Weatheradio Canada

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Environment Canada

- Providing weather warnings to Canadians
- Using web technology
- Providing automated telephone services
- Using Weatheradio

Our Network

- Automated telephone service
  - Provides service to 135 locations
  - Answers more then 20 million calls annually

- Weatheradio Canada
  - 230 transmitters
  - Covers 93% of the Canadian population
  - With 32 sites north of 60

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Our current system

- Text-to-speech engines developed in the mid 90's
- 54,000 phrases in three languages
- Over 50,000 voice files produced every day
- System is located in five offices
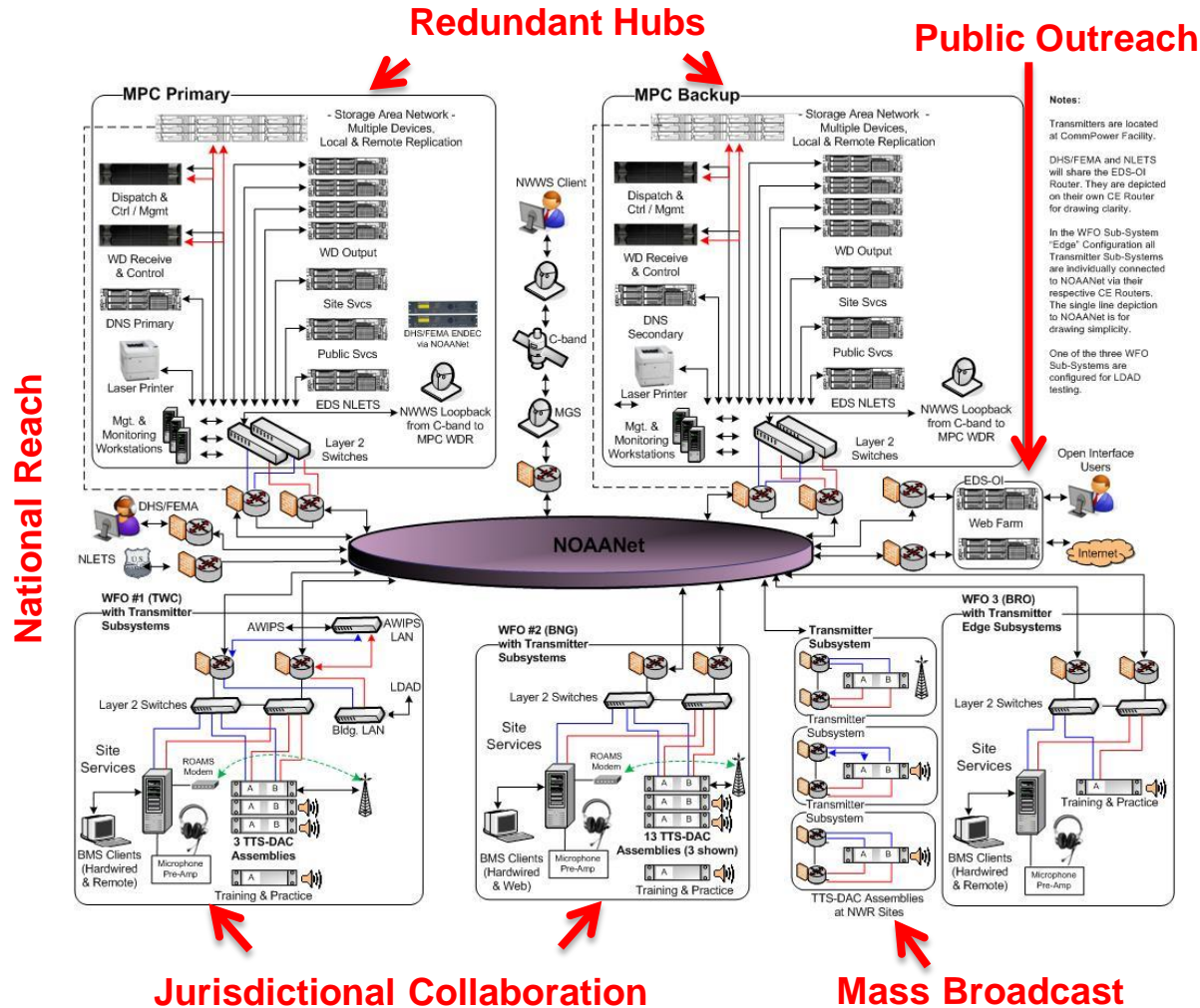- Complete automated process

Current system

- Has fallen behind changes in the system
- Does not adapt to change quick enough in support of new products and alerting systems

New System

- Adoption of the iNOTiFY system
- Centralized delivery in one location plus one backup
- Will provide an all hazards solution
- More agencies will be able add warnings to the system
- Solution will also provide voice files to the media

System NWS Beginnings

- NWS Funded National, centralized solution to replace existing 122 systems

- 122 remote portals to manage 1,000+ FM transmitters

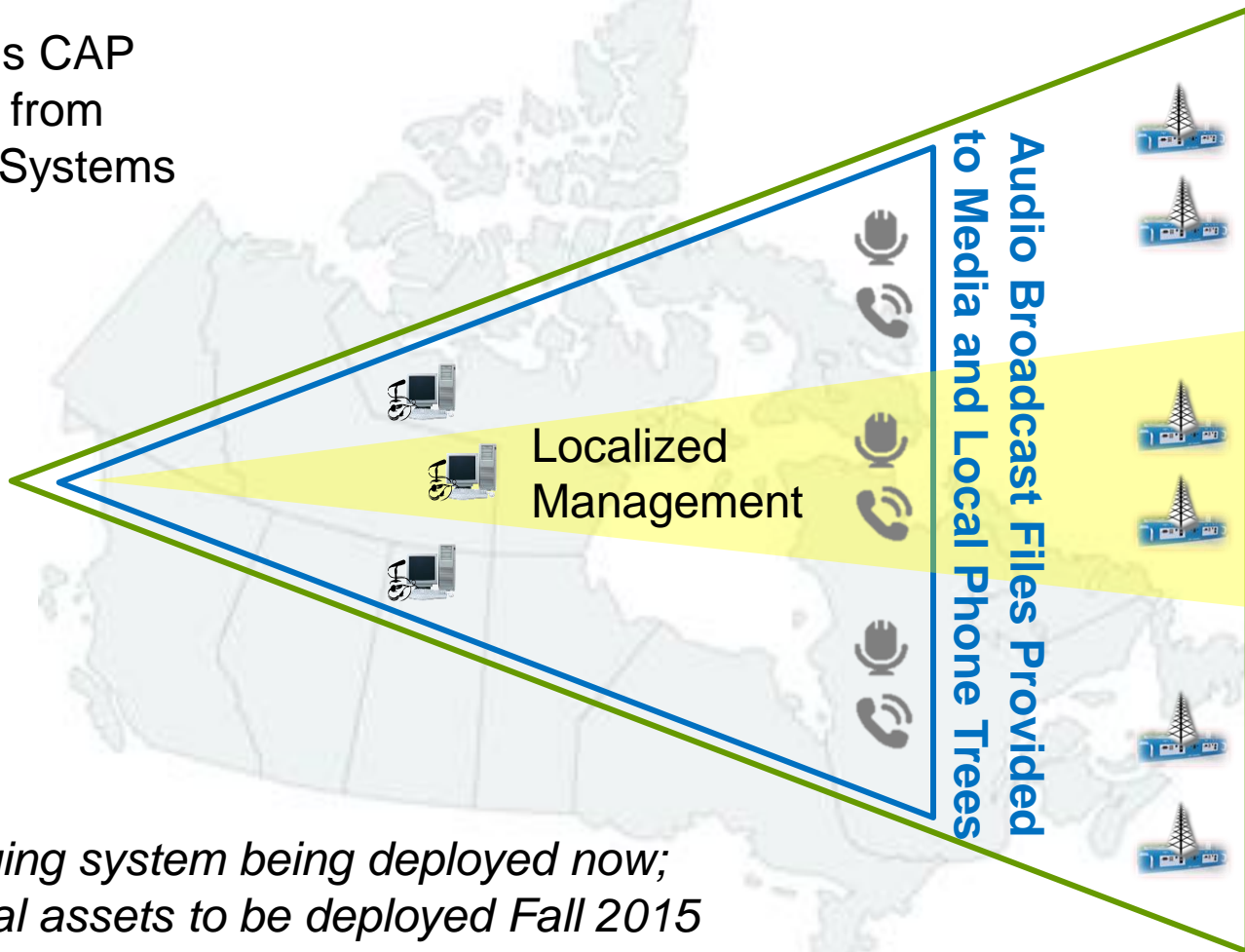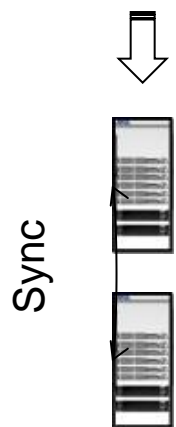- General Public and Government dissemination

Capabilities

- Centralized Architecture with Local Management
- Standards Based One-to-Many Dissemination System:
  - CAP compliant throughout
  - Same message to all
- Low bandwidth "edge" solution: 64kbps
- Multi-Format alerts/warnings/forecasts:
  - Text, Recorded Audio, Text-to-Speech Audio
- Highly configurable broadcast rules:
  - Geography, Voice/Pronunciation, Periodicity, Interrupts, Tones
- Highly extensible and adaptable, making it a viable option for other First, Second and Third World nations
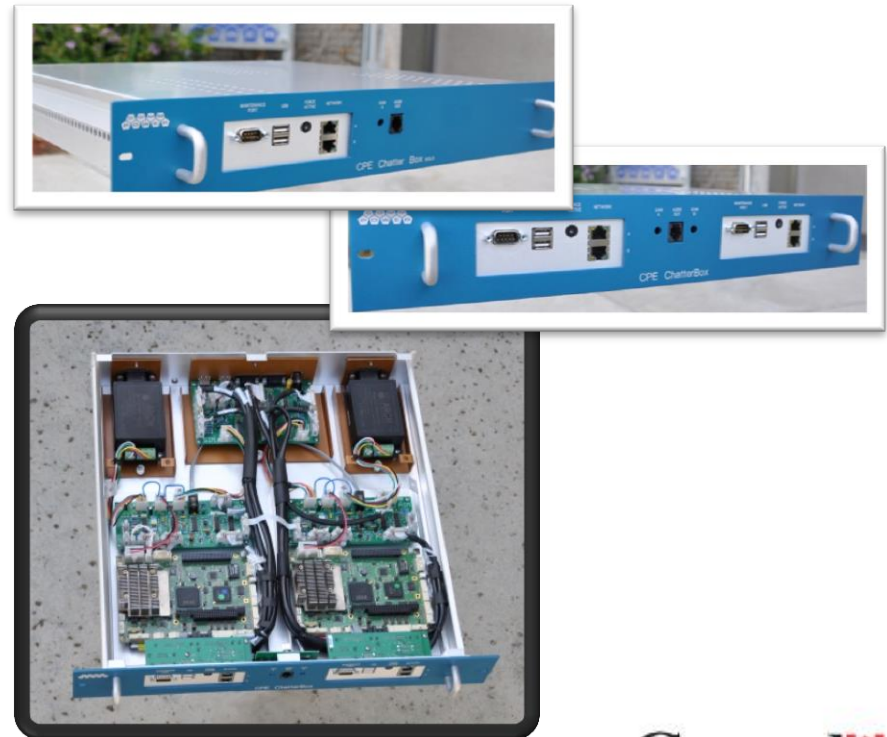
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Deployment Throughout Canada

All-Hazards CAP Messages from Canadian Systems

Sync

Localized Management

Audio Broadcast Files Provided to Media and Local Phone Trees

Audio Broadcast via 230 Transmitters

Lab/Staging system being deployed now; Operational assets to be deployed Fall 2015

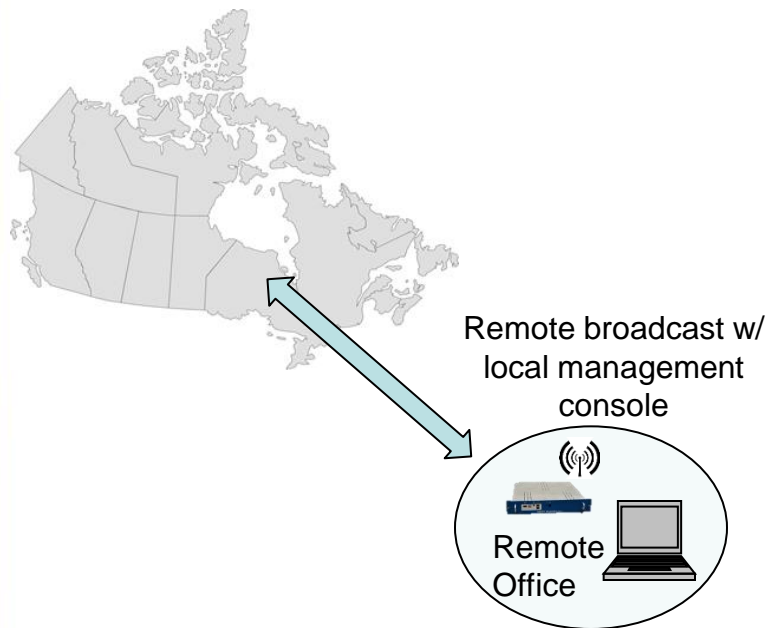Environment Canada   Environnement Canada

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ChatterBox

- The ChatterBox is a self-contained unit responsible for the broadcast of text and audio data to a co-located transmitter, speaker, public address system or other audio receiver for public notification.

    - 230+ units: one per transmitter
    - Environmentally ruggedized
    - Integrated text-to-speech engine (French & English)
    - Single configuration; upgradeable to dual configuration
    - Tool-less repairs
    - Remote diagnostics (incl. live audio monitoring) & software upgrades
    - Low bandwidth utilization: 64kbps
    - Complex broadcast rules plus tone generation

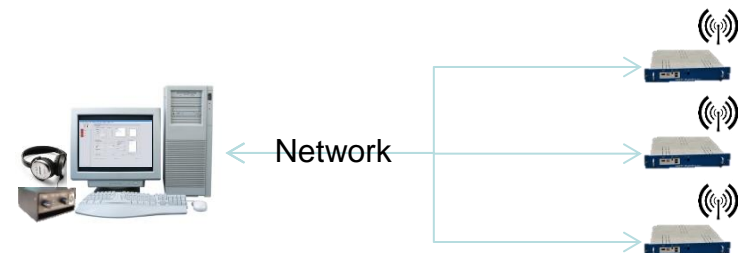Environment Canada / Environnement Canada

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Suitability for Third World Nations

Remote Office Solution

- A foreign nation or territory can operate as a remote office off of the main Weatheradio system

Remote broadcast w/ local management console

Remote Office

Standalone Solution

- System can collapse to a single box solution to be installed within the foreign nation (completely separate from Weatheradio system)

Network

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Suitability for Third World Nations (Cont)

- Nuance text-to-speech engine supports 45 languages

- Non-commercial native language broadcast can be supported via local audio recording and phonetic text-to-speech
  - Canada will be using this approach for its Inuktitut population

Leading by example, Canada is exploring use of this new solution for Haiti.

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Thank You

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