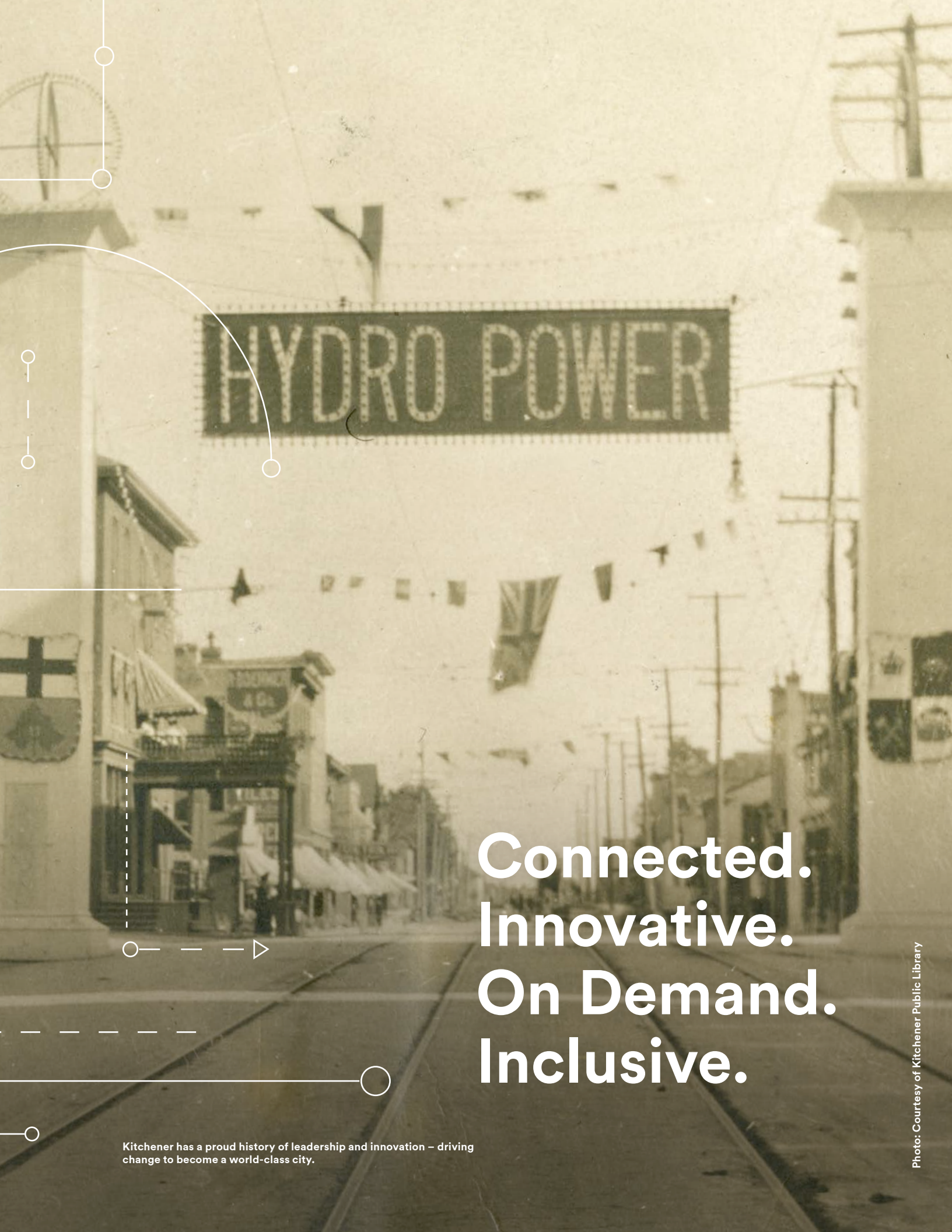




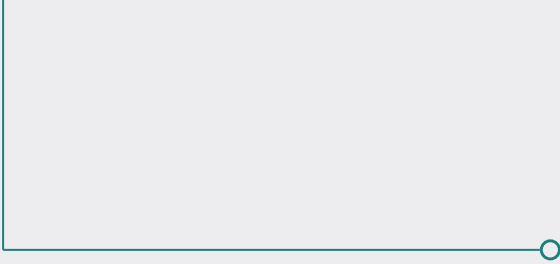
Digital Kitchener



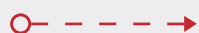
HYDRO POWER

**Connected.
Innovative.
On Demand.
Inclusive.**

Kitchener has a proud history of leadership and innovation – driving change to become a world-class city.



More than tech.



Kitchener has always had a reputation for being a community with foresight. A place where the dreamers and the doers come together, share ideas and make great things happen. Innovation is not what we do – it's who we are. We constantly strive to introduce new ways of thinking and doing to improve the lives of citizens.

Creating a digital strategy is about more than the power of technology in the digital age. It's about making Kitchener more inclusive, more connected and more accessible today, and beyond.

We must look to the future if we are to sustain and improve upon the things we have already accomplished. We must ensure we use technology and innovation to its fullest potential; creating greater value for citizens in both the services they rely on, and the experiences they have in their community. We see Digital Kitchener as the way to do all these things and to help our city realize what's truly possible.

We must do more to be smart and connected. We must leverage technology to enable even more opportunity for citizens to connect

with each other, with their surroundings and with their government. To create an experience that is as natural and authentic as the face-to-face interactions we experience every day.

Digital Kitchener is our commitment to continuing to build a great city. A city that is connected, innovative, on-demand, and inclusive. Digital Kitchener is more than tech. It's a legacy.

Our vision

Together with our partners, we will build a foundation that harnesses the power of digital technology to create a world-class smart city.



Kitchener is a city of dreamers and doers – people who believe in the power of possibility and are committed to creating a smarter, more connected city.



The foundation of a smart city

Building a smart city will take vision, commitment, and collaboration. In a city like Kitchener, where infinite ideas collide with inspired innovation and enviable talent, the sky is the limit in terms of what can be accomplished. Extensive consultation with our community identified four clear themes that are the foundation of Digital Kitchener.



Connected

Smarter infrastructure gives rise to smarter cities. By connecting our infrastructure, Kitchener can become a more competitive, productive and attractive place to live and work.



Innovative

Innovation isn't just about big ideas, it's about positive change that has significant impact. By inspiring a city of innovators, Kitchener can continue driving change that has a meaningful impact on citizens' lives.



On Demand

Your community, at your fingertips. By improving access to digital tools like open data or online service choices, Kitchener can leverage the 'on-demand' experience to increase engagement and connectivity.



Inclusive

In a digital city, access is equality. By improving capacity to support digital literacy and increased access to tech, Kitchener can be a city where no citizen is left behind, ensuring that all citizens have equitable access to the benefits of a smart city.



Connected

Roads, electricity and water are critical infrastructure that make a livable, safe city. Telecommunications and technology infrastructure serve as the critical links that connect people with each other, and with their city. Once very distinct, intertwined these services provide the opportunity to build a smart city that connects people in ways never imagined. By connecting our infrastructure we can become a more competitive, productive and attractive place to live and work.

Becoming more connected means:

1

Offering communications infrastructure with the access and capacity required to remain globally competitive.

2

Reimagining wireless access in Kitchener as a more seamless service.

3

Looking beyond traditional uses for existing infrastructure and integrate emerging sensor technologies.

Smart infrastructure will lay the groundwork for the innovation of tomorrow.



To make this happen we will:

Position Kitchener as an easy to access, low risk market for new investments in fibre optic broadband and wireless networks.

Action steps include:

- Determining current levels of internet and wireless service available within Kitchener.
- Opening-up municipal assets to service providers through the use of policy tools, and streamlining processes to create new partnership opportunities for community and commercial benefit.

Explore new tech opportunities as part of all major infrastructure builds.

Action steps include:

- Making strategic investments in public Wi-Fi access, including at all city facilities and major green spaces.
- Establishing a Kitchener-wide narrowband network through the LED street light conversion project to serve as a foundation for future smart city initiatives.
- Identifying unique opportunities to leverage connected sensors in areas such as the city's parking, stormwater and utility enterprises, and encouraging regional stakeholders to use Kitchener as an incubator to pilot smart tech projects of their own.

Building a network of smart assets supports the city's commitment to a strong and resilient economy and sustainable infrastructure.

This is where it starts



In Kitchener, we believe that a smart city sees the bigger picture. A smart city looks to make decisions that will improve citizens' quality of life in the short term while solving problems of the future. A smart city sees potential in the simplest of investments. Like the potential in the replacement of end-of-life high-pressure sodium streetlights with LED lights while simultaneously installing a narrowband adaptive control network. LED lights make the streets brighter and safer, and the adaptive narrowband network sets the city up to transform everyday experiences – like improved navigation for emergency services, or making gas meter reading a more dynamic experience.

Investments like this are already taking place in Kitchener. Even better, these investments create an opportunity for savings that can be reinvested in a fund designated to support future smart city pilot initiatives.

Taking advantage of opportunities like infrastructure investments is where we start ensuring that, from the ground up, **Kitchener is connected, innovative, on-demand, and inclusive.**



- 1 Smart infrastructure, like the city's LED streetlight project, will lay the groundwork for improvements to the way citizens live, work, and experience life in Kitchener.
- 2 Investments in infrastructure improvements, like LED lights on the Fairway Road bridge expansion, are already in place in some areas of the city.
- 3 Council approval of a strategy to include a narrowband network installation simultaneously with LED streetlight replacements will allow lights to brighten and dim as needed – a more efficient and effective approach to lighting in the city.

Infrastructure investments ensure that, from the ground up, our city is connected, innovative, on-demand and inclusive.



Innovative

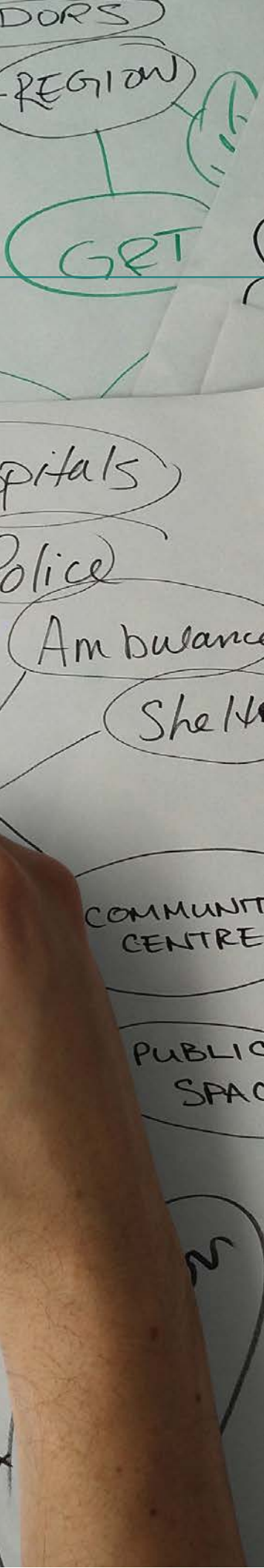
Anyone can be innovative. Innovation isn't just about big ideas; innovation is about positive change that has the potential for significant impact. It's about a willingness to embrace new ideas that can transform experiences, relationships, industries, and even cities. The key to innovation is to create an environment where people are excited to collaborate, and feel supported to succeed. When people feel empowered to suggest even the smallest change and improve the way things are done, that's when true innovation occurs.

Becoming more innovative means:

- 1** Providing flexible IT solutions internally that support service delivery and process improvement.
- 2** Deploying more mobile solutions and automating more business processes.
- 3** Testing new service delivery ideas through co-developed initiatives and piloting new concepts.



Over a 12 month period, dozens of brainstorming sessions and stakeholder meetings helped identify Kitchener's digital priorities. Online and in-person contributions helped shape Digital Kitchener.



To make this happen we will:

Promote civic innovation through culture and process first, projects second.

Action steps include:

- Creating a new business relationship model for IT that generates more awareness of the services it provides, on how projects are prioritized and brings a new focus to working with internal partners collaboratively.
- Continuing to implement the city's mobile strategy and ensuring corporate policies are in place to empower a creative workforce, including remote work and cross-functional work.
- Exploring how to become more flexible in how the city acquires goods, services and solutions while still following legislative guidelines for competitive sourcing.

Engage our talented community of innovators to assist in finding solutions to local civic challenges.

Action steps include:

- Creating forums to present municipal service challenges and developing cutting-edge, made in Kitchener solutions.
- Identifying opportunities to work more closely with post-secondary institutions on smart city research and projects.

Fostering an innovative civic culture supports Kitchener's commitment to efficient and effective services.

Beyond the ordinary



Embarking on a new way of fostering and implementing the ideas of citizens to help build a smart, digital city is not only exciting – it's reflective of the collaborative, grass-roots spirit that has helped shaped the city we are today. The entrepreneurial and innovative spirit of the businesses, organizations and citizens that call Kitchener home is the power behind our success, and it's a power that we can't overlook.

Smart cities are made up of decision makers that are unafraid to ask for insight and explore new ideas to their fullest potential. Smart cities recognize that sometimes innovation is not about the ground-breaking 'new', but rather it is about transformation of what already exists. Kitchener has always been a city that values the voices of those who challenge us to invent and re-invent, **ensuring that we're building a stronger city not only for today, but also for future generations.**



- 1 Kitchener Public Library has taken on its own digital literacy initiatives and created services and programming open to the community.
- 2 Kitchener is defined by its collaborative culture. Leaders from the tech and academic sectors participated in brainstorming sessions to help form Digital Kitchener.
- 3 The Maker Expo showcases the best of Kitchener's maker culture and its appetite for what's next in technology and innovation.

When a city's culture supports the unconventional, there is the potential for greatness.



On Demand

Kitchener, like technology itself, is constantly striving to be better, faster and more sophisticated to meet consumer demands. Public expectations are continuing to grow – expecting improved access to the services and information they rely on every day. To meet these demands, Kitchener must continue to expand the availability and use of its data and offer more choice in accessing services digitally.

Becoming more on-demand means:

1

Providing more centralized information that is of high value and easy to access.

2

Using information in more dynamic ways to inform decision-making.

3

Offering digital service options that are convenient and intuitive.

In the heart of the second largest technology cluster in North America and as an anchor in the Toronto-Waterloo Region corridor, Kitchener connects some of the world's top talent. Information on demand is essential in order to enable innovation in the city's thriving economy.



To make this happen we will:

Make better use of data through collaboration and coordination.

Action steps include:

- Developing an organization-wide approach to data management that provides guidance on what data to collect and drives the use of analytics.
- Continuing to expand the city's open data catalogue to incorporate new data sets, including those generated by smart tech projects.

Explore new opportunities to enhance online services.

Action steps include:

- Actively exploring opportunities to align the city's website and existing e-services to support a single sign-on where users can visit one location and access multiple municipal services.
- Creating e-services that are more personalized according to the unique interests and needs of users.
- Supporting the city's ongoing engagement and customer service initiatives through new tech opportunities.



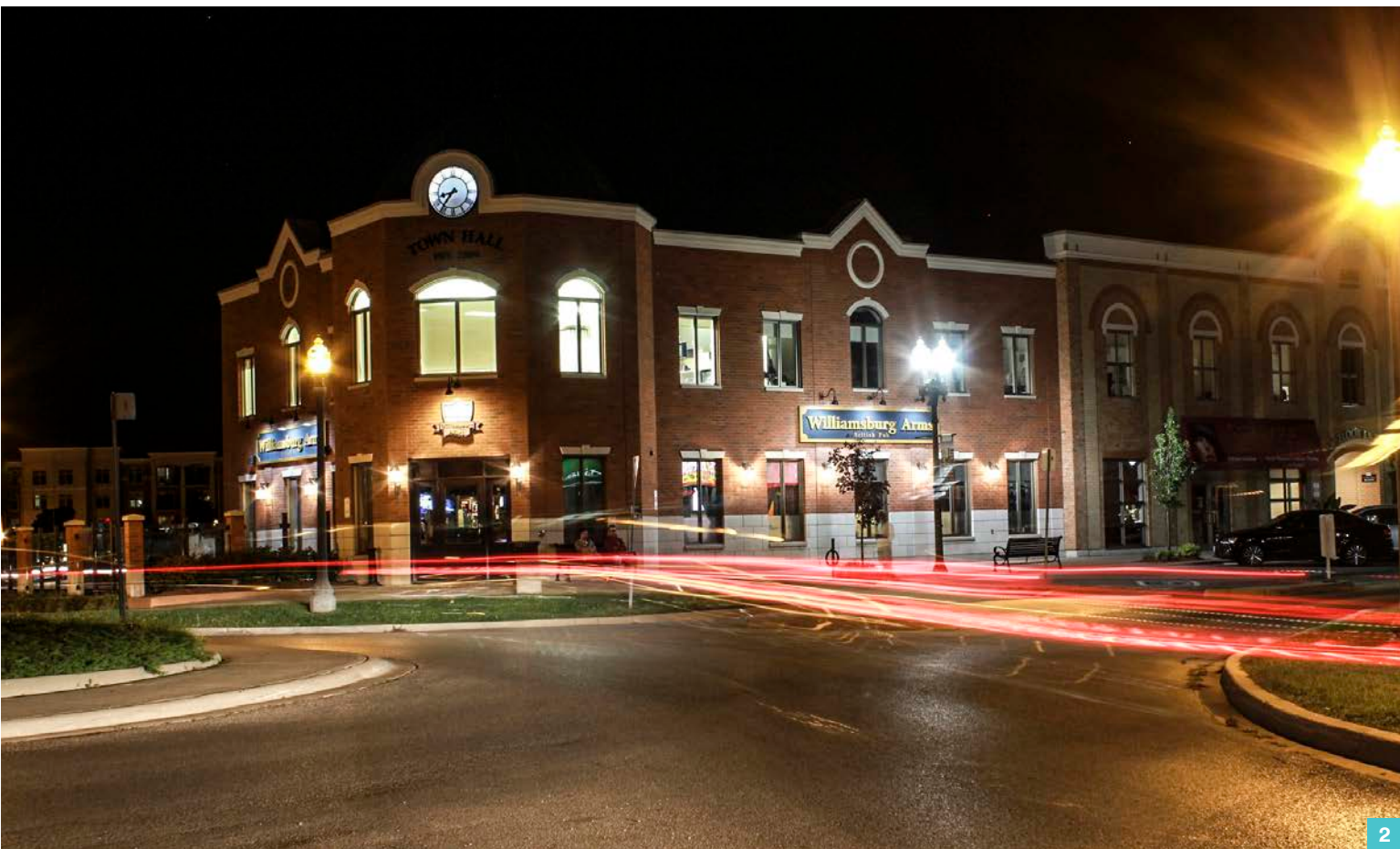
Creating greater ease of access to information and services supports the city's commitment to open government.

Endless possibilities



Imagine a city that gives you access to the information you need, when you need it. A city that takes transparency with its citizens, local businesses and global companies to the next level. A city that encourages people to seek for the data needed to collaborate and find solutions to big, ongoing civic issues.

The idea of open government is not new. In 2014, Kitchener began offering interested individuals access to specific data sets by request. In 2016, the city launched an online portal that includes more than 100 data sets open for anyone to download, experiment with and explore – enabling collaboration and participation in ways yet to be imagined. In a city and region with some of the world's greatest research, innovation and entrepreneurial minds, the **possibilities of what can be done with this data in the hands of the right people and teams is endless.**



- 1 At the Maker Expo, people of all ages are inspired to think about the endless possibilities tech can provide – like the ability to create a 3D printed superhero helmet.
- 2 Digital Kitchener will help drive smart city initiatives that will have far reaching impact in both urban and suburban neighbourhoods.
- 3 Leveraging technology to improve quality of life – like the use of real-time reporting mobile apps – makes Digital Kitchener a collaborative approach to making city services better, faster and more efficient.

Picture a city that encourages their people to seek for the data needed to innovate and collaborate to find solutions to big, ongoing civic issues.



Inclusive

An inclusive community is one that actively works to ensure that no citizen is left behind. A digitally inclusive city is one that strives to ensure that access to technology is as much a right as it is a privilege, and that the digital literacy of the community is elevated through collaboration with public and private organizations. As a digital city, Kitchener must build capacity that ensures all citizens have equitable access to the benefits afforded by a smart city.

Becoming more inclusive means:

1

Providing opportunities for equitable access to information and digital services.

2

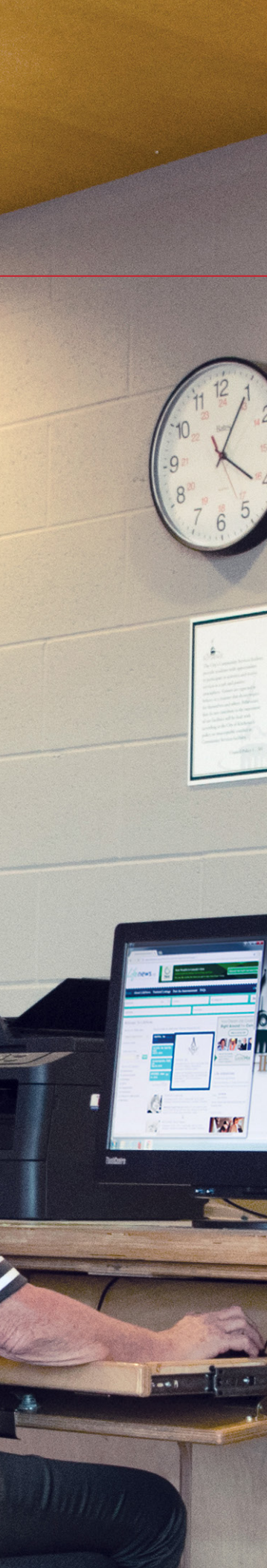
Supporting increased digital literacy and skills development for citizens.

3

Creating conversations around digital inclusion and turning it into a broader philosophy across the region.

Improving digital literacy will ensure that all citizens can be engaged in their city.





To make this happen we will:

Work to better understand digital inclusion opportunities for Kitchener and its neighbourhoods.

Action steps include:

- Working with community organizations to identify public access needs, and collaboratively addressing them.
- Establishing a service level standard for public tech and internet access across the city.

Work to align digital access and literacy initiatives through greater collaboration with local organizations.

Action steps include:

- Supporting Kitchener Public Library as it expands its digital programming.
- Working with economic development to co-support community based tech programming.
- Advocating among the local tech sector to promote their own digital inclusion initiatives, including outreach and mentoring.



Digital inclusion supports the city's commitment to strong and thriving neighbourhoods.

Breaking down barriers



1

Building a digitally inclusive city begins first with understanding where gaps exist, identifying the barriers that create those gaps and then working to connect people and envision new ideas to help close those gaps. Building a digitally inclusive community is not the job of one entity. It is work that can only be achieved by engaging multiple groups, organizations and institutions to leverage the strengths of the entire community to ensure that every citizen has equitable access.

In Kitchener, we are well positioned to become a leader in digital inclusion. We are surrounded by visionary public and private sector innovators; individuals and corporations that understand the strength that can be gained through enhanced digital literacy and access to digital services.
An inclusive community is a strong community.



2



3

1 Programs like HackerGrrlz, are integral to encouraging and supporting women in tech.

2 HiveWR (formerly Year of the Code) brings tech to the mainstream, offering the opportunity for all to learn a little about tech.

3 44 Gaukel is a creative hub in Kitchener that brings the arts and tech communities together in one space – advancing innovation under one roof.

In creating the space for groups to come together and share their insights and knowledge on inclusion, we can break down barriers and improve citizens' experiences in Kitchener.

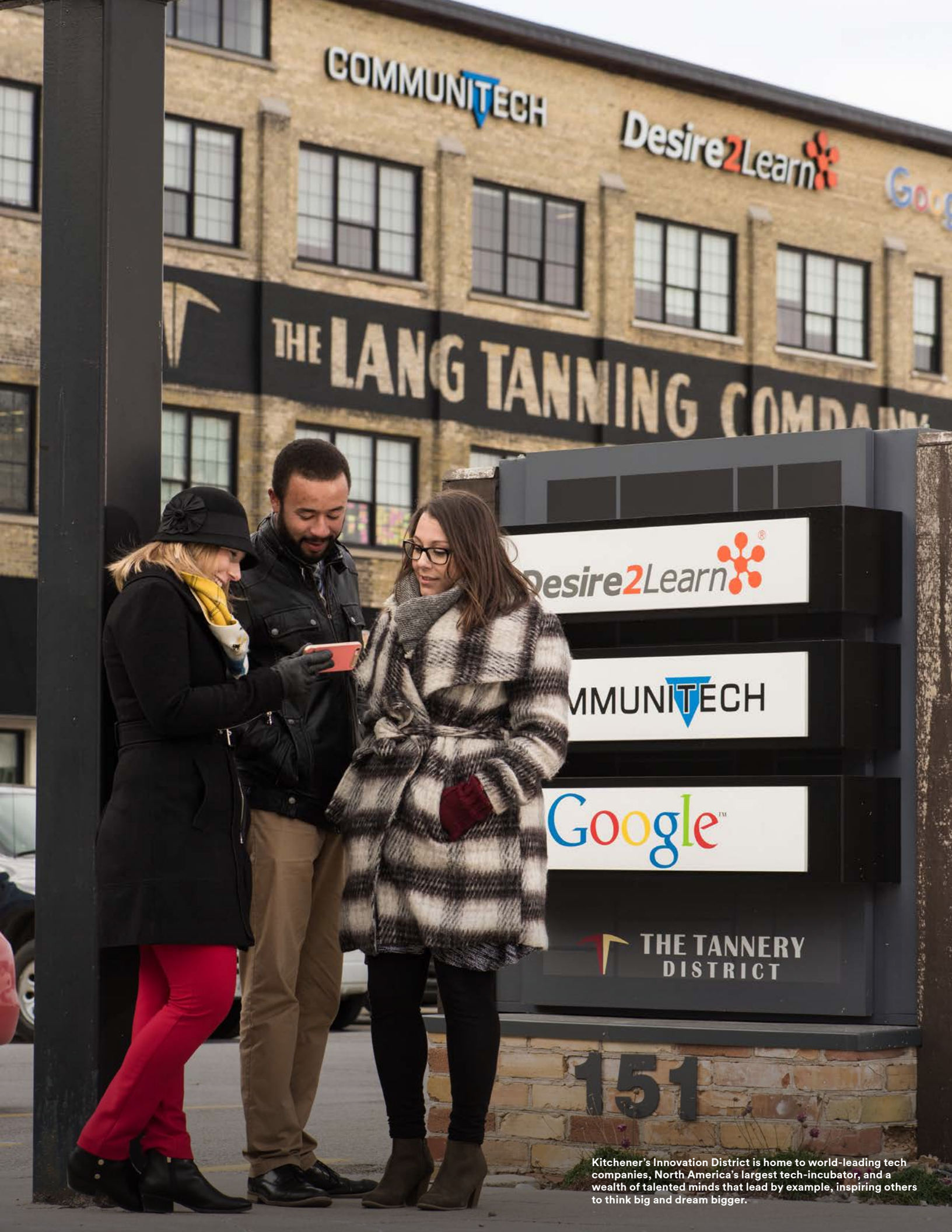
We're in this together

In order to realize the full potential of Digital Kitchener, we must be willing to be leaders and to be brave. We must be willing to go where there are no existing best practices – and create them. Digital Kitchener is about bringing great ideas to life that will harness the power of digital technology and create a world-class smart, digital city.

To achieve this, we will:

- 1 Invest in technologies, processes and initiatives that support our goals.
- 2 Create partnerships that strengthen and sustain our initiatives.
- 3 Tell our story, bringing Digital Kitchener to life for every citizen to understand and embrace.

The success of Digital Kitchener is up to all of us.



COMMUNITTECH

Desire2Learn

Google

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Desire2Learn

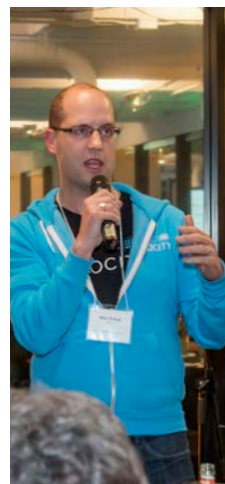
COMMUNITTECH

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Kitchener's Innovation District is home to world-leading tech companies, North America's largest tech-incubator, and a wealth of talented minds that lead by example, inspiring others to think big and dream bigger.





Message from Mayor Berry Vrbanovic and Kitchener City Council

Kitchener is a city that has always welcomed technological change – from the earliest signs of industrialization to the current digital age. We are a community of ambitious and highly trained people who see possibility where others see the impossible, and who never shy away from pushing boundaries to encourage change that will enhance the lives of citizens in our own community, and around the world.

A part of one of the top startup ecosystems in the world, it can be easy to become accustomed to the advantages that come with that distinct privilege – like the fact that North America's largest incubator is located in the heart of our city, or that the world's largest manufacturing facility for IoT is evolving right here in Kitchener.

But Kitchener has never been a city that has rested on its laurels, accepting that today's greatness means our job in ensuring our city is innovative, dynamic and livable is complete. In fact, it is in our character and nature to keep pushing to do better. Digital Kitchener is our commitment to you that together, we will stay true to this character as we strive to make Kitchener one of the best places in Canada to live, work, and connect with others.

Through Digital Kitchener, our city will become more connected, innovative, on-demand and inclusive. It will create more opportunities for citizen dialogue on community issues and will introduce new ways for people to get involved in decisions that affect them. It will support the introduction of more convenient and effective channels to access city services, and improve public access to city records, information, and data – making our city more transparent and accessible than ever before.

Digital Kitchener will strengthen existing partnerships and forge new ones, working to harness the collaborative energy and world-renowned expertise of our public, private and not-for-profit partners in helping to envision new ideas that will make our city more efficient, more effective, and more engaged.

And while Digital Kitchener will be driven by the City of Kitchener over the next four years, it is not a strategy that can succeed in isolation. Crafted after 12 months of consultation with stakeholders – online, in person, through public brainstorming sessions and private meetings, Digital Kitchener is as much the community's strategy as it is ours. You helped us identify where our focus should begin, and you told us that we can't do this alone.

Together, with our partners in all sectors, we will bravely and boldly pursue ideas and decisions that will advance innovation, efficiency and a great quality of life for all in our city.

Together, we will continue to advance our reputation as a city that harnesses the power of possibility.





#DigitalKitchener