BC Hydro: Continuous Optimization for Commercial Buildings

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BC Hydro: Continuous Optimization

What’s in this presentation:

• Program objectives / overview
• Program offer
• Program design issues
• Results to date
BC Hydro: Continuous Optimization

Program Objectives:

• Obtain operational energy savings from commercial buildings

• Raise awareness around the concept of Monitoring, Targeting & Reporting (MT&R) and attempt market transformation of “best practice” with respect to building operations
Program Overview:

- **Two components:**
  - **RCx**
    - Typical “PECI” scope of work: Planning / Investigation / Implementation / Hand Off
    - Add Coaching
  - **Energy Management Information System (EMIS)**
- **EMIS + Coaching => C.Op**
Energy Management Information System

- Load profiles
- Benchmarking
- Utility Bill Analysis
- Exception Reporting
- Measurement & Verification
Program Offer:

- 100% funding for RCx consultant
- 100% funding for EMIS
  - BC Hydro revenue meter upgrade
  - “other fuel” meter upgrade (limited to pilot)
  - EMIS hardware on site
  - EMIS annual license
- Customer responsibility: 2 year simple payback bundle (25¢/ft² - 30¢/ft²)
- Eligibility: 50k ft², BAS, no major retrofits
Program Design Issues:

- Use of EMIS for M&V
- Approach to Effective Measure Life
- No incentives for implementation
- Opportunities for synergy with other programs
  - Energy Managers
  - Commercial New Construction
  - Leads for retrofit programs
  - Rates
  - Facilitate behavioural programs
Results to date:

- 260 opportunity assessments: health care, universities / colleges, school districts, property management, municipalities
- 88 signed agreements, 60+ customers, 28M ft², 41 GWh
- 1 project implemented in F2010, 10 this fiscal, 60+ next fiscal.
- Average savings from 14 studies: 8% electricity, 20% gas, 12% utility cost
- Levelized cost of program (no fuel meter support) $0.069/kWh
Thank-you
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