

PIONEERED BY THE  
ROCKEFELLER FOUNDATION

100



CITIES

# Toronto's Resilience Strategy

Preliminary Resilience Assessment

DRIE

December 12 2017

# Purpose

1. Introduce Urban Resilience and the 100 Resilient Cities network
2. Share findings from our Preliminary Resilience Assessment (PRA)
3. Share next steps
4. Discussion and Q&A



## URBAN RESILIENCE

Is the capacity of individuals, communities, institutions, businesses, and systems within a city to survive, adapt, and grow no matter what kinds of chronic stresses and acute shocks they experience.

Milan, Italy

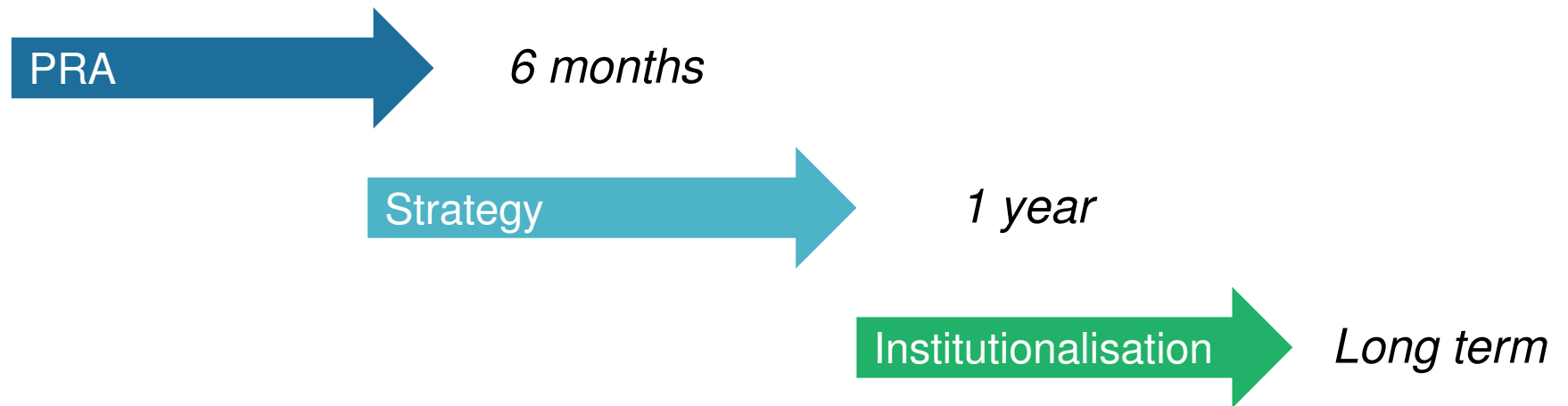
# What is Resilience?

“Resilience is a *movement*, it is not just a set of projects and actions.”

# 100 Resilient Cities Network

- Pioneered by the Rockefeller Foundation
- 100RC supports the adoption and incorporation of a view of resilience that includes not just the **shocks** — earthquakes, fires, floods, etc.— but also the **stresses** that weaken the fabric of a city on a day to day or cyclical basis.
- Support for a Chief Resilience Officer (CRO) to:
  1. Develop a Resilience Strategy
  2. Lead Toronto's participation in 100RC network
  3. Pilot projects which address our resilience challenges

# 100RC Process



# Toronto's Resilience Process

June – Dec 2017	Jan – Dec 2018	Jan – June 2019
<b>Preliminary Resilience Assessment (PRA)</b>	<b>Strategy Development</b>	<b>Institutionalization</b>
<ul style="list-style-type: none"> <li>• Setup Resilience Office</li> <li>• Engage with the 100RC network</li> <li>• Assess our priority shocks and stresses</li> </ul>	<ul style="list-style-type: none"> <li>• Policy research on strategic questions, drawing on 100RC support</li> <li>• Partner with City divisions on resilience</li> <li>• Establish pilot projects in partnership with private sector, non-profit, and other orders of government</li> <li>• City wide stakeholder engagement</li> <li>• Write the Strategy and implementation plan</li> </ul>	<ul style="list-style-type: none"> <li>• Present Strategy to Council</li> <li>• If approved, begin implementation of projects, and institutionalization of resilience in the City</li> </ul>



# Toronto's Resilience Context

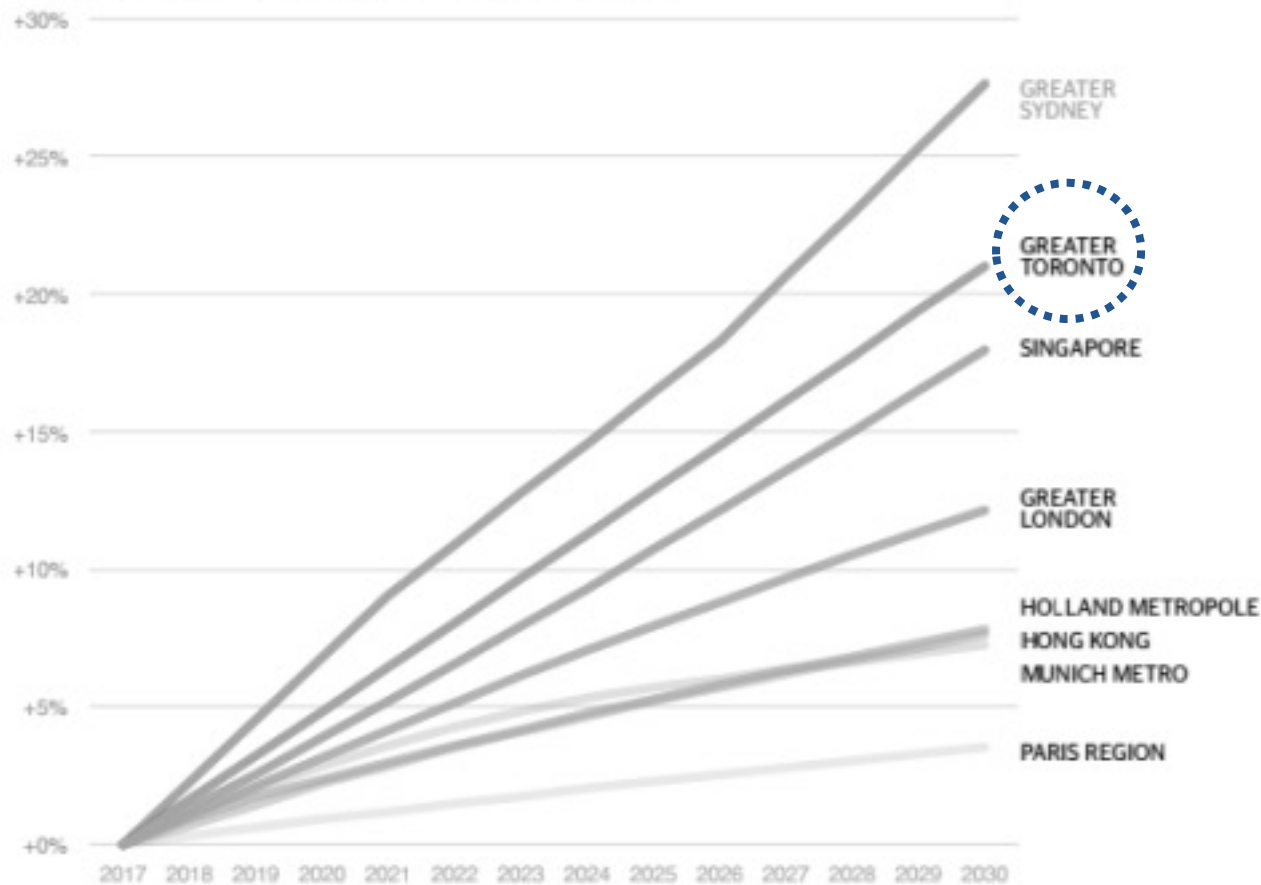
Toronto is one of the safest cities in the world, which is one of the reason we enjoy such a high quality of life

	<b>Toronto's Rank</b> (among global peers)	Source
Safe Cities Index	1	2017 EIU
Crime, Political Environment, or Safety/Disease Risk	1	2017 PWC
City Risk Index	1	2017 Lloyd's
Quality of Life	1	2017 EIU



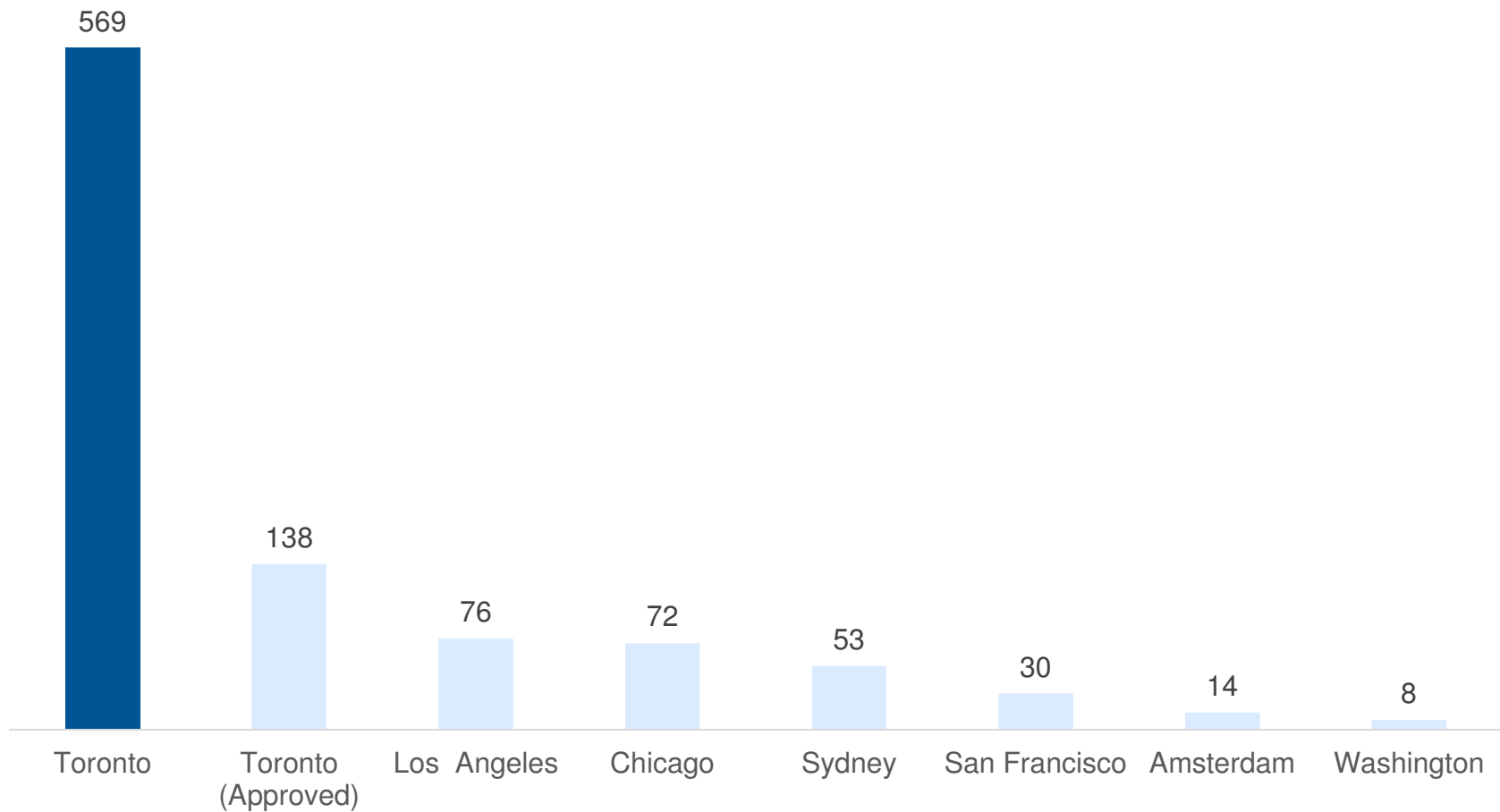
# Population Growth

Forecast Population Growth (%) 2017-2030  
(Top Table and Contenders)

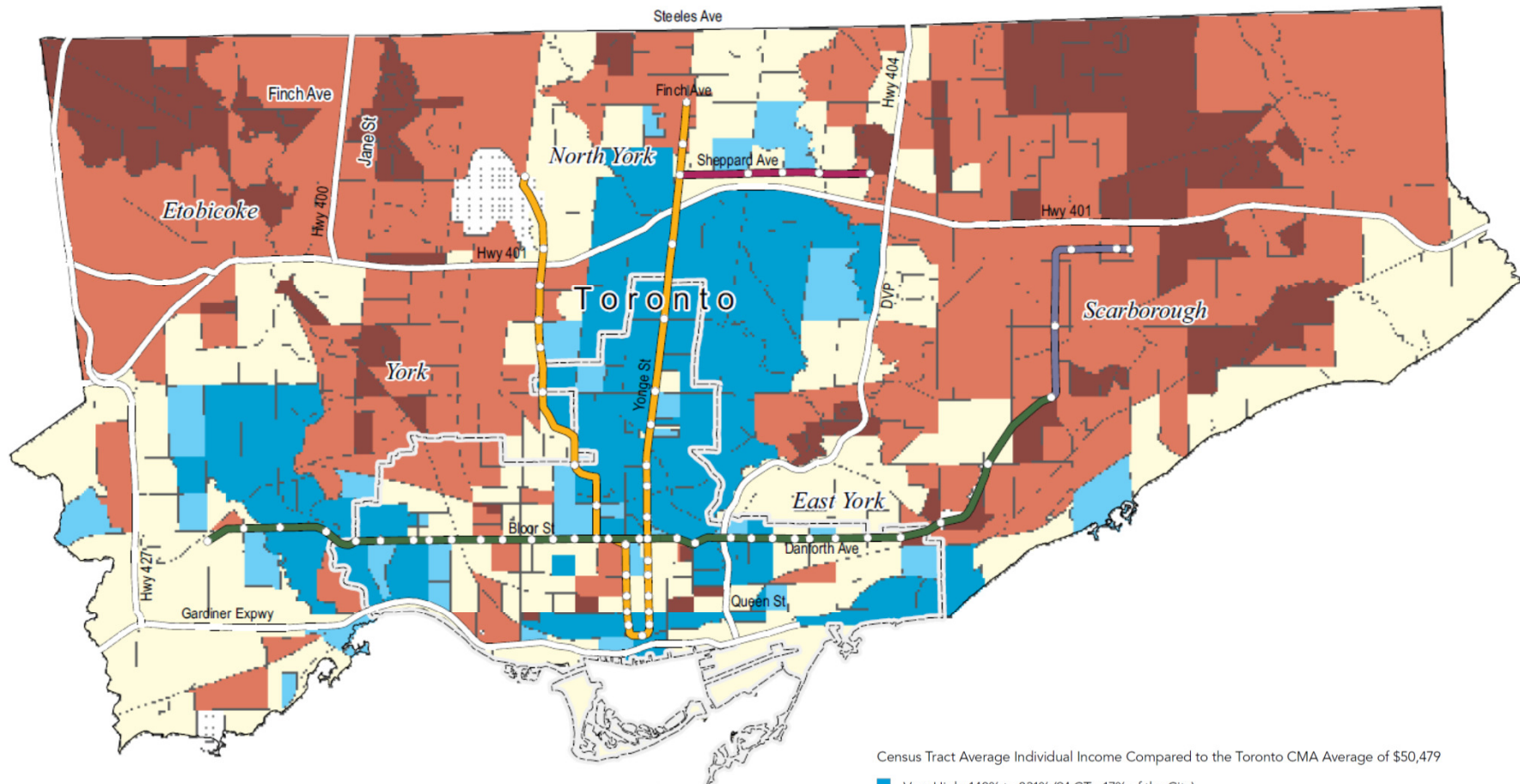


# Built Environment

Highrise Buildings Proposed, Approved, or Under Construction\*

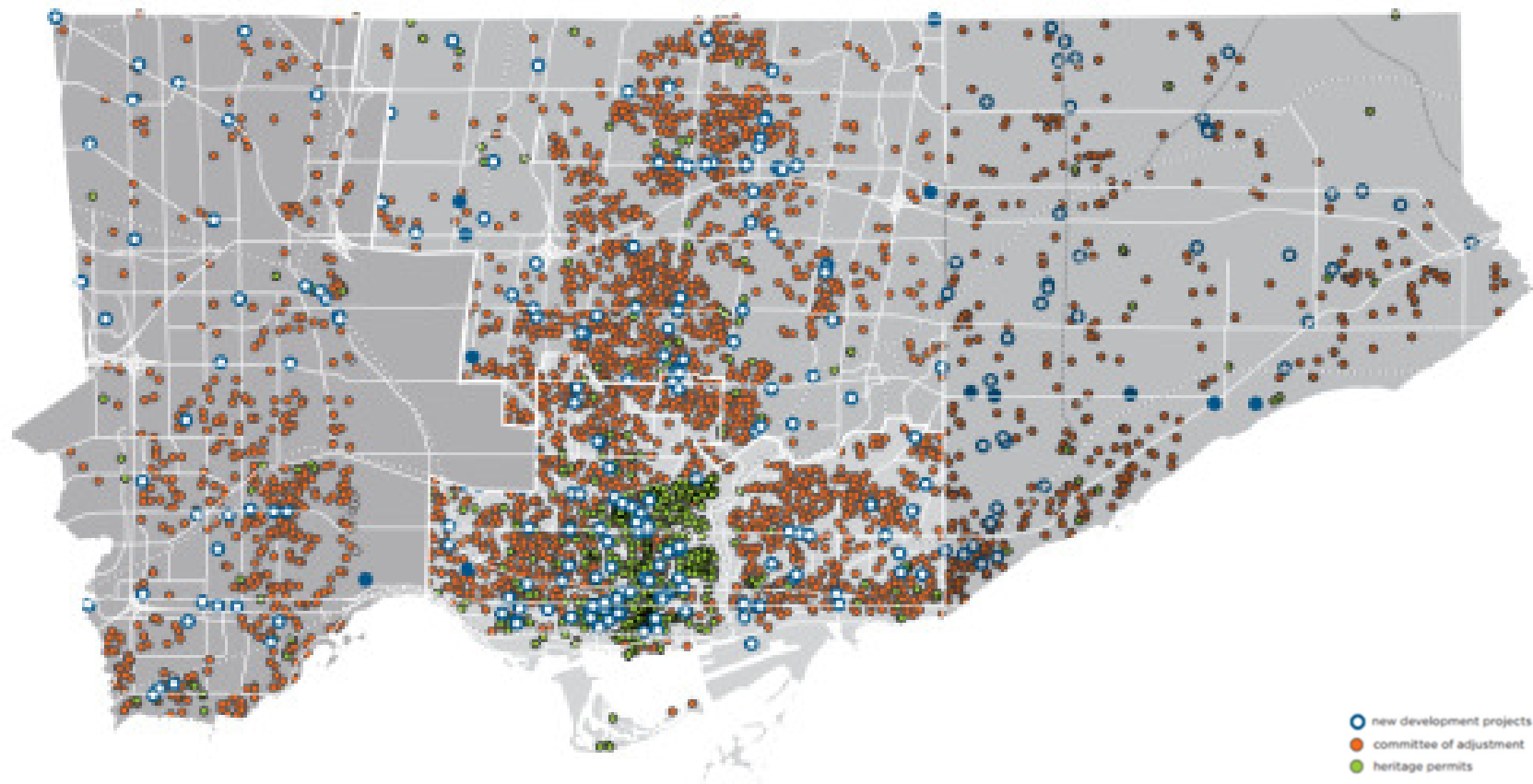


# But... growth is not shared by all



# Where are we growing the most?

New Projects, Committee of Adjustment, Heritage Permits  
in Toronto, 2016



# Equity is a resilience issue

- From evidence across the 100RC network we know that neighbourhoods with lower incomes, access to services, or social capital are
  - **Most vulnerable to shocks**
  - **Likely to do worse in shocks**
  - **Slowest to recover**
- Most jurisdictions which have suffered shocks focus on strengthening **resilience** for communities and businesses:
  - Melbourne (Victoria) following fires and floods shifted their emergency management approach to focus ‘more resilient communities’;
  - NYC resilience plan following Hurricane Sandy focuses on “strengthening community, social, and economic resilience in neighborhoods”;
  - New Orleans’s flood resilience plan focuses on equity and inclusion.

# Our climate is also changing



**DAILY  
TEMPERATURE  
MAXIMUM**

44°

celsius

2040-50

37°

2000-09



**HOT DAYS**

66

above 30°

2040-50

20

2000-09



**EXTENDED  
HEAT WAVES**

2.5

per year

2040-50

0.6

2000-09



**DAILY  
RAINFALL  
MAXIMUM**

166

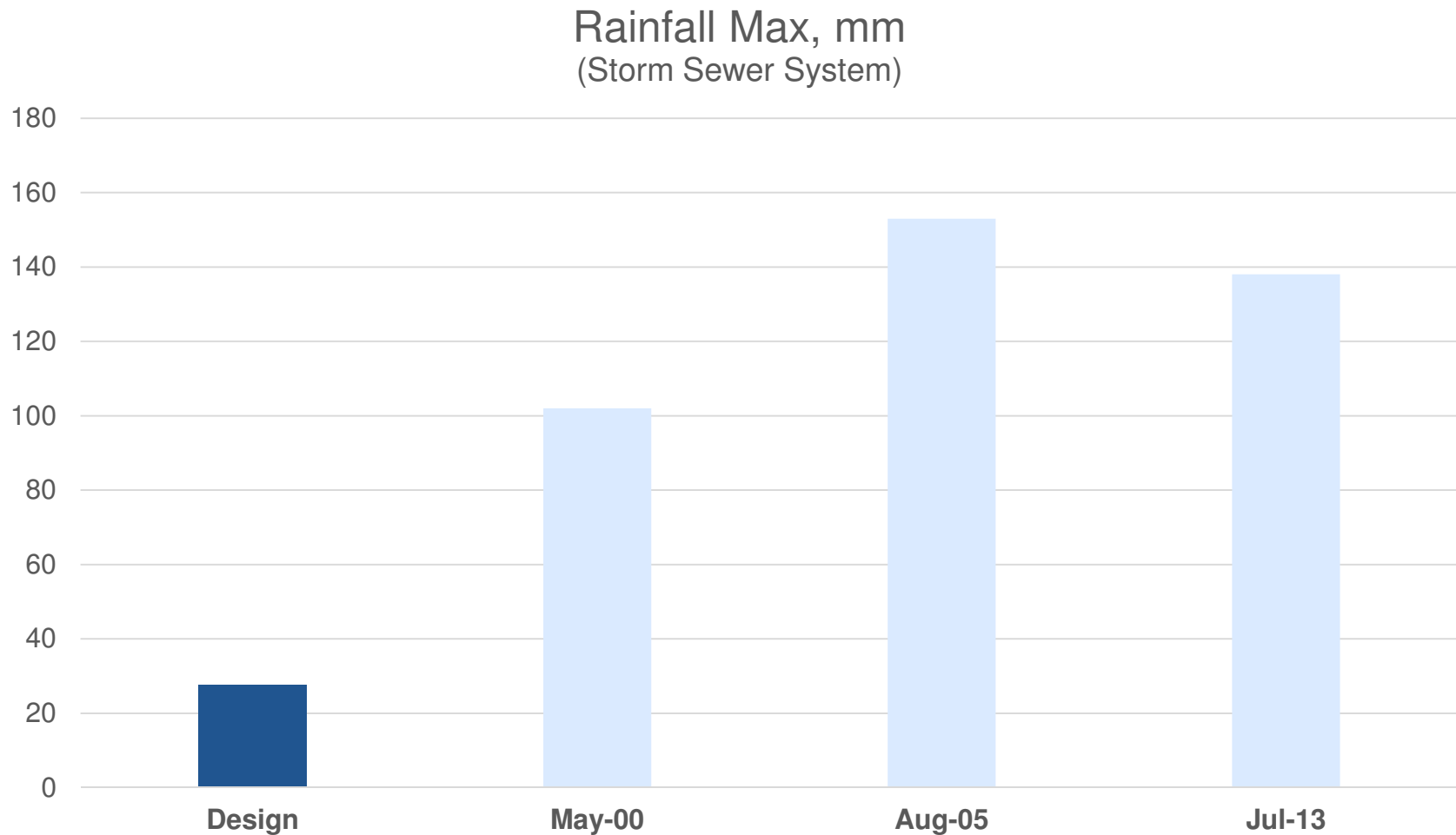
millimetres

2040-50

66

2000-09

# Climate Change and Growth





# Toronto's Shocks and Stresses

- PRA highlighted stresses related to growth...
  - Housing
  - Mobility
  - Equity
  - Inclusion and Participation
- ... And shocks primarily related to climate change
  - Flooding
  - Heatwaves
  - Blizzards
  - Energy

# Big Picture Summary

- The Resilience Strategy overall is one of three main initiatives started in 2017 supporting a **modernization of City** government.
- Taken together, the overall vision for to understand how we can leverage this moment of significant change in **Toronto for inclusive, climate resilient growth**:
  - Toronto is growing and prospering as a city, yet we have particular stresses in housing, equity, inclusion, and mobility; and
  - Toronto must prepare for the risks that are a growing part of the 21st century, particularly climate change.
- Our methodology for answering those questions will be based on extensive **participation from and partnership with** communities, businesses, and other governments.

# Next Steps

1. Policy research
2. Participation in 100RC network
3. Pilot projects

# 1. Policy Research

Supported by 100RC, staff from City divisions, and partnerships with industry and philanthropy, our topics include:

- **Building resilience in tower neighbourhoods** (in partnership with Tower Renewal and the Centre for Urban Growth and Renewal)
- **Supporting investment in lower-income neighbourhoods** (in partnership with the United Way)
- **Smart Cities and resilience** (supporting the Chief Transformation Officer)
- **Mainstreaming climate resilience into City systems** (supported by a grant from the Municipal Climate Innovation Programme)

## 2. Participation in 100RC

Partner with city divisions, agencies, boards, and commissions to access services, information, and lessons from the 100RC network, with a focus on engagement with the Canadian cities and our international peers. For example:

- **Office of Emergency Management** – supporting new director with best practice scan from the network
- **Energy and Environment** – linking resilience to TransformTO
- **Parks, Forestry, and Recreation** – on Islands and Waterfront Parks
- **Toronto Water** – on flood protection

### 3. Pilot Projects

- **Operational Guidelines for Business Resilience**, in partnership with the Building Operators and Managers Association (BOMA Toronto) and OEM
- **Home Resilience Programme**, supporting resilient homes in partnership with the Intact Centre on Climate Adaptation
- **‘The Toronto Partnership’**, investing in resilience in low income neighbourhoods, in partnership with the Toronto Foundation
- **Island and Waterfront Parks Resilience Plan**, in partnership with PFR and TRCA

# We want to hear from you!

**Connect** with #ResilientTO:  
@ellcappell and @resilientto  
resilientto@toronto.ca