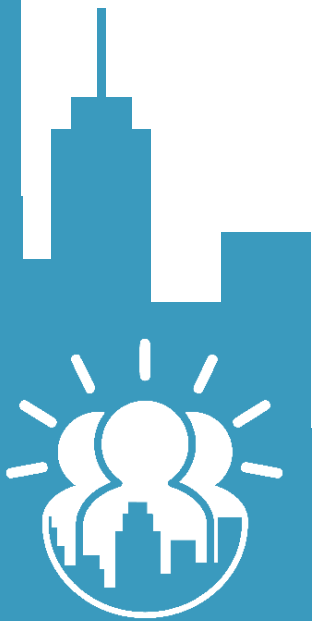


# A Global Strategy for Digital Inclusion

Proposed by  
G3ict and World Enabled



Smart Cities for All

# Smart Cities for All



## Today's Global Smart Cities are Widening the Digital Divide

44%

Can identify existing Smart Cities projects that include any focus on ICT accessibility.

18%

Can identify Smart Cities that currently use ICT accessibility standards.

60%

Say that today's Smart Cities are failing persons with disabilities

In June of 2016, G3ict and World Enabled launched the Defining Accessible Smart Cities initiative to understand how Information and Communication Technologies (ICT) are being made available to persons with disabilities in Smart Cities. Smart Cities are innovative and entrepreneurial. They use technology to improve quality of life, efficiency of urban operations and services, and economic competitiveness.

The G3ict and World Enabled initiative included three separate data gathering strategies: a survey of more than 250 Global Experts, a series of roundtable discussions in global Smart Cities (Barcelona, London, Quito, New York, and San Francisco), and one-on-one interviews with numerous Smart City program managers and technologists.

The initiative has confirmed that most Smart Cities are not accessible today, and the result is a growing digital divide for persons with disabilities. Global experts see no clear link between ICT accessibility standards and Smart Cities programs worldwide. The lack of ICT accessibility leads to negative impacts on independent living, transportation, e-Government, employment, civic engagement, safety & justice, emergency response, voting & elections, financial services, and more. Persons with disabilities at each of the initiative's 5 expert roundtables spoke in detail about how a lack of ICT accessibility impacts their inclusion and daily life in each of these areas.

# 2

## There is a Path Towards More Inclusive Smart Cities

While the first phase of **G3ict** and **World Enabled**'s work on accessible Smart Cities exposes a stark problem and describes a growing risk, it also reveals reasons for optimism. In their survey responses and discussions with **G3ict** and **World Enabled**, global experts asserted that today's accessibility challenge is addressable and they begin to chart a roadmap for moving forward.

The global experts identified barriers to full digital inclusion in Smart Cities. These barriers are common across countries, and include such elements as limited financial resources, poor awareness of disability access needs, and a lack of fundamental elements such as skilled technical professionals, informed leaders, and adequate information about accessible technology solutions.

**G3ict** and **World Enabled** believe that six key interrelated strategies can address the barriers identified by global experts and begin to make progress on the priority steps they identified to support more accessible Smart Cities. The following six strategies will help ensure that the growing technology investments by Smart Cities worldwide will not leave behind persons with disabilities. They will help global government and industry leaders to understand and realize the public policy, economic, and innovation benefits of accessible Smart Cities.

## Barriers to Smart City Accessibility



Lack of awareness of disability and ICT accessibility by city leaders and IT professionals.



Lack of data both about persons with disabilities to use in defining Smart Cities solutions and programs.



Lack of policies & laws making accessibility a requirement in Smart Cities programs and investments.



Lack of leadership across all sectors, i.e. government, industry, and civil society.



Limited financial resources to support the focus on accessible technology and digital inclusion.



Lack of professionals with ICT accessibility training.

## Priority Steps for Increasing Accessibility



Involving persons with disabilities in Smart Cities program design



Building public-private partnerships for accessible Smart Cities solutions



Providing awareness training for IT teams and managers



Requiring accessibility as part of public sector ICT procurement



Complying with international ICT accessibility standards



Assessing the current accessibility of current Smart Cities programs



Allocating government and industry financial resources to accessibility



Using open and accessible datasets that include info by and about persons with disabilities



Requiring accessibility as an implicit to Smart Cities programs



Aligning Smart Cities programs with international human rights and development commitments

**01**

## **Provide Direct Technical Assistance to Smart Cities**

Leaders from governments, disability organizations, and industry worldwide must confirm their commitment to ICT accessibility and digital inclusion. However, they need expert technical assistance to design and implement customized Smart City ICT accessibility strategies. Throughout the expert roundtables and interviews, Smart City leaders expressed a need for guidance in identifying their ICT accessibility gaps and clearly articulating their accessibility priorities. Some cities have already begun formally requesting assistance from **G3ict** and **World Enabled**. Successful direct engagement with cities will need to use existing networks of experts to help define and communicate progress. Technical assistance must specify roles for various city agencies and other involved groups – and must ensure the involvement of a broad range of citizens and organizations, including from the disability community.

## **Expand Tools Available to Smart Cities**

**02**

The first phase of the **G3ict** and **World Enabled** Smart Cities initiative led to the development of four new tools to support progress towards more inclusive Smart Cities: a defined business and rights case for accessibility, a model accessible ICT procurement policy, an inventory of ICT accessibility technical standards, and a database of impactful Smart Cities solutions). The project survey and expert engagements confirmed that additional tools are needed to more fully and rapidly transform Smart Cities programs. These tools can be developed, customized, and deployed flexibly with cities worldwide to help address their varied needs.

## Proposed New Accessible Smart Cities Tools



Maturity Model Tool clearly defines ICT accessibility progress for leaders across the broad range of city functions. This would include Smart Cities KPIs and metrics for accessibility and digital inclusion.



Solutions Database Tool V2 builds on existing database tools by qualifying solutions, regularly updating, and providing an interactive user experience.



Vendor Management Tool help cities administer relationships with suppliers and ensure ongoing commitment to ICT accessibility. This includes vendor compliance and standards enforcement.



Accessibility Awareness Tool is targeted at small technology companies and individual developers who can move Smart Cities forward through their innovations.

**03**

### **Evangelize ICT Accessibility at a Global Scale**

Leading global and multilateral organizations, such as the United Nations, World Bank, and Inter-American Development Bank, play a significant role in defining and promoting Smart Cities programs worldwide. They are creating Smart Cities policies, programs, standards, and Key Performance Indicators. They are influencing critical technology decisions and investments. However, today their smart city work does not always include a focus on ICT accessibility and the digital inclusion of persons with disabilities. To achieve global scale and impact in transforming Smart Cities programs, it will be critical to partner with these global organizations and ensure that ICT accessibility is a central part of their Smart Cities agendas.

**04**

### **Increase Capacity Via Training and Knowledge Sharing**

There is a need for capacity building across all communities that are critical to the success of Smart Cities, including city government leaders and managers, IT professionals, technology companies, and civil society and disability organizations. To move forward in closing the digital divide for persons with disabilities, it is necessary to build the ICT accessibility and disability knowledge of these communities through training, a common language, and peer mentoring. There also is a need to build linkages among these communities and eliminate the silos that separate them and prevent progress.

### **Drive Accessible Technology Innovation in Smart Cities Solutions**

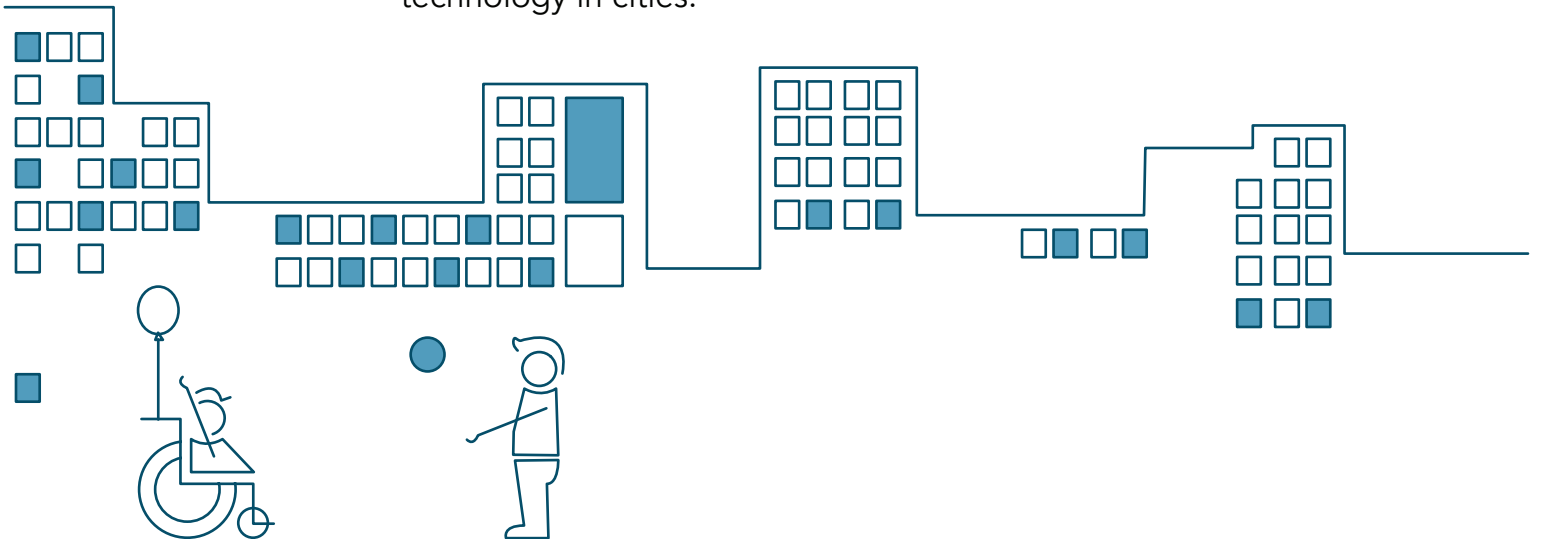
At their core, Smart Cities are about people. The first phase of this project demonstrates that there is enormous potential and unmet demand for innovation in areas of high impact for persons with disabilities, older persons, and all citizens; e.g. independent living, transportation, safety & emergency response, civic engagement, etc. There is now an opportunity to connect city (or municipal) leaders with industry technology experts to explore the potential for bridging inclusion gaps, including through focused discovery dialogues, solutions workshops and exploratory pilot programs. This effort will match technology solutions providers, city IT leaders and disability organizations to identify opportunities and challenges to leverage technology to increase access to smart city services, devices and technologies, and improve the digital inclusion of persons with disabilities. This effort will identify real city solutions gaps, connect cities with technology solutions providers and support opportunities for collaboration.

**05**

## 06

### Change the Global Narrative

Today the global dialogue on disability, inclusion, and the urban environment is not effective. It focuses too narrowly on simple regulatory compliance. A more effective global narrative must elevate the discussion to putting people first and demonstrating how central inclusive design is to living a meaningful and productive life, to boosting technology innovation, and to growing the economy. Changing the global dialogue about disability in urban environments requires the development and deployment of impactful communications resources to ensure a broad and real understanding of the benefits of accessible technology in cities to persons with disabilities, older persons, and all citizens. A successful global awareness campaign would leverage organizations from the public, private, and non-profit sectors to spotlight the social and economic impact of accessible technology in cities.





# 3

## Moving Forward: Smart Cities for All

With a defined problem statement, a growing knowledge base, a global expert network, and an initial set of tools, we can begin building more inclusive and accessible Smart Cities. **G3ict** and **World Enabled** are prepared and uniquely positioned to convene and engage industry, government, and civil society leaders in cities around the world to help them transform their Smart Cities programs into global examples of best practice for ICT accessibility and digital inclusion. We can achieve worldwide scale and impact by working with and through international organizations to evangelize the benefits of a commitment to accessibility and inclusion and by promoting best practice tools and strategies to create accessible and inclusive Smart Cities.

**G3ict** and **World Enabled** are now exploring partnerships with leading organizations and companies to begin implementing the strategies needed to build more inclusive Smart Cities. Strong partnerships will be built around shared objectives, mutually agreed upon strategies, and specific work plans with deliverables and metrics.



## **G3ict**

The Global Initiative for Inclusive Information and Communication Technologies – is an advocacy initiative launched in December 2006 by the United Nations Global Alliance for ICT and Development, in cooperation with the Secretariat for the Convention on the Rights of Persons with Disabilities at UN DESA. Its mission is to facilitate and support the implementation of the dispositions of the Convention on the Rights of Persons with Disabilities (CRPD) promoting digital accessibility and Assistive Technologies. More information can be found at <http://g3ict.com/>



## **World Enabled**

World Enabled is a global education, communications, and strategic consulting group. We support companies and governments with the full implementation of legal mandates that promote the rights of persons with disabilities. Our work and research initiatives focus on urban planning and inclusive urban development. With our international partners, we build inclusive societies where people with disabilities fully develop their talents and reach their full potential. More information can be found at <http://worldenabled.org/>

# 4

## Team Bios

This initiative is being headed by James Thurston, Vice President at G3ict and Dr. Victor Pineda, President at World Enabled. Both James and Victor are leading global experts and are committed to building a broad coalition to ensure that persons with disabilities enjoy the amazing advances of Smart Cities on an equal basis with others.



**Dr. Victor Santiago Pineda** is the President of World Enabled. He also serves as president the Global Alliance on Accessible Technologies and Environments (GAATES). Dr. Pineda is a recognized leader in international disability rights and was appointed by US President Barak Obama to the Architectural and Transportation Barriers Compliance Board. He teaches city planning at University of California, Berkeley. Dr. Pineda has received numerous awards, including a National Science Foundation (NSF) Innovation research grant, a Fulbright-Hays Scholarship, and the AAPD Paul G. Hearne Leadership Award. Mr. Pineda received a B.A., B.S. and M.C.P. from the University of California, Berkeley and a Ph.D. from the University of California, Los Angeles.



**James Thurston** is an internationally recognized technology policy leader. As G3ict's Vice President for Global Strategy and Development, he leads the design and implementation of new programs to scale up G3ict's global impact. He has served as advisor to high-ranking government leaders in the US and abroad on technology policy, human rights, and digital inclusion. He has experience applying both technology and public policy to important social and economic challenges. He holds broad policy and management experience in both the private and public sectors and at the federal, state, and

international levels of government. Prior to joining G3ict, Mr. Thurston was Director of International Accessibility Policy at Microsoft, where he developed and executed a worldwide strategy to expand the company's outreach on disability and technology issues. Mr. Thurston holds both a Master of Public Administration and an M.A. in East European Studies from the University of Washington, as well as a B.A. in International Affairs from the University of Maine.

