

**TECHNICAL TALK ON 'ARE YOU SAFE WHEN ADMITTED TO HOSPITAL?  
A GUIDE TO HEALTHCARE HVAC SYSTEM'**

Organised by Building Services Technical Division, IEM

**BEM Approved CPD/PDP Hours: 2 Hours**

**Ref No: IEM19/HQ/020/T**

**Date** : 30 JANUARY 2018 (Wednesday)  
**Time** : 5.30 p.m. – 7.30 p.m.  
**Venue** : C&S and TUS Lecture Room,  
2<sup>nd</sup> Floor, Wisma IEM, Petaling Jaya, Selangor  
**Speaker** : Ir. AL-KHAIRI MOHD DAUD  
P.Eng, PEM, C Eng, CPSI, MIEM, MMEPA, MMSQH, REEM

**SYNOPSIS**

Hospital used to be equipped with open windows where fresh air is allowed to enter the wards freely to the patients. This is the healthiest condition for patients who have respiratory problems to recover when they are admitted to wards. Today Malaysian is no longer accepting the hot and humid condition of the environment but prefers the comfort of air conditioning system compared to rotating fans.

Now air conditioning system has been common features in vehicles and all buildings including schools. However installing a split unit air condition system when the air is being circulated where there are infectious patients carrying influenza or tuberculosis can be dangerous. Similarly circulating air inside the microbiology labs where virus being cultured is also a recipe for outbreak. Thus do you know whether the hospital that you enter are designed and maintained according to the standards or are you allowing yourself to be exposed to infectious diseases?

Knowing the importance of ventilation, HVAC engineers should be aware of the requirements to design air conditioning system for hospital. There are different ventilation requirements for critical care areas, areas where microbiology or pharmaceutical product being handled, patient care areas and general areas. The inlet and exhaust locations are also very important to ensure that there is no recirculation air that can affect patients or staff health. HVAC engineers must design and maintain the system according to the requirements and should not just design according to general building requirements.

The speaker shall his experience in designing, constructing, trouble shooting and rectifying hospital HVAC system that also include solution for energy efficiency for healthcare facilities. The speaker shall highlight the MSQH and Malaysia standards and the Private Health Care Act 2006 that regulate the hospital HVAC system design and installation.

**ANNOUNCEMENT TO NOTE**

**FEES**

**(Effective 1<sup>st</sup> October 2017)**

**Members**

Registration Fee	:	FOC
Administrative Fee	:	
<b><u>Online</u></b>		RM15
<b><u>Walk In</u></b>		RM20

**Non-Members**

Registration Fee	:	RM50
Administrative Fee	:	RM20

- Limited seats are available on a "first come first served" basis (maximum 100 participants).
- **To secure your seat, kindly register online at [www.myiem.org.my](http://www.myiem.org.my)**

**PERSONAL DATA  
PROTECTION ACT**

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## **SPEAKER BIODATA**

**IR. AL-KHAIRI MOHD DAUD** has 20 years of experience in research, cement, oil and gas, petrochemical, oleo chemicals industries and health care facilities. He has gained various experiences in design, construction, testing and commissioning, operate and maintain facilities and plants from various multinational companies both abroad and locally. He has served in various roles as engineers and manager to the plant and facilities.

With such a diverse industrial background, Ir. Al-Khairi has formed Faqeh Management, an asset and reliability company to improve the equipment reliability and maintenance standard in the industry. The main function of the company is to provide training and consultancy work for the industry. Among the industry that he has provided services are hospital and health care, airports, facilities management organization, printing and palm oil mills.

Currently Ir. Al-Khairi is the Advisor of the Oil, Gas and Mining Technical Division and a member of Building Services for the Institution of Engineers Malaysia (IEM). He is a principle interviewer to qualifying engineers for professional interviews as well as a committee member for engineer's log book to ensure mechanical engineers registered with IEM has the correct training to qualify as professional engineers. Ir. Al-Khairi has written articles and delivered numerous talks on maintenance and reliability to IEM fraternity in Maintenance, Healthcare and Green Technology Seminar. Ir. Al-Khairi is also an associate member of Institute of Asset Management UK, Biomedical Engineering Society of Malaysia and Malaysian Society for Quality in Health (MSQH). He is a surveyor for MSQH checking on the facilities design and maintenance as well as safety and environment aspects of hospitals in Malaysia.

Ir. Al-Khairi is a Registered Electrical Energy Manager and has been appointed as the country expert and certified trainer to promote Energy Management Gold Standard under the Asean Energy Management Accreditation Scheme (AEMAS) for the country supporting Greentech Malaysia. To support the energy management practice, Ir Al-Khairi is a member of Malaysian Energy Professional Association (MEPA). He is a part of committee member to develop IEM position paper for alternative energy with all the country experts in the energy production field. Ir Al-Khairi is keen to impart his knowledge to the regions. He is also passionate on energy efficiency and management practice.

On softer notes Ir. Al-Khairi is passionate in alternative medicines practices. He is a Reiki Master, Feng Shui trained, Quantum Touch, Silva Mind Method and EFT practitioner. He also practices Qigong and Aikido to ensure a balance wealth and health.

## **Ir. WONG WIN HENG**

**Chairman,  
Building Services Technical Division (BSTD)**