PROGRAM AGENDA

TECHNOLOGY RISK AND CLIMATE CHANGE: HOW TO INTEGRATE THESE ‘THREATS’ INTO SUPERVISORY RISK ASSESSMENTS?
SUNDAY, JULY 19

08:00 Networking Tour to Niagara Falls

18:00 Program Overview, Icebreaker and Welcome Dinner

MONDAY, JULY 20

08:15 Welcome and Opening Remarks
   Babak Abbaszadeh, President and CEO, Toronto Centre

08:30 Group Photograph

09:00 SESSION 1:
   Participant Roundtable
   Participants share their expectations from the program

10:15 Coffee Break

10:30 SESSION 2:
   Context for Change
   Carl Hiralal, Chair, Toronto Centre Insurance and Pensions Advisory Board
   - Overview of emerging and key existing risks to supervised entities, consumers and financial stability
   - Supervision response to new and emerging risks and challenges
   - Integration of insurance in climate risk management and resilience building
   - How are regulators and supervisors responding to technology and climate related risks
   - Development and implementation of international standards to deal with emerging risks

12:30 Lunch

13:30 SESSION 3:
   Transformation and Evolution of Technology: Risks and Impact
   Chetan Gor, Program Leader, Toronto Centre
   - Synopsis of emerging technologies in the Insurance and Pensions sectors: Digital business models, Cloud Technology, Block-chain, Digital currency, Artificial Intelligence and Machine Learning, Big data and analytics, repackaging of e-business models and legacy systems transformation
   - How are these technologies transforming the insurance and pensions sectors
• New paradigm of operations: innovation, digital revolution, cyber security chatbots; IoT (Internet of Things); robotics driven processes
• How to build operational resilience
• Supervisory /regulatory oversight will need to keep pace with emerging technology risks
• Group activity - introduction

15:00  Coffee Break

15:15  SESSION 3 (cont’d):
Transformation and Evolution of Technology: Group activity
Chetan Gor, Program Leader, Toronto Centre

TC will provide a hypothetical case scenario that will start the exercise. Participants will be split up into groups to analyze the case (risk scenario development) and identify risk mitigating strategies and action plans. Groups will present their conclusions to the audience.

17:00  End of day
08:30 SESSION 4: Cyber Security Risks  
*Chetan Gor, Program Leader, Toronto Centre*

- Overview of cyber security risks and controls:
  - Identity and access management
  - Data protection, privacy legislation and regulatory compliance
  - Continuous development and delivery of new products
  - Increased role of cloud and other service providers
  - Threat detection and protection against attacks
  - Incident handling

- Cyber risk in insurance business - How risky is this business
- Block-chain and InsureTech: recent trends and risks
- How regulators and supervisors should monitor technology risks
- Group activity - introduction

10:30 Coffee Break

10:45 SESSION 4 (cont’d): Cyber Security Risks – Group Activity  
*Chetan Gor, Program Leader, Toronto Centre*

TC will provide a hypothetical case scenario that will start the exercise. Participants will be split up into groups to analyze the case (risk scenario development) and identify risk mitigating strategies and action plans. Groups will present their conclusions to the audience.

12:30 Lunch

13:30 SESSION 5: Index-Insurance with a Gender Lens  
*Anatol Monid, Program Director, Toronto Centre*

- How to respond to a range of issues emerging at macro, industry and micro levels to deal with climate-related risks and gender
- Relationship between micro and macro-prudential regulation and supervision
- Group activity – introduction

15:15 Coffee Break

15:30 SESSION 5 (cont’d): Index-Insurance Program – Case Study  
*Anatol Monid, Program Director, Toronto Centre*

TC will provide a case scenario that will start the exercise. Participants will be split up into groups. They will learn how to respond to a range of issues which can arise when an innovative index-based approach is introduced. Groups will present their conclusions and action plans to the audience.

17:00 End of day
08:15 Ideas I Will Use

08:30 SESSION 6:  
Climate Change Related Financial Risks  
*Michael Hafeman, Program Leader, Toronto Centre*

- Risks related to climate change
- The multi-dimensional implications of evolving climate-related risks on the insurance and pensions sectors
- What insurance and pension entities should be doing to address climate change risks
- Climate change regulatory and supervisory issues: the role of the actuaries in general and stress/scenario testing
- How to develop proportional supervisory risk assessments and response capabilities for dealing with climate-related and other environmental risks
- How to address climate-related regulatory and supervisory challenges in the pensions sector.
- Application of Guidance and other actions by international standard-setting bodies
- Potential actions that can be taken by insurance and pensions supervisors and regulators in the context of the TCFD.

10:00 Coffee Break

10:15 SESSION 7:  
Climate Change Related Financial Risks – Risk Scenarios  
*Michael Hafeman, Program Leader, Toronto Centre*

This session will explore the use of scenarios in the analysis of climate-related and other environmental risks. It will:
- Explain approaches that can be used to develop risk scenarios
- Factoring climate change into stress testing
- Explore how to analyze risk scenarios to identify the effects they might have on financial institutions, economies, and consumers
- Discuss the use of models in developing and analyzing the effects of risk scenarios
- Group activity - provide an opportunity for participants to analyze a risk scenario

11:30 SESSION 7 (cont’d):  
Climate Change Related Financial Risks - Group Activity  
*Michael Hafeman, Program Leader, Toronto Centre*

This group activity will provide an opportunity for participants to analyze a risk scenario. Participants will be split up into groups to develop and analyze risk scenarios relevant to their jurisdictions and identify risk mitigating strategies and action plans. Groups will present their conclusions to the audience. They will:
- Describe a risk scenario, such as:
  - A disaster that involves one or a combination of extreme weather-related or geological events, such as hurricane, flood, windstorm, drought, earthquake, extreme heat, etc
  - A physical risk scenario arising from chronic climate change
A scenario related to transition risk

- Identify the key direct and indirect effects the scenario might have on consumers, businesses, governments, other organizations, and financial institutions
- Analyse the effects the scenario might have on stress-testing assumptions
- Discuss steps that could be taken to enhance an entity’s risk analysis framework.

12:30 Lunch

13:30 SESSION 7 (cont’d):
Climate Change Related Financial Risks - Group Activity
Michael Hafeman, Program Leader, Toronto Centre

14:15 SESSION 8:
Informalia - Case Study
Michael Hafeman, Program Leader, Toronto Centre

Supervisors will learn how to deal with pensions regulatory and supervisory challenges, identify and assess new risks related to climate change and technology risks and overcome internal organizational constraints and practical barriers in a country that decides to expand pensions coverage to informal workers.

15:30 Coffee Break

15:45 SESSION 9:
Vulnerability of Consumers
Michael Hafeman, Program Leader, Toronto Centre

This session will focus on the vulnerability of consumers to climate-related and other environmental risks. It will:

- Discuss the ways in which consumers can be exposed to climate-related and other environmental risks
- Explore how improvements in financial literacy financial inclusion can enhance consumers’ ability to assess and mitigate these risks
- Provide an opportunity for participants to explore the challenges faced by women and girls
- Discuss steps that regulators and supervisors might take.

17:00 Financial Crisis Simulation Exercise – Briefing and Preparation
Michael Hafeman, Program Leader, Toronto Centre

17:30 End of day
THURSDAY, JULY 23

08:15  Ideas I Will Use

08:30  SESSION 10:
Financial Crisis Simulation Exercise
Michael Hafeman, Program Leader, Toronto Centre

Participants will learn from the crisis simulation how climate change, technological innovations, and economic disruptions can affect the insurance and pensions sectors and the importance of proactive supervision and inter-agency cooperation in managing crisis situations.

10:30 Coffee Break

10:45  SESSION 10 (cont’d):
Financial Crisis Simulation Exercise

12:30 Lunch

13:30  SESSION 10 (cont’d):
Financial Crisis Simulation Exercise

15:15 Coffee Break

15:30  SESSION 10 (cont’d):
Financial Crisis Simulation Exercise – Team Discussion and Debrief

Teams discuss and summarize their views/learnings/challenges experienced during the crisis simulation exercise for presentation to the whole group the following day.

17:00 End of day
FRIDAY, JULY 24

08:15 Ideas I Will Use

08:30 **SESSION 10 (cont’d):**
Financial Crisis Simulation Exercise - Teams Presentations

Participants will present and share their views and lessons learned from the simulation exercise.

10:45 Coffee Break

11:00 **SESSION 10 (cont’d):**
Financial Crisis Simulation Exercise – Feedback and Discussion
*Michael Hafeman, Program Leader, Toronto Centre*

Program Leader (Game Master) to lead the discussion on drawing out lessons related to:

- crisis preparedness
- range of responses to a crisis, incl. potential exit strategies for insurers and pensions
- importance of supervisors’ communication and cooperation during a crisis

12:00 Closing ceremony

12:30 Lunch

14:00 Social activity: “Discover Toronto” tour

18:30 Farewell Dinner at CN Tower