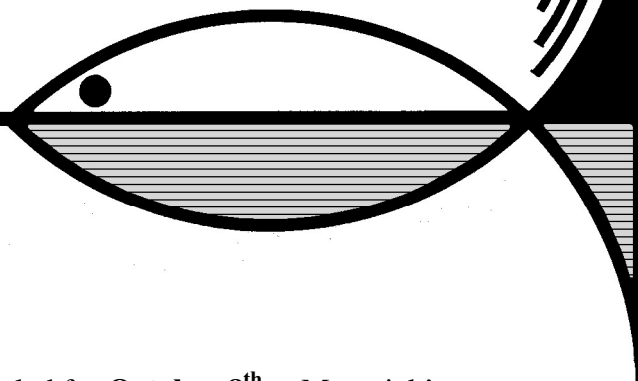


The Herring Choker

ASHRAE
NB PEI CHAPTER



2013-2014 Executive

President:

Camille Chevarie
(506) 857-8708

President Elect:

Mike Boudreau
(506) 384-3425

Vice-President:

Dwight Scott
(506) 204-2820

Treasurer:

Frédéric Bernard
(506) 857-8880

Secretary:

Sharlene Innes
(506) 857-8788

Membership:

Dan Boudreau
(506) 857-8880

Research Promotion:

Rob Hoadley
(506) 459-3940

Student Activities:

Dwight Scott
(506) 204-2820

Historian:

Devin Harinarine
(506) 857-8833

CTTC Chair (Programs):

Kevin Clannon
(506) 382-8625

Newsletter/Website:

Jennifer Chapman
(506) 857-8788

YEA Coordinator:

Kevin Leger
(506) 859-7616

Grassroots Government

Activities:

Luc Dugas
(506) 857-8880

Board of Governors:

Pierre Comeau, Eric
LeBlanc, Ken Martin
Robert McEwen, David
Samuel, Christopher
Sanderson, Yves Savoie
Chris Thompson
John Willden

The next Chapter meeting is scheduled for **October 8th** at Maverick's Steakhouse & Grille (40 Lady Ada Blvd., Moncton)

This month's meeting will feature a presentation by Rick Lawlor P.Eng. Rick will be speaking on Energy Recovery from Waste Water.

A social hour will begin at 5:00 PM with a cash bar, followed by the presentation at 6:00 PM, and dinner at 7:00 PM.

Executive Meeting Notice

A reminder to the Executive, Board of Governors, and the Committee Chairpersons that the Executive meeting will start at 3:30 PM at Maverick's Steakhouse & Grille.

"The US Department of Energy website states that a staggering 350 billion Kw-Hrs of energy is discarded annually through drains. This represents only the energy from water-heaters tested by DOE. The addition of wastewater energy from industrial, institutional, and commercial activities significantly expands this figure. Mechanical Energy-recovery technology is available to address the extensive energy opportunity that has been ignored for years."



Representing:
Baltimore Aircoil of Canada
Division of Baltimore Aircoil Interamerican Corporation

GERRY WASELYNCHUK
PRESIDENT

Aquavap Indotect Agencies (NB) Inc.
120 RIDEOUT STREET
MONCTON, NEW BRUNSWICK E1E 1E2
VOICE: (506) 857-8744
FAX: (506) 857-8890
e-mail: gerry@aquavapgroup.ca




plomberie et chauffage
climatisation - traitement d'eau

506-877-1077
www.aphd.ca

ADVANCED
plumbing & heating
climate control services - water treatment



MCW
Maricor
A Division of MCW Consultants Ltd.

77 Vaughan Harvey Blvd., Suite 200
Moncton, New Brunswick, E1C 0K2
Telephone: (506) 857-8880
Cell: (506) 874-8042
Facsimile: (506) 859-8393
E-mail: rmcewen@mcw.com
Internet: www.mcw.com

Robert McEwen, P.Eng.
Mechanical Design Engineer

Moncton Saint John Halifax Thuro Toronto Winnipeg Vancouver

Speaker Biography:

Rick is a Mechanical Engineering graduate of UNB (1980) and a 30+ year HVAC Industry veteran. Following graduation he entered the field of Engineering Sales with the Trane Company, with field-assignments initially in Saint John and Ottawa, before entering the Graduate Training program in LaCrosse Wisconsin. Post-training, further field-sales assignments in account management followed, beginning in Toronto (1981) and Hamilton (1984). Rick's activities and responsibilities during his engineering career included the selection and application of HVAC equipment from simple packaged Unitary systems, to centralized Air-handling and Chiller-plants, heat-recovery technologies, VAV systems, and the deployment of System-level Building Controls for energy optimization. Rick held Sales Leadership and Management roles in Hamilton and in Toronto between 1995 and 2010, where he oversaw experienced and junior graduate engineers, sales teams, and support staff. As well, he was responsible for implementation of corporate plans and initiatives to meet company financial and growth objectives.

In 2010 Rick ventured out as a Consultant within the HVAC Equipment Industry to help private firms and manufacturers grow and meet equipment Sales objectives. In 2013 he partnered with International Wastewater Systems (IWS) of Vancouver BC in efforts to commercialize and expand IWS presence and exposure in the arena of emerging Green technologies.

Rick acquired LEED AP certification in 2009, is a registered P. Eng in Ontario, and is a member of ASHRAE. He resides in Hamilton Ontario and enjoys time at the family summer home along the lower St. John river.

Summary of September 10th Meeting:

September meeting was a presentation by Marc Naccache of Enertrak on Demystifying Electronically Commutated Fan Motor (ECM) in Data Centers.

The presentation highlighted the various factors that contribute to the ECM motors in a data center application, how to measure efficiency in data center applications, the technology of EC motors and applying the technology in different environments.

SCAN AIR BALANCE 1998 LTD.
Certified Member AABC

HVAC
Air & Water Balancing • Duct Leakage Testing

MEDARD LEBLANC


50 Driscoll Crescent, Suite 200
Moncton, N.B. E1E 3R8
Tel: (506) 857-9100
Fax: (506) 857-1719
scanair@nb.aibn.com




Hatch Mott MacDonald

Camille Chevarie, P.Eng.
Senior Project Engineer

50 Cameron Street
Moncton, NB E1C 9A9 Canada
T 506.857.8708 F 506.857.8989
camille.chevarie@hatchmott.com



Victaulic

Brad McAllister
Sales Representative

155 Canaan Drive, Suite #411
Dieppe, NB E1A 0W4
bmcallister@victaulic.com

Cust. Service: 1.877.426.3500
Fax: 506.384.3617
Cell: 506.875.3352



TWEEDIE & ASSOCIATES
CONSULTING ENGINEERS LTD.

Stephen Tweedie
P. Eng., LEED AP, CBCP

33 Pine Glen Road
Riverview, NB E1B 1V3
Tel. (506) 383-8223
Fax. (506) 382-8223
Cell. (506) 852-1570
e-mail. stweedie@tace.ca

PEERLESS CONSULTING LTD.

François Thériault, P.Eng., LEED AP

Tel: (506) 387-3083 Fax: (506) 387-3089
E-Mail: Francois.Theriault@nb.abn.com
www.peerlessconsultingltd.com
106 HILLSBOROUGH ROAD, RIVERVIEW, N.B. E1B 1R3

chantal.daigle-verrier@exp.com
r +1506.858.1300 x8293
40 Henri Dunant Street
Moncton, NB E1E 1E5
CANADA

exp.

Chantal Daigle Verrier, P.Eng., LEED AP, CMVP
Manager | Energy Practice | Moncton

Why we used ECM motors in Data center application:

Some reasons to implement the EC motor technology in computer room is social reasons such as depletion of fuel reserves and global warming. Financial reasons such as energy used and operating costs. Design reasons are also a major factors that affect the implement of the EC motors technology.

The data center managers must pay special attention to energy consumption related to the operations of data centers and evolution of their rooms both energy levels and design. The technologies have evolved in the last 12 years to support IT changes such as compression, ventilation etc...

The energy usage in a data centers:

- 100 times the density of a commercial building
- 24 hours of operation per day
- 365 days of operation per year

How to measure efficiency in data center applications:

The current energy landscape of data centers is servers 46%, UPS 8%, Lighting 4%, HVAC Fans 8%, HVAC mechanical cooling 23% and other energy consumption 11%. The average percentage of the total energy consumption of HVAC space is about 31% after the servers 46% and therefore we have all the responsibility to reduce the energy consumptions.

Energy efficiencies measures:

- **DCIE** Data Center Infrastructure Efficiency
- **PUE** Power Usage Effectiveness (total energy consumption of the space/energy consumption of IT equipment)

EC fans have been accepted as the latest in energy efficient air movement technology. The EC motor is a DC motor receiving AC power via an integrated electronic card.

EC fan motors are:

- Permanent magnets
 - high efficiency, synchronous operation and not slip losses.
- Power electronics
 - each individual motor → redundancy
 - variable speed (continuously variable or in steps) → load matching

Master
REFRIGERATION | HEATING | AIR CONDITIONING

Kevin Clannon, CET
Senior Applied Sales
Specialized Equipment
kclannon@master.ca

The Master Group L.P.
186, Dieppe blvd.
Dieppe (N.B.)
E1A 6P8

T 506.382.8625
C 506.875.0675
F 506.382.8626
1 888 577.8625
www.master.ca

xylem
Let's Solve Water

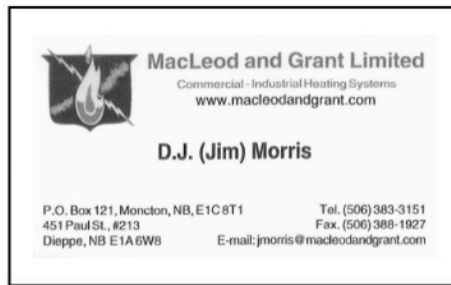
Bill Hooper, C.E.T.
Market Development Manager
Residential and HVAC
Residential and Commercial Water

Xylem
87 Auburn Way, Quispamsis, NB, E2E 5C3 Canada
Office 506 849 0334
1 888 488 4033
Fax 506 649 8485
Cell 506 643 1554
bill.hooper@xyleminc.com

SCD S.C. DELONG
Sales Inc.

Stephen DeLong

15 Henry Lorne Dr., Lower Coverdale, N.B., E1J 1C4
Tel: 506-387-4412 • Fax: 506-387-4942



- Controls electronics
 - convenient customer interface
 - process control, proportional–integral–derivative controller (PID controller)
 - direct digital control DDC
- Completely integrated system
 - complete overload protection, electrical filters, ease of wiring, compatibility, low sound, warranty
- Coupled to high-efficiency fans of various types and numerous sizes

Completely integrated in motor casing:

- Compatibility with the motor
- Line side filters for low emissions
- harmonics, radiofrequency & conducted noise
- Overload protection
- Low start-up current
- Low sound
- Simple hookup

Controls:

- Process control integrated PID loop
- 0-10V, 4-20mA, dry contact
- Modbus communication for commissioning + diagnosis from remote
- Sensor signal conversion from analog to DDC at no cost.
- Very detailed motor information for advanced load management

Some of the key feature of the EC technology:

- Ventilation
- Condensing boilers
- Cleanroom manufacturing- ceiling filter units with active power factor controls.
- Air- cooled condensers.
- Walk- in coolers, display case.
- Vending machines, coolers

Marc Naccache delivered a very informative presentation on the latest technologies in Data Centre Cooling. Marc demonstrated the advantages and disadvantages of each type of technology from an energy and application standpoint.

CONTROLS EQUIPMENT™

Brian Dutt, MBA / CEM
President
Head Office

Office (506) 874-4043
bdutt@controlsequipment.com
controlsequipment.com

J.F. Taylor Enterprises Ltd. 

Manufacturer's Agents for
Plumbing, Heating &
Humidification

Andrew G. Campbell - Owner
Barry Marchand - Owner

Proudly Serving Atlantic Canada

170 Millennium Blvd
Moncton, N.B.
E1E-2G8

Phone : (506)-389-3739
Fax : (506)-856-5972


Leaders in Green Plumbing

VISIT OUR WEBSITE: WWW.JFTAYLOR.CA

Andrew Williamson
Sales Engineer


TRANE

Atlantic Division
120 McDonald Street, Suite "G"
Saint John, NB E2J 1M5
Toll Free: 1-866-338-7263
Tel (506) 633-2300 Fax: (506) 633-2310
Cell (506) 609-0096
andrew.williamson@trane.com
www.trane.com


Ingersoll Rand.

NB/PEI ASHRAE Chapter Meeting Schedule 2013/2014

October 8, 2013

Topic: Energy Recovery from Waste Water

November 12, 2013

Topic: New Generation of Water Source Heat Pumps

December 10, 2013

Topic: Real Estate

January 7, 2014

Topic: Building a Smart Building for a Low Construction Cost

February 11, 2014

Topic: Low Temperature Heating / LEED

March 11, 2014

Topic: Dehumidification for natatoriums and Ice Rinks

April 8, 2014

Topic: Distinguished Lecturer – To be Announced

May 7-8, 2014

MEET Show

June 10, 2014

Topic: To Be Announced

Social Events



ASHRAE NB/PEI CHAPTER
AFTERNOON OUT WITH THE MONCTON MIRACLES

Date and Time: Sunday November 17th, 2013 at 2:00 PM

Information & Registration: www.ashraenbpei.com

CORRECTION

The 2013 Golf Tournament Closest to the hole winner in the September Edition of the Herring Choker was incorrect. It should have read Mark McGinnis from Tweedie & Associates.

ENERTRAK INC.
DISTRIBUTOR OF HVAC EQUIPMENT

www.enertrak.com

 MITSUBISHI ELECTRIC  CANCOIL  DESERT AIRE

 Marvair  STULZ  DUNHAM-BUSH

ERIC LEBLANC, P. Eng.
10-297 COLLISHAW, MONCTON, NB E1C 9P2
T 506.855.3365 F 506.855.3370 C 506.875.0978



Your complete
HVAC
Supplier!

290 Baig Blvd.
Suite B14
Moncton, NB
E1E 1C8

GLOBAL
Mechanical Systems Ltd.
www.globalmech.com

Ph: (506) 857-4887 Fax: (506) 857-1989

 **Advanced Energy Management Ltd.**
Putting our energy into saving yours


222 Edinburgh Drive, Unit 1
Moncton, NB E1E 4G7

Doug Briggs
Customer Representative

Tel: (506) 857-0818 Ext 681
Fax: (506) 857-0867
Cell: (506) 878-7092
Email: dbriggs@aemltd.com
Web: www.aemltd.com

 **ALERTON**
AUTHORIZED DEALER

Gary Hoadley
Senior Mechanical Engineer



Crandall Engineering Ltd.
1077 boul. St. George Blvd., Suite 400
Moncton, NB Canada E1E 4C9
Tel: (506) 857-2777
Fax: (506) 857-2753
Cell: (506) 866-1976
gh@crandallengineering.ca
CRANDALLENGINEERING.CA