

Shaping Tomorrow's Built Environment Today

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ASHRAE LONDON CANADA CHAPTER #116

TOPIC TOUR-FANSHAWE COLLEGE School of Tourism, Hospitality and Culinary Arts

130 Dundas Street, London former Kingsmill's department store



City of London 2019 Urban Design Awards WINNER: Adaptive Reuse or Rehabilitation

MONDAY NOV 25/2019

5:30pm to 5:40pm assemble and signin 5:45pm to 6:00pm basic building information presentation 6:00pm to 7:00pm building tours (dividing into 2 or 3 groups) 7:00pm to 7:30pm main presentation 7:45pm to approx 8:45pm Dinner in The Chef's Table

MEETING LOCATION
130 Dundas Street

parking – you will need to find a location on the streets (free after 6:00pm) or in a local parking lot

\$60 for MEMEBERS \$20 for STUDENTS



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NOV TOPIC TOUR - FANSHAWE COLLEGE School of Tourism, Hospitality and Culinary Arts

The downtown building previously occupied by Kingsmill's department was purchased and renovated to become the home for Fanshawe College's Schools of Information Technology and Tourism, Hospitality and Culinary Arts. The 114,00 stft facility house more then 25 programs.

From the Fanshawe College web site

Designed by Diamond Schmitt Architects and Philip Agar Architect and built by EllisDon, the building features include:

- 7 storeys
- 25 student-focused spaces, classrooms, labs and study areas
- More than \$1 million in kitchen equipment in the Spriet Family Culinary Centre
- A living wall more than 20 feet high, containing more than 200 plants of several different species
- 250 wireless access points

Nods to the Kingsmill's department store are found throughout the building. Yellow brick, manufactured in London, and wood beams from the 1930s provide architectural accents. The Chef's Table restaurant and the Downtown Campus Store, Fanshawe's retail space, features restored tin ceilings.

A number of memorable Kingsmill's artifacts have been incorporated: the Kingsmill's safe remains in the basement; a former elevator cab has been transformed into a fitting room in the Downtown Campus Store; and tucked underneath the second floor staircase is the refurbished pneumatic tube system, which was used to exchange sales bills, cash and receipts between the main office and the sales floor.



Dinner The Chef's Table at Fanshawe College

The Chef's Table at Fanshawe College is a restaurant and café...

- Offering a fun, relaxing and inviting atmosphere;
- Serving locally sourced food with a sustainable focus and international flavours;
- Delivering outstanding guest experience and service.

The Chef's Table at Fanshawe College provides hands-on learning opportunities for students of Fanshawe's School of Tourism, Hospitality and Culinary Arts.



ASHRAE LONDON CANADA CHAPTER #1160

http://LondonCanada.AshraeChapters.org

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Chapter President's Message

Thank you to all the members that came out to support our student night last month. The location was selected specifically with the students in mind. And although we ran into a few technical difficulties, and some bowling alley noise, it all fit in with the true spirit of student night. Special thanks goes out to our student sponsors who made this night possible.

Getting back to more traditional ASHRAE meetings I am excited to announce that we will be heading the Fanshawe College next for a tour of the building mechanical systems, overview of BAS and building energy metering. This will be follow by a meal put on by the culinary school, which is sure to be one of the culinary highlights of the year. Be sure not to miss this event!

James Scudamore (email: jscudamore@ztr.com) 519-452-1233 x512 ASHRAE London Canada Chapter Chapter President 2019/2020

ASHRAE Membership

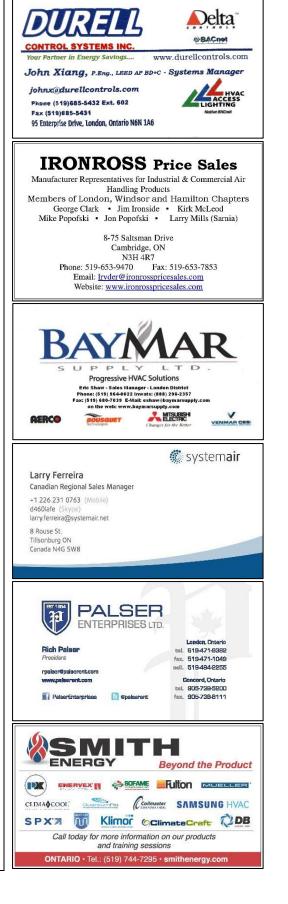
New members list for this year: Vamsi Ram Athuluri Ryan Wood Zlatko Afic Larry Ferreira

If you know a colleague that may benefit from an ASHRAE membership, please let me know.

Jeff Armstrong (email: <u>Jeff.Armstrong@trane.com</u>) 519-453-3010 x814 ASHRAE London Canada Chapter Chapter Membership Promotion Chair 2019/2020

Oct Meeting Summary

ASHRAE London hosted ASHRAE Distinguished Lecturer - Hoy R. Bohanon, Jr., P.E.President - Hoy Bohanon Engineering at the Oct meeting. Mr Bohanon presented Applying ASHRAE Standards to Existing Buildings. A review of some of the ASHRAE standards and items to be considered was presented when working on existing buildings.





ASHRAE LONDON CANADA CHAPTER #1160

http://LondonCanada.AshraeChapters.org

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SOMERS **Professional Development** Need hours for your professional development requirements? Be sure to attend a chapter meeting. Professional Engineers Ontario requires Scott Turner, Technical Sales Rep members to have yearly professional development training recorded 96 Meg Drive, London, Ontario N6E 3T7 through the Practice Evaluation and Knowledge (PEAK) program. Other Phone: 519-681-1977 Fax: 519-686-9324 Cell: 519-673-9182 groups may also require continuing education. Email: scott@somersep.com Chapter Upcoming Meetings TRANE Dec 5, 2019 – Social THE REC ROOM CF Masonville Place, 1680 Richmond St, London Jason Vandenberghe Technical Sales Representative *** be sure to check web site for latest information *** http://LondonCanada.AshraeChapters.org AQUATECH Sales & Marketing Inc. 4390 Paletta Court Burlington, ON L7L 5R2 Bus: (905) 631 5815 Fax: (905) 637 8655 **Registration Now Open** G.T.A. Bus: (647) 288 0980 Cell: (519) 670 8066 Email: jasonv@aquatech.ws www.aquatech.ws ORL Jim Bender, P.Eng., LEED APs ASHRAE Contracting Sales **2020 WINTER CONFERENCE** iim hender@hts.com C 519.871.0866 **HTS London** Feb. 1-5 | AHR EXPO Feb. 3-5 320 Neptune Cres London, Ontario N6M 1A1 T 519.457.6700 Ext. 2601 F 519.457.8900 Toll Free 800.341.3110 ontario.htseng.com **2020 ASHRAE Winter Conference** Orlando, FL | February 1–5, 2020 Belnor https://www.ashrae.org/conferences/2020-winter-conference-orlando The technical program for the 2020 ASHRAE Winter Conference, to be held Arun Arora Account Executive Feb. 1–5, at the Hilton Orlando is now available online and in ASHRAE 365 Tel: 905-264-6372 Ext. 204 phone app. Registration for the conference provides entry to the co-Fax: 905-264-6432 sponsored AHR Expo, held Feb. 3-5 at the Orange County Convention aarora@belnor.com Center. The conference's technical program offers over 100 technical sessions, 300 speakers, and more than 150 PDHs. SPX **AHR Expo** 2020 03 Feb 2020 - 05 Feb 2020 >Marley https://ahrexpo.com/ >Recold



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Johnson

Members Save 20% Everyday in ASHRAE Bookstore

ASHRAE members automatically receive a 20% discount on ASHRAE's expansive catalog of standards, guidelines, seminars, textbooks, papers and design guides. Log in and the member discount is automatically applied to pricing. Shop Now: <u>https://www.techstreet.com/ashrae/ashraegate.html</u>

Related Articles

Writeup within: Canadian Consulting Engineer <u>ASHRAE prepares new net-zero HQ</u> <u>https://www.canadianconsultingengineer.com/buildings/ashrae-prepares-</u> new-net-zero-hg/1003409793/

Writeup within: Energy Manager Canada Canada's Darryl K. Boyce becomes ASHRAE's new president

https://www.energy-manager.ca/canadas-darryl-k-boyce-becomes-ashraesnew-president/

MORE WAYS TO EXPLORE

THE 2020 AHR EXPO

The **Product Preview PDF** represents just a small sample of the products that will be on display at the AHR Expo.

https://ahrexpo.com/wp-content/uploads/2019/11/2020-AHREXPO-PRODUCT-PREVIEW.pdf

Web site has more ways to explore what the Show has to offer:

- Watch the Trailers
- Search the Exhibitor List
- Search the Show by Product Category
- View Education Schedule

FREE REGISTRATION



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Place your business card HERE Just \$100 for one year contact: Newsletter Editor Tom Pollard <tpollard@execulink.com> or Treasurer Kathleen Mayberry kmayberry@sbmltd.ca



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ASHRAE RESEARCH

To donate online please visit: <u>http://www.ashrae.com/donate</u>

2018-2019 Honour Roll: Chorley and Bisset Curney Mechanical

2019-2020 Current Donors: Norm Clarke, Tom Pollard, Alex Somers, Andrew Crowley Ibrahim Semhat, James Scudamore, Jeff Armstrong, Raj Deenath Drennan Refrigeration

Honour Roll \$150-\$249 Major Donor \$250-\$2,499 ASHRAE Associate \$2,500-\$4,999

If any questions, please contact me

Andrew Crowley (email: <u>acrowley@drennan.on.ca</u>) 519-671-8454 ASHRAE London Canada Chapter Research Promotion Chair 2019/2020





ASHRAE's Building EQ Portal provides a quick energy analysis that benchmarks a building's energy performance. Building EQ assists in the preparation of an ASHRAE Level 1 Energy Audit to identify means to improve a building's energy performance including low-cost, no-cost energy efficiency measures and an Indoor Environmental Quality survey with recorded measurements to provide additional information to assess a building's performance.

Two different evaluations can be used independently to compare a candidate building to other similar buildings in the same climate zone or together for an assessment of a building's design potential compared to actual operation:

- In Operation compares actual building energy use based on metered energy information.
- **As Designed** compares potential energy use based on the building's physical characteristics and systems with standardized energy use simulation.

Learn more on how to access the portal, initiate a project, and begin a submission: <u>https://www.ashrae.org/technical-resources/building-eq/building-eq-portal</u>



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ASHRAE NEWS

ASHRAE eLearning - Web-Based | On-Demand

ASHRAE eLearning is an approved Continuing Education provider for the American Institute of Architects (AIA), and a U.S. Green Building Council (USGBC) Education Partner. Continuing Education (CE) hours earned from ASHRAE eLearning may be applied toward maintenance of state-licensed professionals (architects and professional engineers) and LEED credentials.

For the complete eLearning catalog, please visit <u>https://elearning.ashrae.org</u>

Individuals can register online at <u>https://elearning.ashrae.org</u> and immediately gain access. Companies can register employees by contacting email: <u>elearning@ashrae.org</u> or calling 678-500-3917.

From New Construction to Existing Retrofits, Exceed your Efficiency Goals with <u>Standard 90.1-2019</u>

For more than 40 years, Standard 90.1 has codified groundbreaking efficiency requirements for design, construction, operation and maintenance of commercial buildings. Updating the benchmark document required years of research and thousands of hours of work from Society leaders and industry experts.

Standard 90.1-2019 incorporates over 100 addenda to the 2016 edition and includes improved energy saving measures throughout. This manual is intended for architects, engineers, designers, manufacturers, plan examiners, field inspectors, general and speciality contractors, commissioning agents, raters, quality control specialists, O&M personnel, and anyone involved in the design, construction, or commissioning of buildings other than low-rise residential.

See the www.ashrae.org/bookstore for

ANSI/ASHRAE/IES Standard 90.1-2019 – Energy Standard for Buildings Except Low-Rise Residential Building

ASHRAE Releases Updated Versions of Standard 62.1 and 62.2

ASHRAE has released updated editions of its standards for ventilation system design and acceptable indoor air quality (IAQ).

ANSI/ASHRAE Standard 62.1-2019, Ventilation for Acceptable Indoor Air Quality, specifies minimum ventilation rates and other measures for new and existing buildings that are intended to provide IAQ that is acceptable to human occupants and that minimizes adverse health effects.

ANSI/ASHRAE Standard 62.2-2019, Ventilation and Acceptable Indoor Air Quality in Residential Buildings, defines the roles of and minimum requirements for mechanical and natural ventilation systems and the building envelope intended to provide acceptable indoor air quality in residential buildings.

To purchase Standards 62.1 and 62.2, visit **www.ashrae.org/bookstore** or contact ASHRAE Customer Contact Center at 1-800-527-4723 (United States and Canada), 404-636-8400 (worldwide) or fax 678-539-2129

Is your PE license due for renewal?

For a limited time, take advantage of our Fall sale! Buy two individual courses— get one free! Offer has been extended until **December 1st, 2019**. This reduced pricing applies to both individual and corporate enrollments.

Once enrolled, you have 12 months to complete your training. Enter code **FALL2019** to take advantage of this offer.



ASHRAE Announces Technical Program for 2020 Winter Conference

The technical program for the **2020 ASHRAE Winter Conference**, to be held Feb. 1–5, at the Hilton Orlando is now available online and in **ASHRAE 365**. Registration for the conference provides entry to the co-sponsored **AHR Expo**, held Feb. 3-5 at the Orange County Convention Center.

The conference's technical program offers over 100 technical sessions, 300 speakers, and more than 150 PDHs.

"With changing energy, economic and environmental concerns at the forefront of building decisions, a focus on emerging approaches and advanced concepts of addressing those concerns have become more crucial to building professionals," said conference chair, Melanie Derby. "The 2020 ASHRAE Winter Conference technical program will present cutting-edge methods and practices on a wide-range of topics to provide solutions to these contemporary building-related concerns."

The five-day event includes eight conference tracks, selected to represent areas of focus common among ASHRAE membership. A new and anticipated track at this year's conference, Big Data and Smart Controls, will examine the use of big data, advanced algorithms, occupancy-based control strategies, data mining and other analytical techniques to economically automate buildings. Another new conference track showcases ASHRAE's leadership role in the development of standards and guidelines that are used to shape codes. The track Standards, Guidelines and Codes, will include topics such as the standards development process, the use of standards to help mechanical systems in buildings survive disaster and linking Standard 100 with Standard 90.1-2019, among others.

Conference tracks include:

- HVAC&R Fundamentals and Applications
- Systems and Equipment
- Refrigeration and Refrigerants
- Cutting Edge Approaches

- High Efficiency Design and Operation
- Big Data and Smart Controls
- Ventilation, IAQ and Air Distribution Systems
- Standards, Guidelines and Codes

ASHRAE will offer three Residential Buildings "mini-tracks" and three Refrigeration and Refrigerants track sessions at the AHR Expo on Monday, Feb 3. These sessions offer AHR Expo attendees updates on pertinent topics and are free to attend.

ASHRAE Learning Institute (ALI) will offer four full-day seminars and 17 half-day short courses during the conference. New ALI courses include:

- Guideline 36: Best in Class HVAC Control Sequences
- Complying with Standard 90.1-2019
- Installing DDC Control Systems
- IgCC and ASHRAE Standard 189.1 Technical Provisions
- Principles of Building Commissioning: ASHRAE Guideline 0 and Standard 202
- ASHRAE Cold Climate Design
- V in HVAC What, Why, Where, How, and How Much

PDH's are available to attendees who attend any of the technical sessions or ALI courses.

Apply by Jan. 10 to sit for an ASHRAE Certification exam. Exams will be administered on Feb. 5 in these key fields: Building Operations, Commissioning, Energy Assessment, Energy Modeling, Healthcare Facility Design, High-Performance Building Design, and HVAC Design, a new program.

ASHRAE President Darryl K. Boyce, P.Eng. will provide an update on the 2019-20 society theme, "Building for People and Performance. Achieving Operational Excellence," at the President's Luncheon on Monday, Feb. 3. Major contributors to the ASHRAE RP Campaign will also be recognized at this lunch.

For complete conference and expo information, download **ASHRAE 365**, or visit the **2020 ASHRAE Winter Conference** and the **AHR Expo** websites.

ABSTRACTS.

2019 DESIGN LONDON. ONTARIO. CANADA





130 DUNDAS ST.

Diamond Schmitt Architects and Phil Agar Architect, Architects in Joint Venture

ABSTRACT

Overview

Fanshawe College acquired the former Kingsmill Department Store Building in downtown London to anchor the second phase of the college's downtown campus. Situated within the citydesignated Downtown Heritage Conservation District, the building, which is now home to the Schools of Tourism, Hospitality and Culinary Arts and Information Technology, retains its street character on Dundas Street. The front three-and four-storey facades of the existing building was retained and a six-storey infill structure was built behind the original facades creating additional floors above. The addition is discretely set back from the street to mini¬mize their presence on the heritage designated street.

The 10,600sm (114,000sf) building transforms the historic department store into a vibrant urban campus to welcome 1,600 students, staff and faculty while retaining its street char¬acter fronting Dundas Street. Significant architectural elements and materials of the former structure have been incorporated, both inside and out. The limestone facade was refur-bished and the adjacent brick façade was entirely removed to be cleaned and repaired and then rebuilt to the original design – brick by brick. All windows were replaced with bronze aluminum frames and insulated units to improve efficiency. Minor changes at street level included increasing transparency to connect the building's interior with street activity while staying true to the original character of the existing facades. The \$66.2 million campus is the largest single project by southwestern Ontario's biggest community college.

The three-storey addition above the original building includes a glass façade enlivened by colourful metal and glass panels in Fanshaw's colours and varying densities of glazing frit to signify the presence of the school but not to overpower the heritage facades below. The transparent volume is divided into two to acknowledge the two different facades below.

While the setback of the addition preserves the heritage frontage of the historic structure true to the context of its neighbourhood it also creates three terraces on the fourth floor for student and faculty use which include a trellis wall for plants to climb and green roof areas.

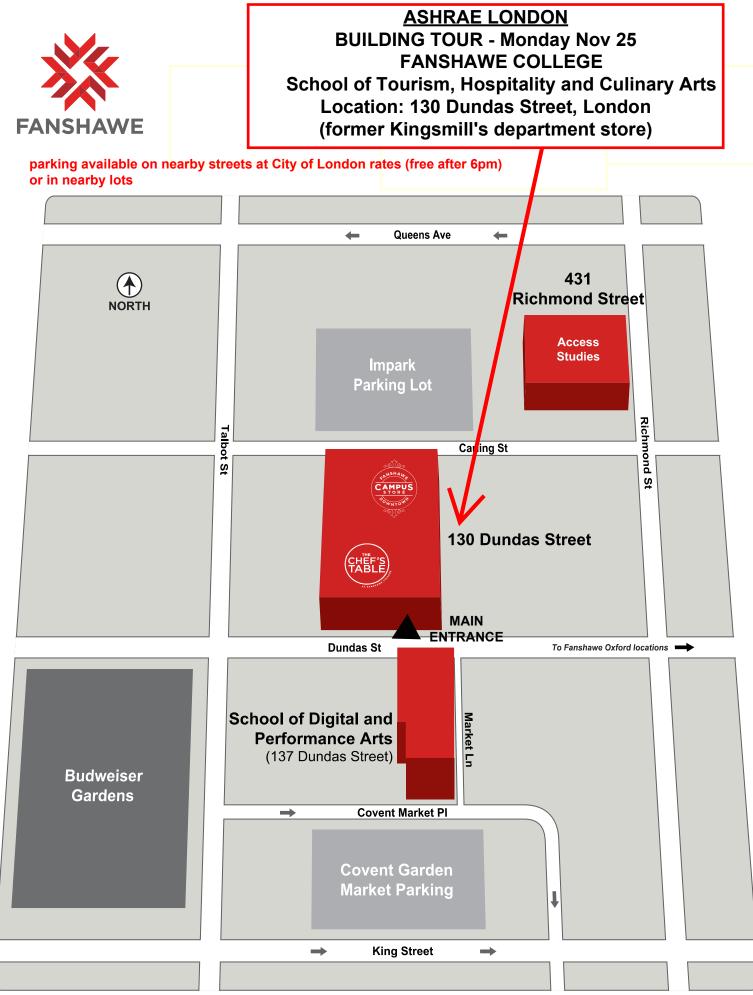
Animating the street at grade is a fully functioning 80-seat teaching restaurant partially run by students which is open to the public. The ground floor also features a two-storey biofilter living wall, amphitheatre seating, a large lobby that can host events adjacent to the restaurant, a display case for IT students to showcase work and an open corridor that links the Dundas and Carling Street entrances.

The building site is 55-metres long and narrow, so in order to bring in daylight and enhance the transparency the north and south facades above the existing are primarily made of glass, a three storey light well is located on the west façade and a staircase in the centre of the building with a skylight above descends to the second-floor main event space. Another stairwell continues from the main event space connecting to the main lobby's triple storey atrium and the adjacent living wall.

ADAPTIVE REUSE OR REHABILITATION

The academic program provides five culinary labs, one mixology lab, a raked-seating demonstration lecture theatre, a teaching restaurant, four classrooms and 11 computer labs. It also provides five open lounge areas and four open study areas for students, two student lounge rooms and a number of meetings rooms for student and faculty collaboration. While not pursing LEED certification, the building employs many sustainability initiatives including increased energy efficiency, water conservation and the use of recycled materials.

The former Kingsmill's department store dates to the late 19th-century and was a fixture of city life in London. The stone facade and metal canopy on Dundas Street have been preserved while the adjacent red brick annex was taken down, restored and replaced and a new black awning (to replace the original), matches the black granite which was restored at street level. Other original features incorporated in the design include reclaimed wood joists, a tin ceiling and locally made yellow brick. The pneumatic tube messaging system which was restored and made functional again and the original store safe are both on display.



RBM: July 2019