional and global issues such as: inclusive/universal design, health care, the aging, community development, social innovation and sustainability of the built environment.

Prof. Gomes was awarded the 2020 Faculty Award for Excellence in Service Learning, from the Institute for Civic and Community Engagement, SFSU; and the IDSA 2020 Education Award presented in recognition of significant, distinguished, and long-term contributions of faculty to the field of industrial design academia

Prof. Gomes is on the Board of Directors of the Institute for Human Centered Design in Boston. He is also a member of the Industrial Designers Society of America; and Trustee of the Beta Beta Chapter, Epsilon Pi Tau International Honor Society for Technology in the School of Design, SFSU. Prof. Gomes was a Fulbright Research Scholar from 1984-1986 at the University of Nairobi,

Kenya. He conducted post-graduate research and product development of a container system for mobile health care delivery in East Africa from 1982 – 1987. In 1986, he was Program Coordinator of Design Projects in Developing Countries, Les Ateliers, Ecole nationale supérieure de création industrielle (ENSCI) in Paris, France where he directed student liaison projects with European international development agencies.

For over 30 years, Prof. Gomes has conducted keynote speeches, presentations, symposiums and workshops at universities and international conferences throughout Africa, Asia, Europe, Latin America and the U.S. In addition, he has served on juries related to Inclusive Design; Universal Design; Design for Social Responsibility; Sustainability; and Equity for BIPoC in the Built Environment.

Prof. Gomes received his MFA in Industrial Design for Low-Income Economies from the University of California, Los Angeles (Design of a Container System for Mobile Health Care Delivery in East Africa). He received an M.A. in Architectural Building Technology from School of Architecture and Urban Planning at UCLA (Analysis of Alternative Building Materials and Construction Systems for Small-scale Industries in the Cape Verde Islands, West Africa); and a BFA in Industrial Design from Massachusetts College of Art (Design of an Adaptive Structural Environment for Severely Disabled and Developmentally Challenged Children).

January2022 Vol-17 No-1

Doctor in Engineering with cum laude honors, with more than 30 years' experience working in the field of accessibility. From 1990 to 2000, I was as an accessibility consultant specializing in protected natural areas. On 2000, I was appointed General Director and CEO of accessibility consultant company, Via Libre, until 2003 when I became Director of Universal Accessibility and Innovation Directorate at Fundacion ONCE to present. I am currently vice president of the European Network of Accessible Tourism (ENAT), president of the technical standardization committee 170 for Universal Accessibility and Design for All, and a trustee of three foundations working in accessibility. I have also been a jury member of the following awards: Access City Awardsfrom its first edition to present, Queen Letizia Awards, Fundación Universia Innovation Awards and OTIS Accessibility Awards. Additionally, I have been Project Leader of several standardization working groups about accessibility such as European Commission Mandate 420, Accessibility Requirements for Public Procurement and ISO 21902 Accessible Tourism. Moreover, I have been dissertation director and a member of the examination committee for more than ten doctoral dissertations, co-author of over 80 research papers and publications, and have travelled to more than 30 countries to participate at conferences a guest speaker. I have also received additional training at some of

the most prestigious universities such as Polytechnic University of Madrid, Stanford University, London School of Economics and IESE

February 2022 Vol-17 No-2

Colleen Kelly Starkloff, Founder
Starkloff Disability Institute

Colleen Kelly Starkloff is co-founder, with her husband Max, of the Starkloff Disability Institute. During the 1970's, she co-founded Paraquad, Inc. in St. Louis in conjunction with Max.

Ms. Starkloff has worked in the field of disability rights since 1973. She has extensive experience educating and training the disabled and non-disabled communities on issues related to employment of people with disabilities, independent living; developing new program initiatives; and coordinating activities that promoted the successful implementation of the Americans with Disabilities Act (ADA). She served two terms as the United States Organizer of the Japan/USA Conference of Persons with Disabilities. In 1999, she joined a citizens' advocacy group responsible for the establishment of the Affordable Housing Commission in the City of St. Louis, which oversees a $5M Affordable Housing Trust Fund. She ensured that housing created by the Trust Fund must include Universal Design features. She served as Founding Chair of the Commission. She is the creator

and Organizer of 6 national Universal Design Summits which train architects, designers and builders on uses and benefits of Universal Design in home and community design.

In 2005 she introduced Disability Studies into the curriculum at Maryville University and also taught a course on Universal Design in 2010. From 2005-2010 she collaborated with the Missouri History Museum to create a 1,000 square foot exhibit focused on Disability History. Titled "The Americans with Disabilities Act: Twenty Years Later", this exhibit remained open and free to the public for 19 months. An estimated 163,000 visitors saw this exhibit. In 2011 she established the Max Starkloff Speaker Series, to educate the public on the need to create a world that welcomes all people with disabilities. In 2011 she was presented a Doctor of Humane Letters by Fontbonne University. In 2013 she began consulting and training on issues related to employment of people with disabilities in mainstream, competitive jobs. In 2014 she was responsible for organizing advocacy efforts in Missouri to encourage Senate ratification of the Convention on the Rights of Persons with Disabilities.

In 2016 she began a new venture, "Colleen Starkloff Talks Disability", as a public speaker on disability issues. A university Commencement Speaker, and general speaker, Ms. Starkloff is sought after to speak nationwide on a variety of subjects related to employment of people with disabilities, disability history, the Disability Rights Movement, Independent Living and the emancipation of all people with disability. A 1993 graduate of Coro's Women in Leadership Program, she has won numerous awards for her work in the Field of Disability. She is also a St. Louis "Woman of Achievement" for 2017. (Watch the award ceremony here.) She was awarded an Inspire Award by the BiState Development Agency in 2018. In 2019, she received the

Saint Louis University Alumni Merit Award for the Doisy College of Health Sciences.

Her life story is captured in Max Starkloff and the Fight for Disability Rights, a biography about her late husband. The book is available in print, at the Missouri History Museum and as an ebook through Amazon.com; An audible book can be downloaded at Audible.com.

New Books

Sunil Bhatia

Design for All

Drivers of Design

Expression of gratitude to unknown, unsung, unacknowledged, unnoticed and selfless millions of heroes who have contributed immensely in making our society worth living, their design of comb, kite, fireworks, glass, mirror even thread concept have revolutionized the thought process of human minds and prepared blueprint of future. Modern people may take for granted but its beyond imagination the hardships and how these innovative ideas could strike their minds. Discovery of fire was possible because of its presence in nature but management of fire through manmade designs was a significant attempt of thinking beyond survival and no

doubt this contributed in establishing our supremacy over other living beings. Somewhere in journey of progress we lost the legacy of ancestors in shaping minds of future generations and completely ignored their philosophy and established a society that was beyond their imagination. I picked up such drivers that have contributed in our progress and continue guiding but we failed to recognize its role and functions. Even tears, confusion in designing products was marvelous attempt and design of ladder and many more helped in sustainable, inclusive growth.

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it is available on **www.morebooks.de** one of the largest online bookstores. Here's the link to it:

https://www.morebooks.de/store/gb/book/design-for-all/isbn/978-613-9-83306-1

The Ultimate Resource for Aging in Place With Dignity and Grace!
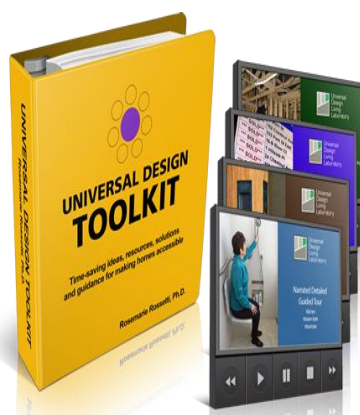
Are you looking for housing options that are safer and more accommodating for independently aging in place? Do you want to enjoy comfort, accessibility, safety and peace of mind – despite your disabilities, limitations and health challenges? The help you need is available in the Universal Design Toolkit: Time-saving ideas, resources, solutions, and guidance for making homes accessible.

This is the ultimate resource for individuals and professionals who want to save time, money and energy when designing, building, remodeling or downsizing a home. The Universal Design Toolkit will help you take the steps to design homes for your clients or yourself while eliminating the costly trial and error challenges you'd inevitably encounter if faced with this learning curve on your own.

Rosemarie Rossetti, Ph.D., teamed with her husband Mark Leder in creating this unique Toolkit. They bring ten years of research, design and building expertise by serving as the general contractors for their home, the Universal Design Living Laboratory– which is the highest rated universal design home in North America.

Within the Toolkit's 200 richly illustrated pages, you'll find: Insights that distinguish *essential* products, services and resources from the *unnecessary*.

Proven, realistic tips for finding the right home.

Home features you need to look for. Nothing is assumed or left out.

Handy home checklists and assessments.

Interview questions to help you hire industry professionals with knowledge and experience.

Photographs that provide a frame of reference to inspire, clarify and illuminate features andbenefits.

Valuable resources to save you time, money and energy.

Helpful sources of funding.

Space planning dimensions for access using assistive devices such as wheelchairs andwalkers.

And so much more!

If you want useful, dependable advice and easy to implement ideas from respected experts who know the ropes, you'll love Rossetti and Leder's perspective. As a speaker, author and consultant who uses a wheelchair, Rossetti has helped hundreds of people design their ideal homes. Now her comprehensive Toolkit is available to help and support you!

Get the Universal Design Toolkit now to start your project!

Disability, Rights Monitoring and Social Change:

New Update: ELIVIO BONOLLO (2015/16) PRODUCT DESIGN: A COURSE IN FIRST PRINCIPLES

Available as a paperback (320 pages), in black and white and full colour versions (book reviewed in Design and Technology Education: An International Journal 17.3, and on amazon.com).

The 2018, eBook edition is available in mobi (Kindle) and ePub (iBook) file versions on the amazonand other worldwide networks; includingon the following websites:

ePubversion:www.booktopia.com.au

https://www.booktopia.com.au/ebooks/product-design-elivio-bonollo/prod9781784562946.html

mobi (Kindle versions):www.amazon.in

https://www.amazon.in/Product-Design-Course-First-Principles-ebook/dp/B07FNV2F4L/ref=sr_1_1?ie=UTF8&qid=1532999395&sr=8-1&keywords=Product+Design%3A+A+course+in+first+principles

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READING HINTS: ePub files can be read with the iBook app on Apple MacBook/iPad devices; ePub files can also be read on Desktops PCs, Laptops and Surface devices using readers such as the Microsoft *freda*ePub reader. The Kindle (mobi file) reader isflexible and suitable for reading the eBook on PCs; Kobo readers can also be used to read ePub files on MacBook and iPad. All formats are very interactive with very good navigation.

DEBRA RUH

INCLUSION

BRANDING

Revealing Secrets to
Maximize ROI
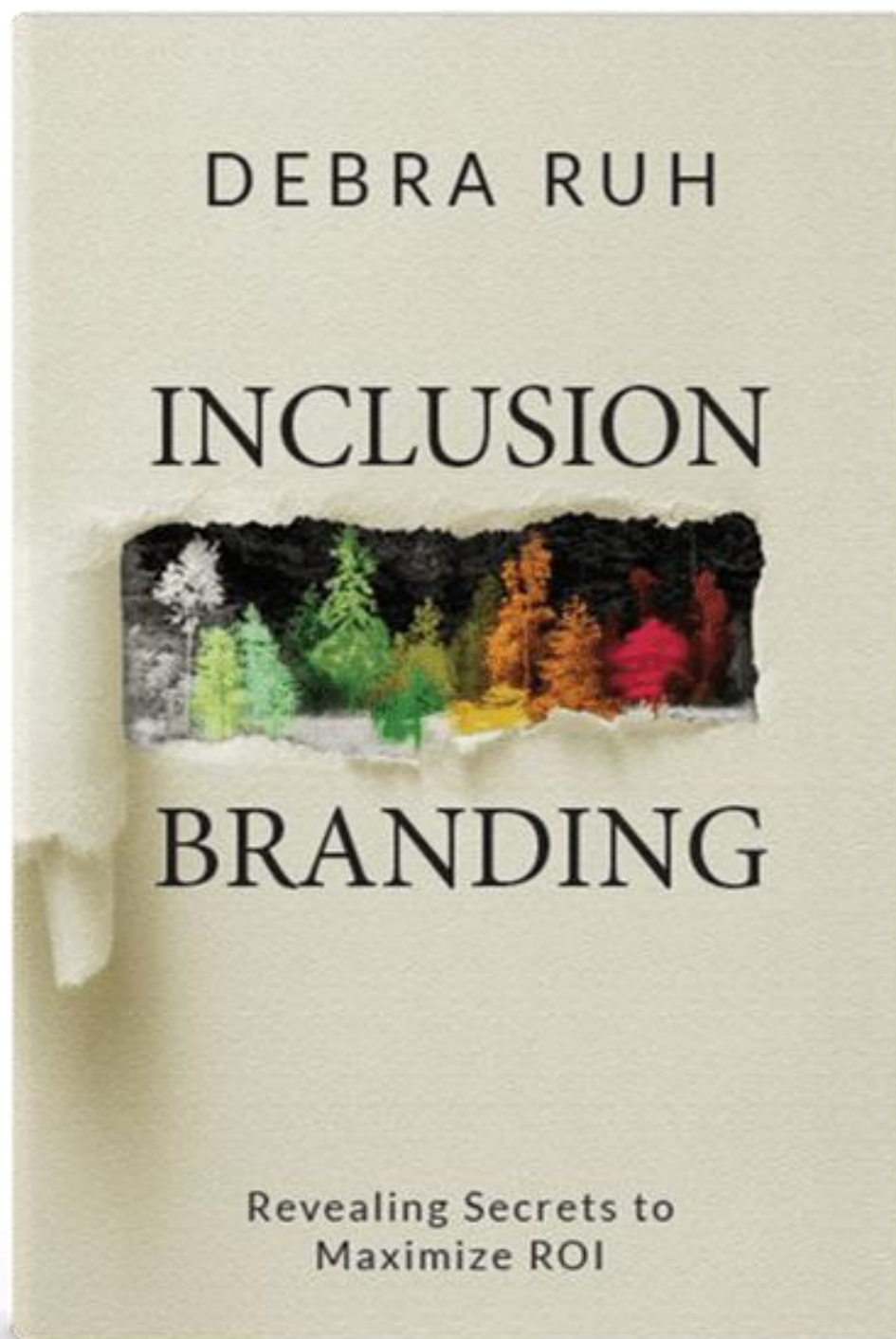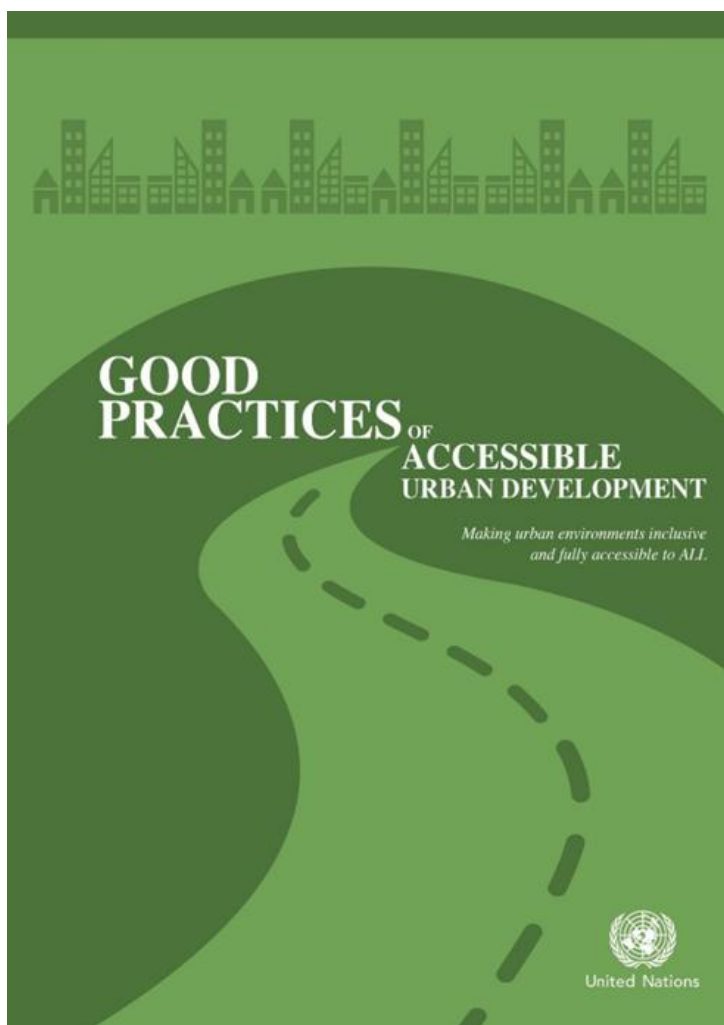
In light of the forthcoming United Nations Conference on Housing and Sustainable Urban Development (HABITAT III) and the imminent launch of the New Urban Agenda, DESA in collaboration with the Essl Foundation (Zero Project) and others have prepared a new publication entitled: "Good practices of accessible urban development".

The publication provides case studies of innovative practices and policies in housing and built environments, as well as transportation, public spaces and public services, including information and communication technology (ICT) based services.

The publication concludes with strategies and innovations for promoting accessible urban development.

The advance unedited text is available at:http://www.un.org/disabilities/documents/desa/good_practices_urban_dev.pdf
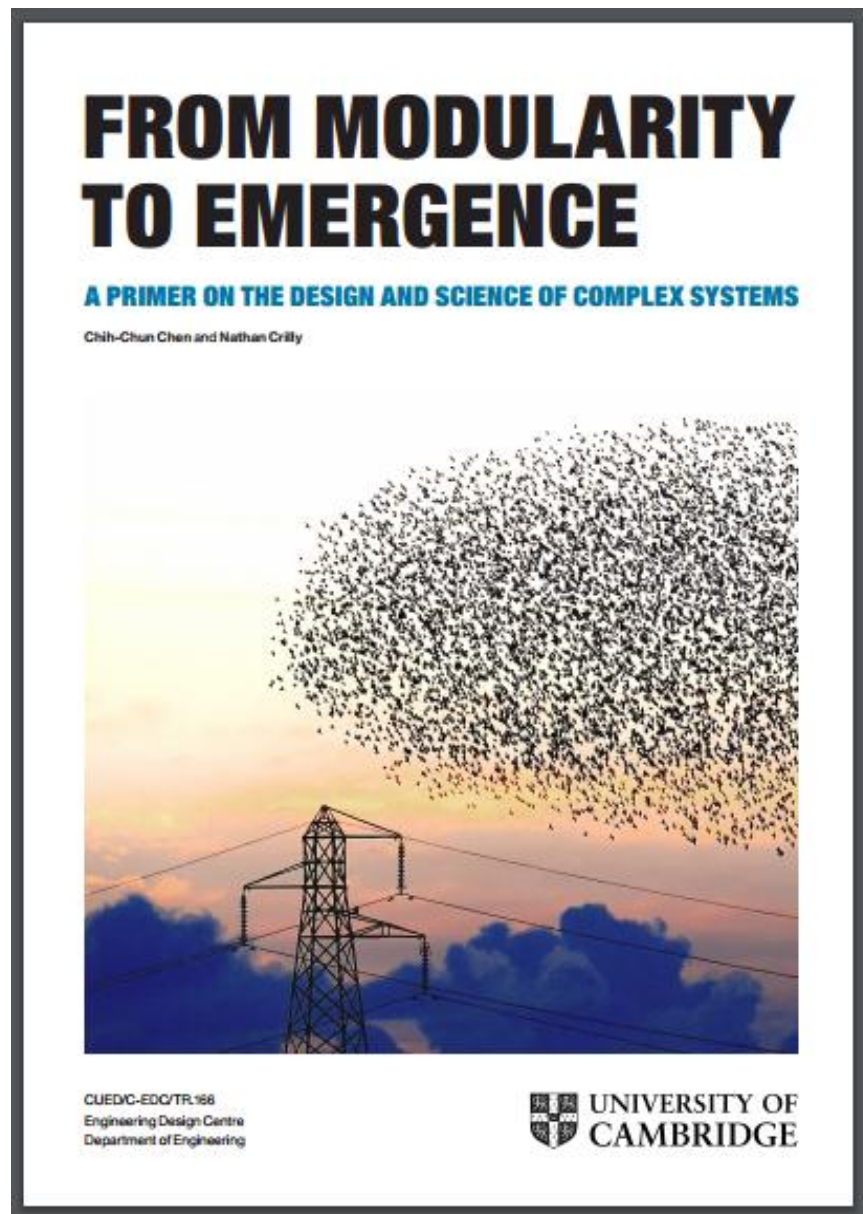
Dr Chih-Chun Chen and Dr Nathan Crilly of the Cambridge University Engineering Design Centre Design Practice Group have released a free, downloadable book, _A Primer on the Design and Science of Complex Systems_.
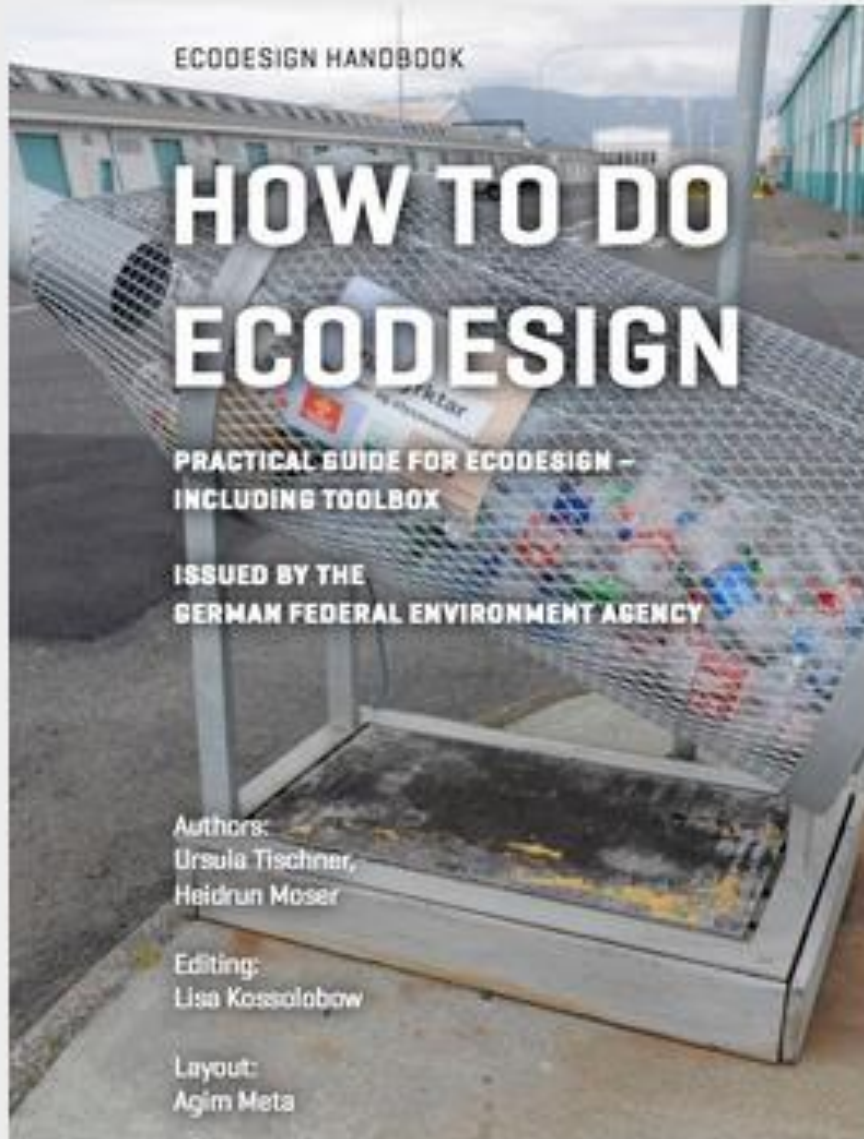**This project is funded by the UK Engineering and Physical Sciences Research Council (EP/K008196/1).**
The book is available at URL: http://complexityprimer.eng.cam.ac.uk

Changing Paradigms:
Designing for a Sustainable
Future

Editors:
Peter Stebbing
Ursula Tischner

CUMULUS THINK TANK
Publication No 1 of the Think
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Universities and Colleges of
Art, Design and Media

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Changing
Paradigms:
Designing for a
Sustainable
Future

**New iBook / ebook:
HOW TO DO ECODESIGN**

ECODESIGN HANDBOOK

HOW TO DO ECODESIGN

PRACTICAL GUIDE FOR ECODESIGN –
INCLUDING TOOLBOX

ISSUED BY THE
GERMAN FEDERAL ENVIRONMENT AGENCY

Authors:
Ursula Tischner,
Heidrun Moser

Editing:
Lisa Kossolobow

Layout:
Agim Meta

Practical Guide for Ecodesign – Including a
Toolbox
Author: Ursula Tischner

TRANSFORMATIONS
7 Roles to Drive
Change by Design

Joyce Yee / Emma Jefferies / Kamil Michlewski

Arnar Árnason and Sigurjón Baldur Hafsteinsson

DEATH AND GOVERNMENTALITY

Neo-liberalism, grief and the nation form
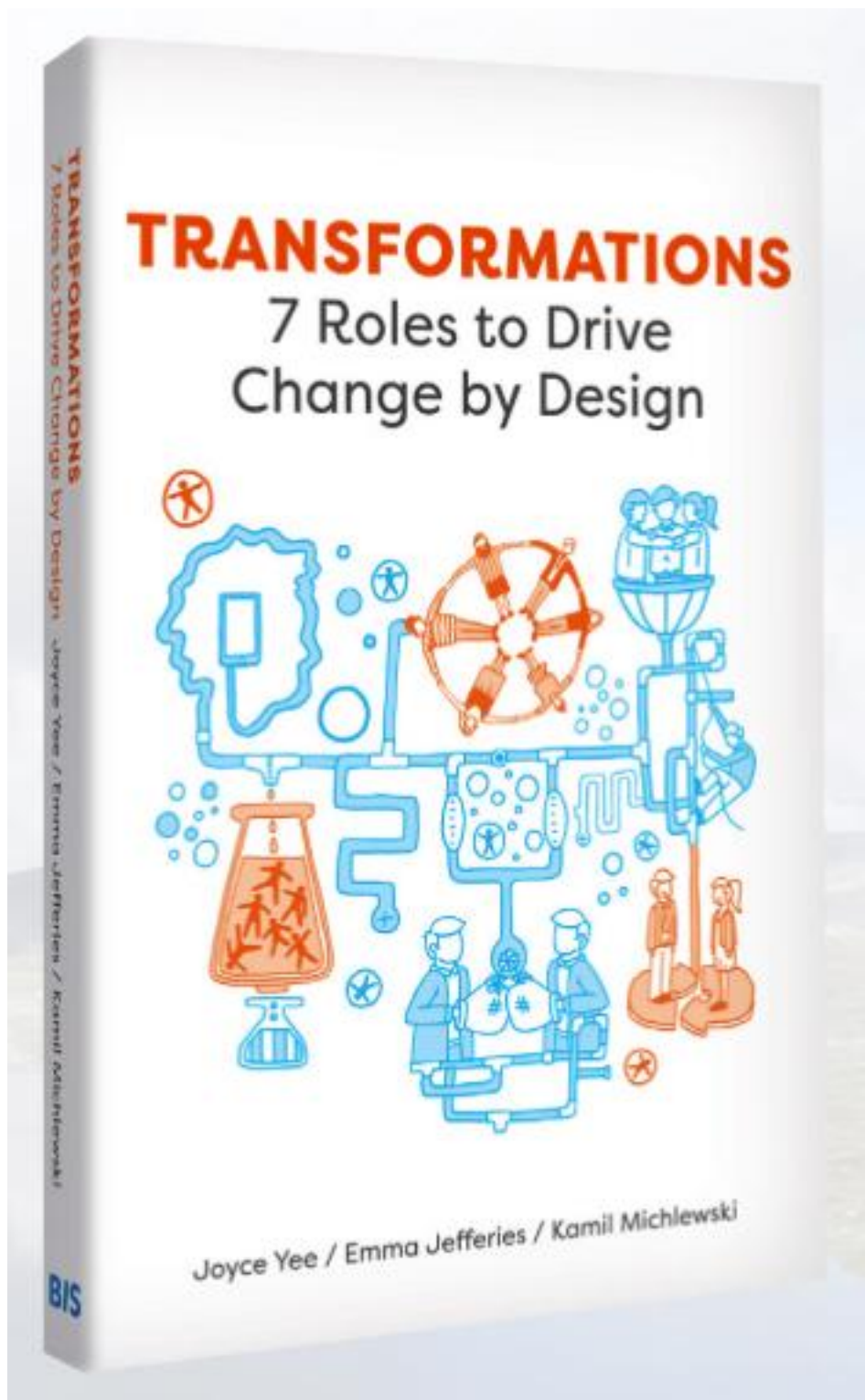
Universal Design: The HUMBLES Method for User-Centred Business
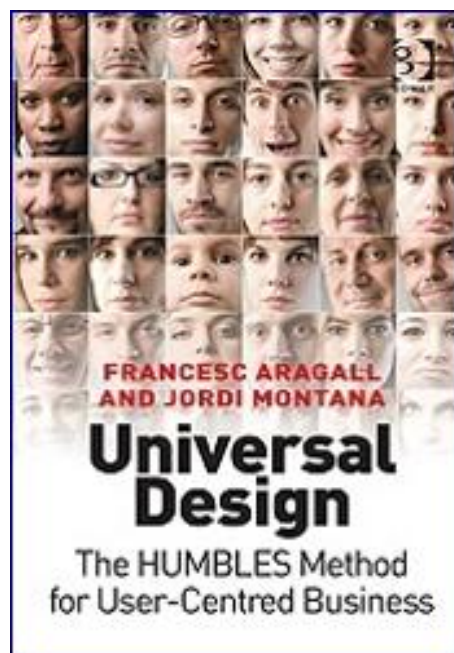
"Universal Design: The HUMBLES Method for User-Centred Business", writtenbyFrancescAragall and JordiMontañaandpublishedbyGower, providesaninnovativemethod to supportbusinesseswishing to increase the number of satisfiedusersand clients andenhancetheirreputationbyadaptingtheirproductsandservices to the diversity of their actual andpotentialcustomers, takingintoaccounttheirneeds, wishesandexpectations.

The HUMBLES method (© Aragall) consists of a progressive, seven-phaseapproach for implementing Design for All within a business. Byincorporating the user'spoint of view, itenablescompanies to evaluatetheirbusinessstrategies in order to improveprovideanimproved, morecustomer-orientedexperience, andtherebygain a competitiveadvantage in the marketplace. As well as a comprehensiveguide to the method, the bookprovidescasestudies of multinationalbusinesswhichhavesuccessfullyincorporated Design for All intotheirworkingpractices.

According to SandroRossell, President of FC Barcelona, who in company withotherleadingbusiness professionals endorsed the publication, it is "requiredreading for thosewhowish to understandhow universal design is the onlyway to connect a brand to the widest possible public, increasing client loyaltyandenhancing company prestige". To purchase the book, visiteither the **Design for All Foundation website**

Appeal

News

1.

Accessibility carries a simple business case

Proponents highlight long-term benefits of barrier-free buildings

By Barbara Carss

The premise of accessibility is the simple right to equal opportunity. From that impetus, many commercial real estate operators are making the simple business case for buildings that are functional for all potential users.

It's a quest that can begin with simple investigations, simple low-cost measures and simple mindfulness, whether at the design stage of new developments or in re-evaluating routine property management practices. A recent REALPAC-sponsored webinar exploring efforts to identify and alleviate barriers in the built environment touched on all those themes.

"Since 80 per cent of disabilities are acquired between the age of 16 and 64, it's important to remember that anyone can become a person with a disability at any time," noted Kris Kolenc, REALPAC's research and sustainability manager. "As commercial real estate owners and managers, we have a unique and crucial role to play in supporting accessibility within our buildings and our organizations, both for our employees and for our customers."

Discussion focused on strategies for assuming that role and some of the resources available to help facilitate it. In the latter category, Rick Hansen Foundation Accessibility Certification (RHFAC) is emerging as an industry standard for gauging how buildings perform for users with mobility, vision or hearing impairments, while Pedesting is a navigational app that guides users to their destinations along the most convenient possible barrier-free pedestrian routes and, as a by-product, delivers telling analytics to property managers.

"You can start to see where the barriers and problems are. In a shopping mall, for instance, maybe there's a whole wing where people with disabilities are not going. There must be a reason why," advised Erin Shilliday, a Calgary-based architect and co-founder of Pedesting. "We can rate the pedestrian experience through their spaces, of what is working and what's not. That is fantastic information for a building owner."

His business colleague, Pedesting co-founder Nabeel Ramji, who relies on a power wheelchair for mobility, tallied the many daily challenges he encounters in urban spaces and buildings, and the degree of advance planning that entails. It all infringes on the independence and impromptu experiences that able-bodied people unthinkingly enjoy.

"As a result of this lack of independence, sometimes I feel isolated or having missed out on opportunity that change may offer," Ramji said.

The navigational app is principally a tool to provide users with some certainty in terrain that remains fraught with inadvertent or purposeful obstacles. Similarly, QuadReal Property Group sought the informed insight of RHFAC professionals in an effort to fill

some gaps in the company's stated agenda to embrace responsibility and reflect excellence.

Assessment lens applies perspective of people with disabilities

"We identified that we didn't know much about accessibility in our portfolio," recounted Meirav Even-Har, QuadReal's national manager, wellness and healthy buildings. "We know we follow code, but how much universal design do we integrate into our existing stock? And how do we future-proof buildings in order to make sure, that as a company that also values inclusivity, our buildings are inclusive for everyone?"

To begin, 19 buildings, including multifamily high-rise, office towers and a shopping centre, were registered for RHFAC assessments. They're now enrolled in the Buildings Without Barriers Challenge — a joint initiative of the Rick Hansen Foundation and the Building Owners and Managers Association (BOMA) of Canada, which encourages commercial real estate operators to undertake RHFAC assessments in at least three buildings — in addition to serving as a pilot for the rollout of accessibility improvements throughout the portfolio.

Even-Har commended the RHFAC assessment process for its ease, particularly at a time when building managers are taxed with pandemic response obligations, and for the revelatory perspective she gained. Credentialed RHFAC professionals evaluate building performance in eight different aspects of built space — vehicular access; exterior approach and entrance; interior circulation; interior services and environment; sanitary facilities; signage, wayfinding and communications; emergency systems; and

additional use of space — to derive a score for meaningful accessibility.

That's meant to give an indication of how people with a range of mobility, vision and hearing abilities might be expected to navigate, interact with structural and design features, and comprehend and respond to emergency signals and evacuation procedures in a building and its related site. RHFAC professionals also explain their scoring decisions while touring the property with management staff and provide recommendations for improvement.

"In this industry we are just so accustomed to certification programs that feel like you are cramming for a horrible exam. It's nerve wracking; there are consultants involved; it's a huge thing. With this (RHFAC) process, there was no pressure," Even-Har observed. "Going through the process was actually a really pleasant surprise because of what we've been conditioned to and because of the wonderful learning experience of participating on the tour."

Doable improvements and credible returns on upfront investments

All 19 properties have attained RHFAC Accessibility Certified status, meaning they scored in the 60 to 79 per cent range. Beyond this, QuadReal has re-engaged the RHFAC professionals for follow-up virtual meetings with property management teams to discuss their findings and view photos from the assessment process, as well as for on-site tours with select team members to help them set priorities for required work

"There's lots to learn, but it has been absolutely fascinating because you rediscover your buildings. You realize there is so much to do, and a lot of it is things that are doable, that can go into operational budgets," Even-Har said.

"Very often we tend to think about the built environment in terms of fixing, designing and making changes to it, but it can be something as easy as standardized training for building staff," concurred Kevin Ng, acting director, accessibility certification, with the Rick Hansen Foundation.

That said, the program does focus on the development stage with a target that all new construction should ultimately be RHFAC Accessibility Certified Gold, indicating it has achieved a score of at least 80 per cent. Toward that end, the pre-construction rating stream is aimed at finding and correcting design issues before they are committed to less easily reversible forms.

"It can help avoid creating any new barriers. It helps you reduce the need for costly retrofits in the future," Ng said.

Meanwhile, Shilliday, who is also a certified RHFAC professional, enumerated a fairly modest premium for getting it right in the first place. "If it's thought through early in the design, the delta in the construction cost is 1 or 2 per cent. It's not a money thing. It just needs to be thought through in the beginning," he maintained.

Self-directed agenda for commercial real estate leaders

The still embryonic stage of the federal Accessible Canada Act, which was adopted in 2019, and long timelines for compliance in various provincial accessibility statutes have largely ceded the way for self-directed leadership in commercial real estate. Accessibility champions look to parallels with the green building and climate action movements as a model for how to proceed, suggesting that momentum could build in the same way through collaborative learning, competitive drive and growing recognition of the paybacks.

Webinar sponsor, REALPAC, counts many of Canada's largest commercial real estate companies and investment managers among its membership. Prominent companies that have been leaders in green certification and environmental performance benchmarking exercises like LEED, BOMA BEST and GRESB are already signed on to the Barrier-free Buildings Challenge, bringing a total of 61 properties to vie for the 2021 awards due to be announced October 21 at BOMA Canada's upcoming online annual conference, BOMEX Virtual.

"ENERGY STAR Portfolio Manager peaked in Canada in part through industry associations like REALPAC really having helped push the agenda. So let's make this our agenda," Even-Har urged. "I have been so inspired by some of the work that we've been doing as an industry when it comes to sustainability. I really think we can get together and create a way to push ourselves and share some learning, share some best practices."

Shilliday underscored the potential returns in market share and human capital. Both have been a tangible reality for him through his product and his alliance with Ramji.

"You are missing out on 20 per cent of the market ostensibly by not having accessibility," he said. "I am wondering how many Nabeels we're missing out on. Would we not be a better, stronger, more interesting society if all those people, who I know are out there, are represented and part of our everyday lives?"

Barbara Carss is editor-in-chief of Canadian Property Management.

(Courtesy: Canadian Property management)

Programme and Events
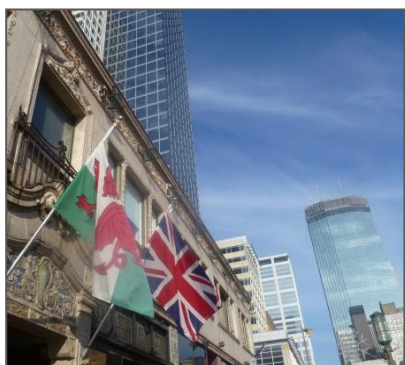
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