

Information & Technology

Delivering Digital Government

Rob Meikle – Chief Information Officer

General Government and Licensing Committee

March 5, 2019

I&T ORGANIZATIONAL STRUCTURE



**Rob Meikle -
Chief Information Officer**



**Lawrence Eta
Deputy Chief Information
Officer – Technology
Infrastructure Services**



**Karthi Bala
Deputy Chief Information
Officer – Enterprise
Application Services**



**Roopy Chhina
Deputy Chief Information
Officer – Architecture &
Portfolio Delivery**



**Grant Coffey -
Director Strategy &
Program Management**

A nighttime photograph of a city street with wet pavement reflecting streetlights. Tall buildings are visible in the background, and a few cars are on the road. The text 'I&T MANDATE' is overlaid in white.

I&T MANDATE

**To drive innovative Information
Technology solutions that enhance the
delivery of City Services.**

ABOUT US



The Information & Technology Division provides leadership for the strategy, planning and delivery of the City's information technology services including:

Driving City ***business modernization and innovation*** to enhance City service delivery

Enhancing the City's business processes and systems with a focus on opportunities to ***streamline and integrate***

Ensuring a ***secure, reliable*** technology environment.

DELIVERING IT OPERATIONAL SERVICES



850+ business applications
33,000 business application service requests



29,000 users,
187,000+ service desk interactions



26+ Million City Website Visits



19,000+ Mobile Devices



22,000+ computers,
4,000 multi-function printers



700+ City facilities networked
117,000 + switches, routers, hubs & ports



3 data centres
2,700 servers
7x24x365

DEFINING AND DRIVING DIGITAL GOVERNMENT

A digital government has core capabilities supported by organizational enablers

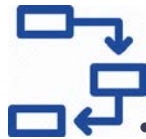


Capabilities: Resident, Visitor and Business-facing innovations



Services

- Online Service Delivery (Channel of Choice)



Processes

- Automation and simplification of transactional processes



Decisions

- Advanced predictive analytics



Data Sharing

- Information Management and Data Governance

Enablers: Innovations across government systems:



Strategy

- Alignment to City priorities



Government & Organization

- Organizational design mapped to strategic goals



Leadership & Talent

- Leadership development and programs to attract and retain digital workers



Technology

- Secure, reliable and adaptable technology platforms

DELIVERING SERVICE VALUE TO THE CITIZENS OF TORONTO



Recreation Registration

- 650,000+ Course Registrations
- 70,000 Courses
- 20,000+ Low Income Cut-Off Families
- \$70 million revenue



Transportation Services

- Vision Zero
- 42,972 Utility Cut Permits
- 2,532 Residential Paving Permits
- 652 Street Event Permits
- 59,131 Total Permits Issue



Permitting & Licensing

- 65,000 Property Standards inspections 56,000 Business, Trade & Taxi & PTC licenses and permits issued
- 160,000+ applications received
- 80,913 dog and cat licenses issued
- Film Permits for \$1 billion investment



Tax & Utilities & Tickets Collection

- Collect \$6.4 Billion thru 786,000 property tax accounts issuing 1.62 million bills
- Collect \$1.26 Billion thru 490,000 utility accounts and 1.5 million bills
- Process 2.35 million parking tickets with revenues of over \$100 million
- Administer 786,000 property tax accounts with revenues of \$5.9 billion



3•1•1

At Your Services

- 24/7 services in over 180 languages
- 979,000 general inquiries
- 475,000 service requests
- 1,454,000 total contacts

DELIVERING BUSINESS VALUE TO CITY OPERATIONS



Payroll, Salary & Benefits Administration

- \$7B+ Payroll processed
- 38,000 Employees Paid with 26 pay periods
- 52, 000 T4's Issued
- Employee & Manager Self-Service &
- Time & Attendance Management



Accounting Services & Revenue Collection

- Cash and Asset Management
- Account Receivable & Payable
- General Ledger & Financial Reporting
- Collect \$7B+ Property Tax, Land Transfer Tax, Utilities and Water Bill, Building Permits, Recreation Registration



Financial Planning, Reporting and Management

- Plan, monitor, report and coordinate \$15B+ Budget for 44 divisions, Clerks, all Agencies, Boards and Commissions
- Process \$3B capital project payments



Facilities Management

- Managed Facilities Maintenance Work Orders for 180 Facilities & 150+ Recreation Facilities



Purchasing, Materials Management

- \$1.8B Goods and Services Procured
- \$6.6 Million Inventory Warehoused



Human Resource Management

- Position Management
- Personnel Management for 37,000+
- Recruiting Administration
- Compensation Management

MODERNIZATION TRAJECTORY



CURRENT AND EMERGING TECHNOLOGY INVESTMENTS SUPPORTING THE CITY'S AREAS OF FOCUS



Housing



Mobility



Modernization



Financial
Sustainability



Employee
Experience

Enabling the foundational elements for a Digital City



Digital Platforms

Deliver City services
over digital platforms



Data

Drive Effective Outcomes
Through the Use of City and
Third Party Data



Workforce Enablement

Connected Workforce to
Collaborate Across the City to
Improve Service Delivery



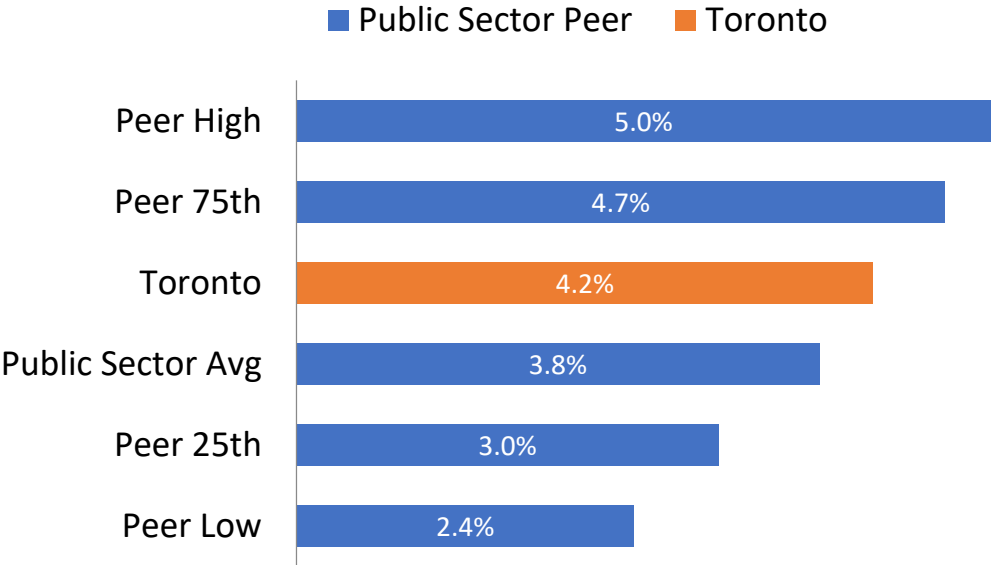
Internet of Things

Connectivity and
Management of Physical
Devices That Are Integral to
Service Delivery

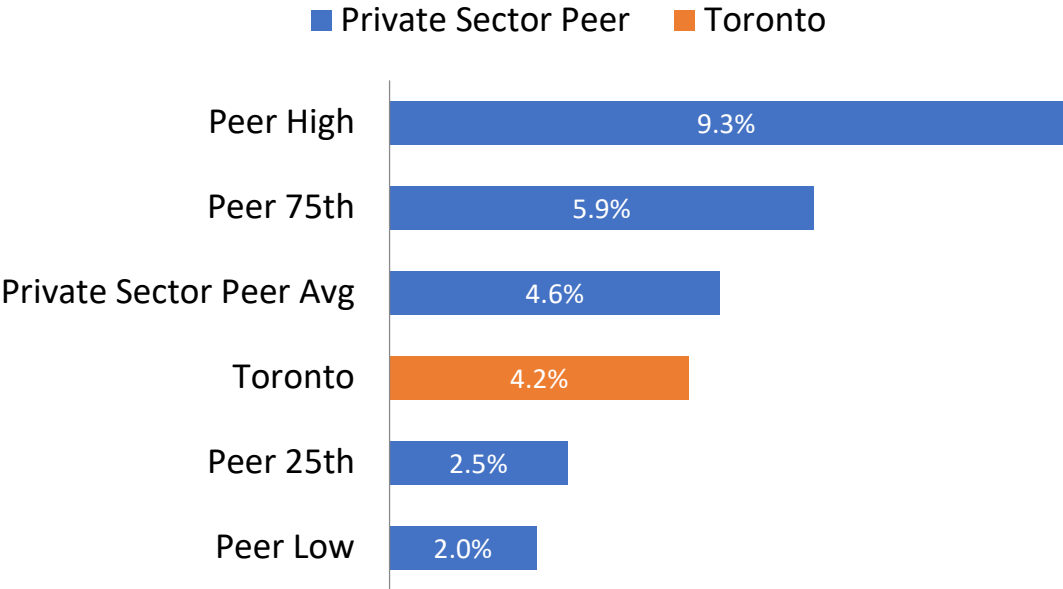
THE IT INDUSTRY BENCHMARKING STUDY REVEALS THE CITY'S IT SPEND IN ALIGNMENT TO PUBLIC/PRIVATE SECTOR PEERS



IT Budget as a Percentage of Operating Expense



IT Budget as a Percentage of Operating Expense



Corporate

Board

Policy



COMPREHENSIVE IT PORTFOLIO GOVERNANCE FRAMEWORK

Governance

Mission

PORTFOLIO PLANNING:
"Doing the right things"

Decisions

Committees

PORTFOLIO DELIVERY:
"Doing things right"

DRIVING IMPROVEMENTS WITH A FOCUS ON SOCIAL AND ECONOMIC BENEFITS



EMPOWERING CITIZENS WITH ACCESS TO CITY INFORMATION AT THEIR FINGERTIPS

24/7 availability of **open data** categorized by City Wards, City Neighborhoods, Postal Code/FSA, Census Tract, Schools and Day Care Information



ENHANCING ROAD SAFETY THROUGH TECHNOLOGY

Enabling motorists, cyclists and pedestrians to make safe routing choices based on reliable road safety indicators.

Collision and Traffic Volume Data Management system



FOSTERING NEIGHBOURHOOD DEVELOPMENT

Empowering citizens to access neighbourhood information through self serve windows of engagement using the Wellbeing Toronto web application



ADVANCING SOCIAL OUTCOMES

Embedding access, equity, diversity and human rights practices into all aspects of the City's business will lead to greater equitable outcomes for staff and residents.

Online Application for Analyzing Equity and Diversity Impacts

WHY OPEN DATA MATTERS

When government data is made open to the public, new ideas and perspectives unlock exponential potential for it to be re-used, analyzed, and correlated to help improve the City's delivery of public services, engage with citizens in government decision making, and innovate our approaches to civic problem solving.

A stable foundation and substantial investment in open data is a key contributor to the success of strategic initiatives like Smart Cities, Civic Innovation, and Open Government.

OPEN DATA MASTER PLAN



PRINCIPLES IN DEVELOPING THE OPEN DATA MASTER PLAN



Co-develop the Master Plan with the public



Focus on datasets to solve civic issues



Improve City efficiency



Remove barriers to open data and strengthen resilience

Documents and artifacts were publically available throughout the process.

THEME 1

FOUNDATION



UPDATE PUBLICATION PIPELINE



PRIORITIZE DATA RELEASES



EMPHASIZE QUALITY OVER QUANTITY

THEME 2

INTEGRATION



ESTABLISH PROGRAM GOVERNANCE



ALLOCATE RESOURCES FOR GROWTH



INCENTIVIZE TEAMS TO PUBLISH DATA



CHANGE CULTURAL PERSPECTIVE

THEME 3

CONNECTION



FACILITATE MARKET OPPORTUNITIES



ENGAGE LOCAL TALENT



CULTIVATE COMMUNITY PARTNERSHIPS

THEME 4

ACTIVATION



ENABLE EFFECTIVE USE OF DATA

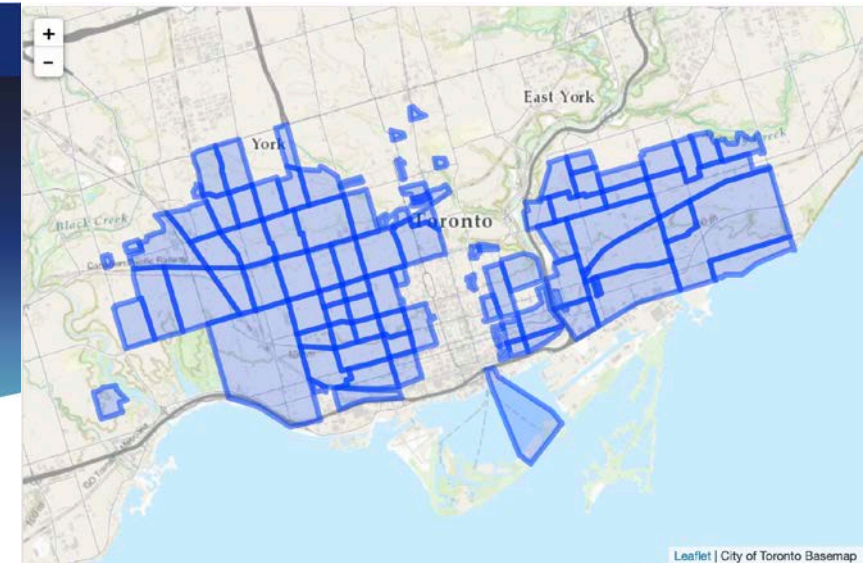
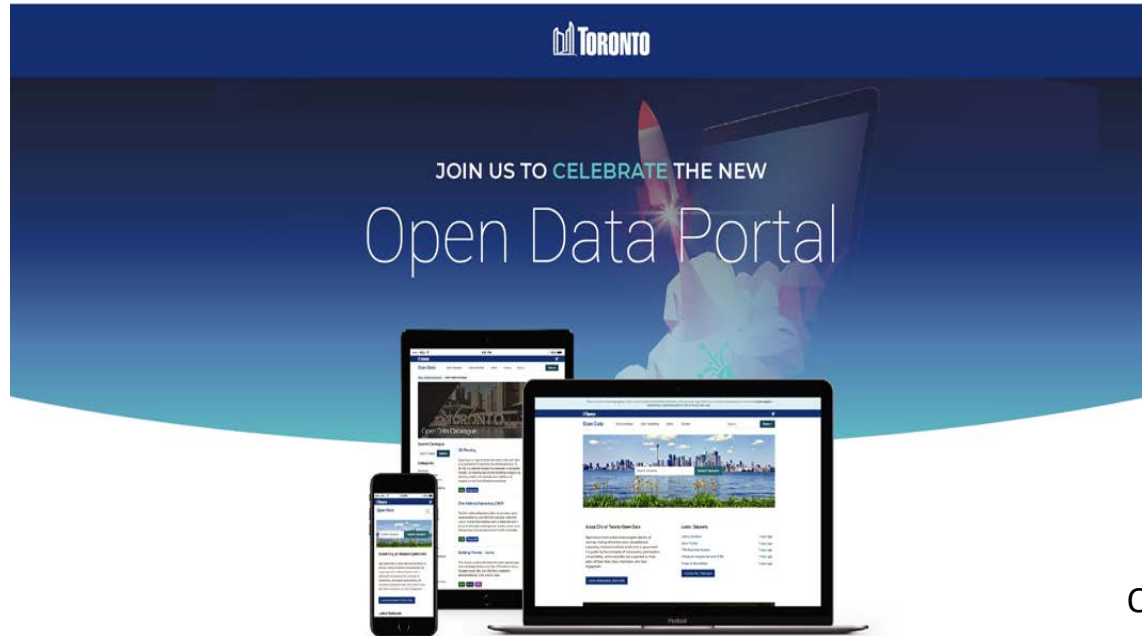


INCREASE AWARENESS OF OPEN DATA

OPEN DATA VISUALIZATION PORTAL



New Open Visualization Portal Launched on May 2, 2018



On-Street Permit Parking Area Maps – Updated Mar 4, 2019

OPEN DATA AVAILABILITY TO THE PUBLIC



Top Open Data Themes

Themes
Transit
Locations & Mapping
City Infrastructure
Public Health (Dinesafe)
Business & Finance (Budget, Licensing etc.)
Social Development (Demographics & Services)

2nd

in Canada

Public Sector Digest
Open Cities Index
(2016, 2017, 2018)

Open Data

292

Datasets

1,326+

Data Files

2,368,475+

Downloads

2018 ACCOMPLISHMENT HIGHLIGHTS



Election

Successful completion of 2018 Municipal election with results delivered to the public within 15 minutes of closing



Infectious Disease Control

Technology integration that aids in the reduction in the spread of life-threatening communicable diseases



Digital Accessibility

AODA compliant user-centric City of Toronto website accessible via multiple devices to city services



Enterprise Customer Relationship Management (CRM)

Delivered eCRM foundation platform through 311



Secure Payments

Achieved Payment Card Industry's (PCI) Data Security Standards Merchant Certification: 1st Canadian Municipality to be Level 1 certified



Access Anywhere

Evolving a digital workforce by implementing employee Wi-Fi across City work locations



Online Self Service

Enhanced online self-service licencing system that enables online application of business licences and permits

CITY OF TORONTO IT INDUSTRY RECOGNITION 2017 - 2018



**2017 & 2018
Excellence in
Municipal Systems**

Vehicle-for-Hire

Enterprise Geospatial

**Administrative Penalty
System**



**2017 & 2018 City
Managers Award**

Vehicle-for-Hire

**Administrative Penalty
System**



**2017 Digital
Transformation
Award for**

Vehicle -for-Hire

PUBLIC SECTOR DIGEST
INTELLIGENCE FOR THE PUBLIC SECTOR.®

**2017 and 2018
Open Cities Index
for**

Open Data

KEY MODERNIZATION INITIATIVES



Digital Services

Improving customer service through increased digital self-serve functionality as a lower cost, more readily available channel.



Work & Asset Management

Integrated Enterprise Work and Asset Management, improving service levels, automating cross-divisional processes, optimizing asset utilization..



Human Resources Transformation

Modernizing the Human Resources function to be more efficient, integrated, to deliver more timely and quality advice and services to divisions



Procurement & Supply Chain Transformation

Investments to transform procurement and supply chain processes to drive efficiencies, reduce cycle times and improve quality of service to City divisions



Finance Transformation

Timely, simplified access to accurate financial management capabilities to drive measurable strategic planning and quantified performance management.



Time & Attendance and Payroll Transformation

Integrated staff scheduling with electronic time reporting and automated payroll processing functionality.



Employee Productivity

Provide City employees with technology tools and intuitive IT process that enable and increase productivity.

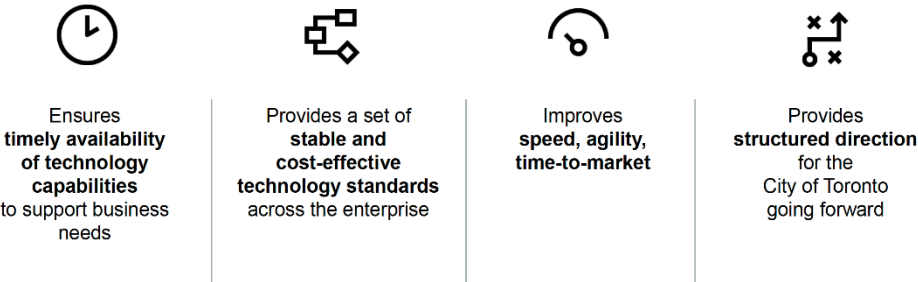
KEY FOUNDATIONAL INITIATIVES



Smart City Strategic Framework



Technology Strategy & Roadmap



Strengthening Cyber Security



Acquiring and Empowering IT Talent



IT Industry Benchmarking



IT Operating Model Modernization

CRITICAL SUCCESS FACTORS



**Focus on
integrated
service delivery
and Digital
Enablement**



**Innovation
Culture**



**Enhancing IT
Cyber Security
to respond to
demands**



**Organizational
capacity and
business
readiness**



**Optimizing the
IT Service and
Operating
model across
the City**



"An **innovative**
City that **lives**,
works &
plays"

Appendix



REPORTS COMING TO COMMITTEE IN 2019



PROCUREMENT

I&T will bring forward approximately *ten* Staff Reports related to the acquisition of IT products/services or with intent to sustain IT contracts to ensure project and service levels are maintained City-wide.

RESPONSE TO COUNCIL MOTIONS

I&T will bring forward *two* Staff Reports in response to the following motions: **MM44.85** – *Increasing Accessibility of Online Content and Materials for Public Consultations* and **MM38.17** – *Request for a report on a strategy to re-purpose City computers and IT equipment.*