

ASHRAE Hong Kong Chapter

P.O. Box 35612, King's Road Post Office, North Point, Hong Kong Email: info@ashrae.org.hk Web: http://ashrae.org.hk

美國供暖製冷及空調工程師學會香港分會

地址:香港英皇道郵政局 郵政信箱 35612 號 電郵:info@ashrae.org.hk 網站:http://ashrae.org.hk

Technical Workshop (2-evening) [2nd Revised]

Title : Green Building Design & LEED Implementation

Date/Time/Venue : 20 April 2010 (Tuesday) / 6:30pm-9:30pm / Y611, PolyU, Hung Hom, and

30 April 2010 (Friday) / 6:30pm-9:30pm / Y611, PolyU, Hung Hom

Background:

The mission of ASHRAE is to advance the arts and sciences of heating, ventilating, air conditioning and refrigerating to serve humanity and promote a sustainable world.

LEED (Leadership in Energy and Environmental Design) is an internationally recognized green building certification system, providing third-party verification that a building or community was designed and built using strategies aimed at improving performance across all the metrics that matter most: energy savings, water efficiency, CO₂ emissions reduction, improved indoor environmental quality, and stewardship of resources and sensitivity to their impacts. Developed by the U.S. Green Building Council (USGBC), LEED provides building owners and operators a concise framework for identifying and implementing practical and measurable green building design, construction, operations and maintenance solutions.

Following the ASHRAE mission, ASHRAE Hong Kong Chapter is offering a great opportunity to organize this technical workshop in order to raise awareness and to promote sustainability among our members or others interested. This workshop is to share among the profession ways to build and design which are environmental friendly and energy efficient so that we may build a sustain future.

Course Objective:

This workshop is recommended for engineers and professionals who are interested in sustainable design and LEED.

After taking the workshop, the participants will be able to:

- understand the basic concept of LEED Green Building Rating System
- learn the practical planning requirements and design considerations for LEED
- gain knowledge on case studies sharing of LEED certified buildings
- obtain information how to become LEED AP (Accredited Professional).

Course Highlights:

- 1. Perspective on LEED Green Building Rating Systems
 - Overview of sustainable and green design principles
 - Introduction of LEED for New Construction and LEED for Existing Buildings
- 2. Green Building Design & Construction: The LEED Implementation Process
 - Implementation of LEED on New Construction



ASHRAE Hong Kong Chapter

P.O. Box 35612, King's Road Post Office, North Point, Hong Kong Email: info@ashrae.org.hk Web: http://ashrae.org.hk

美國供暖製冷及空調工程師學會香港分會

地址:香港英皇道郵政局 郵政信箱 35612 號 電郵:info@ashrae.org.hk 網站:http://ashrae.org.hk

- 3. Green Building Operations & Maintenance: The LEED Implementation Process
 - Implementation of LEED on Existing Buildings
- 4. Case Studies on LEED Certified Buildings
 - Highlight on design, construction, and operation of high performance green buildings
- 5. Experience Sharing on how to being a LEED Accredited Professional
 - Sharing on preparation for the LEED AP (Accredited Professional) exam
 - Recommended resources available to effectively prepare for the LEED exam

A reference book "ASHRAE GreenGuide: The Design, Construction, and Operation of Sustainable Buildings, 2nd ed.", list price at US\$83.95, will be given to the participants (included in the course fee).

Lecture notes and practical reference materials will be provided. Certificate Of Attendance will be issued to each participant at the end of the workshop. Six (6) **Professional Development Hours (PDH's)** will be awarded to candidate with full attendance of the workshop. Light refreshments will also be provided.



Key Speaker:



Raymond Yau, PhD, CEng, FCIBSE, MIMechE, MASHRAE, LEED TM AP, FHKIE, RPE

Ir. Dr. Raymond YAU is Arup Fellow, Director of Arup Hong Kong. He is a building services engineer and building physicist who specializes in integrated design of sustainable and environmental responsive buildings.

He was one of the pioneers in the UK in mid eighties who adopted the use of Computational Fluid Dynamics and Dynamic Thermal Modelling techniques in built environment applications. He then pioneered the use of such advanced simulation techniques to Hong Kong in early nineties in complex indoor environment and lately developed advanced turbulence modeling for external air ventilation assessment for high rise and high density urban environment.

He was Arup's project director responsible for leading several pivotal sustainable consulting studies for the HKSAR Government, which have had a strong influence on the development of sustainability in Hong Kong and put Arup in the lead on formulating the roadmap for the local sustainability agenda. These projects include drafting a Comprehensive Environmental Performance Assessment Scheme



ASHRAE Hong Kong Chapter

P.O. Box 35612, King's Road Post Office, North Point, Hong Kong Email: info@ashrae.org.hk Web: http://ashrae.org.hk

美國供暖製冷及空調工程師學會 香港分會

地址:香港英皇道郵政局 郵政信箱 35612 號 電郵:info@ashrae.org.hk 網站:http://ashrae.org.hk

(CEPAS) for buildings in Hong Kong, similar to the BREEAM in the UK and LEEDTM in the USA, and establishing the life-cycle assessment and database model for building construction in Hong Kong. He is Core Co-investigator of HKSAR Government Study on Urban Climatic Map and Standard for Air Ventilation Assessment.

He led the China's Hangzhou Xihu Tiandi Phase 2 Development to obtain the world's first precertified LEED – Core & Shell green building label ever at the highest platinum level of performance. He was leading the sustainable development and energy supply strategies for the Shanghai Dongtan Eco-City Demonstrator project.

Many of his projects have won Green Building Awards or Sustainability Recognition such as MTR Disney Resort Line Sunny Bay Station, Hong Kong Public Housing on Microclimate Research and LCA/LCC Sustainable Tools for Buildings in Hong Kong.

He is currently Regional Vice-Chair on Technology Transfer of ASHRAE Region XIII. He is Adjunct Associate Professor at Department of Architecture, The Chinese University of Hong Kong. He frequently lectures to students at universities on Sustainable Architecture and Buildings.

<u>Language</u>: English (supplemented with Cantonese)

Application:

Open to all interested persons, but priority will be given to ASHRAE members. Please complete and return the application form by e-mail/post and send the cross cheque via post before **10 April 2010**.

Number of participants is limited. Places will be allocated on a first-come-first-served basis. Successful applicants will be informed individually by e-mail / phone.



ASHRAE Hong Kong Chapter
P.O. Box 35612, King's Road Post Office, North Point, Hong Kong
Email: info@ashrae.org.hk Web: http://ashrae.org.hk
美國供暖製冷及空調工程師學會香港分會
地址:香港英皇道郵政局郵政信箱 35612號

電郵:info@ashrae.org.hk 網站:http://ashrae.org.hk

Application F ASHRAE Tec		op: Green Building Desi	gn & LEED Implementation
Name (Dr./Ir./	/Mr./Mrs./Ms.)*:		
ASHRAE Membership*		Class:	No.:
Company/School*			
Mail Address*			
Email Address	*		
			(E)
Contact Numbers : (Tel/Mobile)*:(Fax): * Information must be filled.			
[Course fee in	cludes refreshme	ents, lecture notes and a co	py of the reference book.]
Course Fee (M	Iember of ASHF	RAE) – HK\$ 1,750 x	person (cheque no.:)
Course Fee (Student member)		– HK\$ 875 x	person (cheque no.:)
Course Fee (Non-member) – HK\$ 1,900 x person (cheque no.:		person (cheque no.:)	
Remark:	All net proceeds will be contributed to ASHRAE Research Promotion Hong Kong Chapter's target for the year of 2009/2010 and the rest will be contributed to ASHRAE Hong Kong Chapter student's activities and young member's development.		
	Visit www.ashrae.org for more on ASHRAE Research Promotion		
Enquires:	For inquiries, please contact us at email: <u>info@ashrae.org.hk</u>		
Registration:	The application form and cross cheque with appropriate payment in Hong Kong dollars payable to "ASHRAE Hong Kong Chapter" shall be sent to P.O. Box 35612, King's Road Post Office, North Point, Hong Kong , before 10 April 2010. The applicant may email the above information to apply@ashrae.org.hk for place reservation and then followed by cheque payment via mail.		