

IEEE Toronto Computer Society Chapter Meeting

"IBM Internet of Things Point of View and Strategy"

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Agenda

- Introduction & Chapter Focus
- Internet of Things Overview
- Main Presentation

Introduction

- Electrical Engineer (Embedded Systems)
 - “Tiny Computers, Hidden Control”

- 15+ yr Volunteer in IEEE Toronto Section
 - Instrumentation & Measurement Chair
 - Section Vice-Chair
 - Computer Chapter Chair/Vice-Chair

IEEE (Institute for Electrical & Electronics Engineers)

- www.ieee.org
- Worlds largest professional technical society
- Publishes the majority of leading research in our field (ECE)
- IEEE Standards Association have published many key standards
 - 802.3 (Ethernet), 802.11 (Wi-Fi)
- Basic membership fee is about \$200/yr

IEEE Computer Society

Keeping you @ the center of Technology

- International reach
- 550+ chapters
- 150+ standards groups
- 200+ annual conferences
- 28 Technical Committees
- 13 Magazines, 19 Technical Journals
- [Membership Video](#)

Get involved, stay involved

Your choice....

- Make lifelong friends
- Serve on a board or committee
- Join a technical committee
- Organize a conference
- Attend local chapter meetings
- Submit or review articles
- Work with a standards group



IEEE Toronto Section

- www.toronto.ieee.ca
- Active since 1903
 - Approx. 3000 members in the GTA
- Many IEEE technical societies are represented
 - Monthly meetings
- Student branches in all major engineering schools and colleges
- Computer Chapter Events
 - www.toronto.ieee.ca/computer

Computer Chapter Focus: Internet of Things (IoT)

- Technical & non-technical aspects
 - Presentations
 - Hands-on workshops
- Emphasis
 - The embedded-side of IoT
 - “Things”
 - Network access technologies
 - Wi-Fi, Bluetooth, IEEE 802.15.4
 - Getting data to the cloud

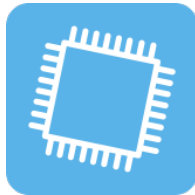


Internet of Things

Sensing



Control



Security



Connectivity



Cloud

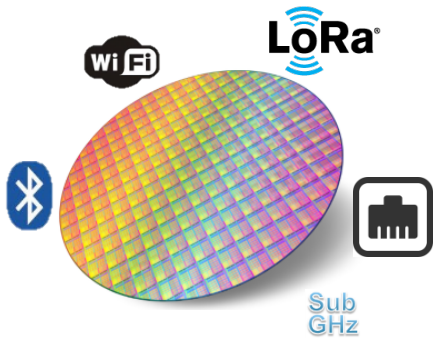


Data aggregation

**... to a secured public or
private Cloud ...**

**... to provide intelligence
based on the data**

A Complex Environment



Technologies



Standards & Alliances



Infrastructure



Regulation



Security and confidentiality



New use of technology



... Hiding the real value

- ❑ Supply Chain Management
- ❑ Preventive Maintenance
- ❑ Remote Monitoring
- ❑ Remote Control
- ❑ Asset Tracking



IoT Adoption Challenge:

Cut through the hype & technology.



Identify how can it be used to make money / save money for your client

Call to Action

- Keep in touch
 - d.cecic@ieee.org
- Join the IEEE Computer Society!
 - <http://www.computer.org/web/membership/join>
- Subscribe to IEEE Toronto E-News
 - Visit www.toronto.ieee.ca to sign up
- Future events will continue to be posted on EventBrite and Meetup

**...and now, Jim Caldwell, from
IBM!**