



ASHRAE *ASHRAE SINGAPORE CHAPTER*
 American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc. SINGAPORE CHAPTER



Mailing Address: Bukit Merah Central, P.O. Box 0626, Singapore 911535

ASHRAE Technical Talk

Co-sponsored by

Department of Building, National University of Singapore

Presented by

Professor David Wyon

BA (Cambridge), MSc (Aston), PhD (London)

International Centre for Indoor Environment and Energy,

Technical University of Denmark

Visiting Professor, National University of Singapore

Topic : "Productivity research in theory and in practice. Current status and future challenges"

Date : 6 January 2006 (Friday)

Time : 7.00 pm to 10.00 pm

Venue : LR425, Level 4, SDE3

Address : School of Design and Environment, National University of Singapore,
 4 Architecture Drive, Singapore 117566, Tel: 65165150
 (Contact person : Ms Chelvi, email: bdgtp@nus.edu.sg,
 by 2 January 2006)

Fees

Registered ASHRAE Singapore Chapter members	Free of charge
Other Guests	\$15.00

Cheque payable to "National University of Singapore"

Programme :

- Registration - 6.45 – 7.15 pm
(Venue : Registration area outside LR425)
- Buffet dinner - 7.15 – 8.00 pm
- Technical Talk - 8.00 – 10.00 pm
(Presentation : 1 hr 30 mins; Q&A : 30 mins)

Professional Engineers Board PDU points applied = 2



ASHRAE

ASHRAE SINGAPORE CHAPTER

American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc. SINGAPORE CHAPTER



Mailing Address: Bukit Merah Central, P.O. Box 0626, Singapore 911535

Synopsis:

Dr Wyon will introduce the topic of productivity research by defining Independent, Intervening and Dependent Variables and the concept of investigating effects on productivity by validating Causative Pathways. He will describe the historical development of ergonomic research on performance, the techniques that he found useful to increase the sensitivity of the approach for application to a civilian population and to evaluating task performance in light industry, offices, transportation and schools.

He will discuss the results of key experiments in this process, on thermal effects on school children in Sweden, on factory workers in South Africa and on driver vigilance in moving vehicles; thermal, noise and air quality effects on subjects in simulated office environments at the International Centre for Indoor Environment and Energy at DTU in Copenhagen; and the current field intervention experiments to examine classroom temperature and air quality effects on the performance of school work by children under the contract ASHRAE 1257-RP).

Professor David Wyon is known for his behavioural research into indoor environmental effects on people. In over 40 years of field and laboratory experiments he has shown conclusively that quite small differences in such factors as temperature, humidity, air quality and noise can have large effects in practice on health, comfort and productivity. Most of his work has been on IEQ in buildings, from schools to offices to factories, but also in transportation environments, including cars, trucks, buses and most recently, aircraft cabins.

He is a Member of the International Academy of Indoor Air Sciences and of ASHRAE's Technical Committees TC2.1 (Physiology and Human Requirements) and TC9.3 (Transportation Environments). He is a professor at the International Centre for Indoor Environment and Energy in Copenhagen, Denmark, and a Visiting Professor at the National University of Singapore.

From 1995-2001 he was a Corporate Research Fellow with Johnson Controls, Inc., USA and a Visiting Scholar at the University of California, Berkeley, Center for the Built Environment (CBE), where he helped to develop the Internet-based Occupant IEQ Survey. Before that he was Head of the Human Criteria Laboratory of the National Swedish Institute for Building Research. He has been a guest researcher both at the National Building Research Institute in Pretoria, South Africa and at the CNRS Laboratory for Applied Physiology and Psychology in Strasbourg, France.



ASHRAE *ASHRAE SINGAPORE CHAPTER*
 American Society of Heating, Refrigerating and Air-Conditioning Engineers, Inc. SINGAPORE CHAPTER



Mailing Address: Bukit Merah Central, P.O. Box 0626, Singapore 911535

REPLY FORM

As there are limited places, please register early for the seminar by completing the form below and fax it to Ms Chelvi at **6775 5502** / email to bdgtp@nus.edu.sg by **2 January 2006**.

For further enquiries, please call **Chelvi**, tel: **6516 5150**.

Yes, I will be attending this ASHRAE Technical Talk on :
"Productivity research in theory and in practice. Current status and future challenges"

Venue : LR425, Level 4, SDE3

Address : School of Design and Environment, National University of Singapore,
 4 Architecture Drive, Singapore 117566, Tel: 65165150

Registered ASHRAE Singapore Chapter members	Free of charge
Other Guests (Cheque payable to " National University of Singapore ")	\$15.00

Fees

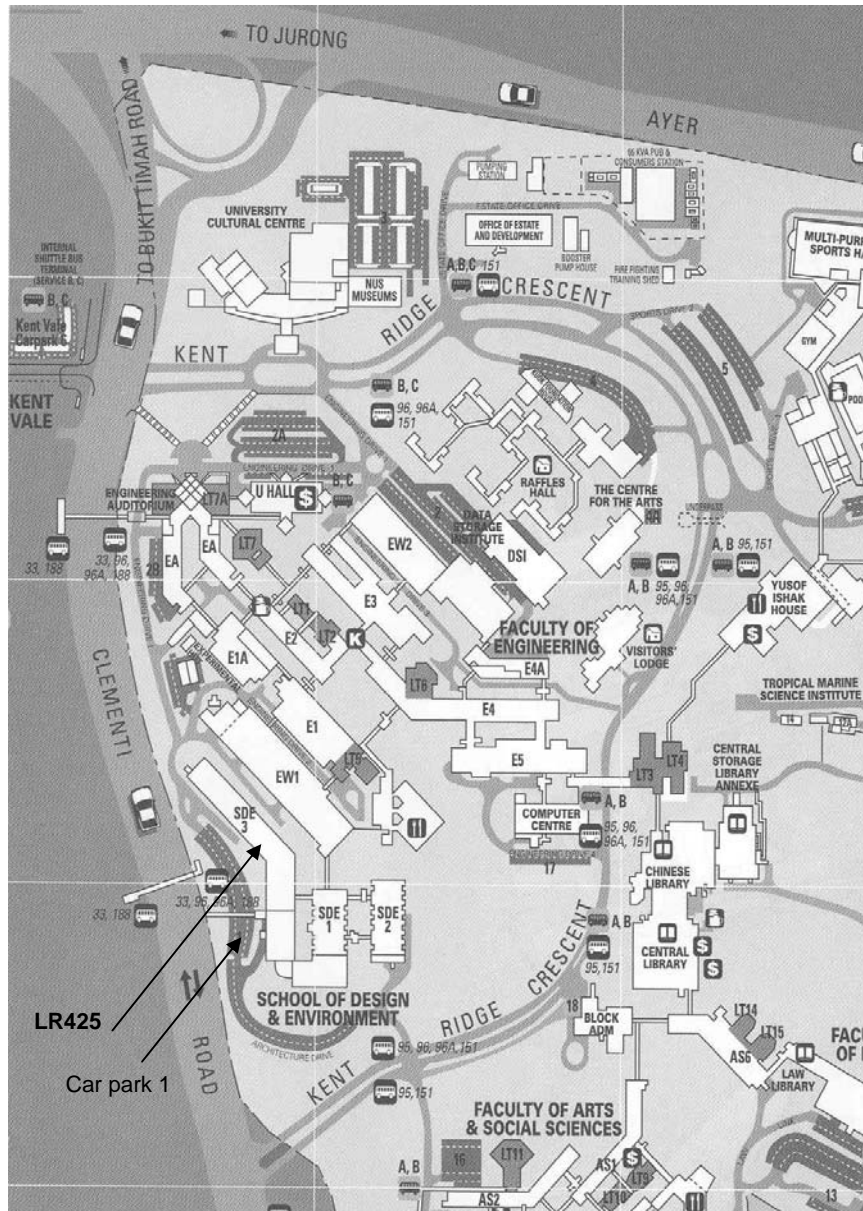
Name: _____ Designation: _____
 Company: _____
 ASHRAE Singapore Chapter member : Yes/No (Membership No: _____)
 ASHRAE Member : Yes/No (Membership No: _____)
 Address: _____
 Tel: _____ Fax: _____ E-mail: _____

I will be accompanied by the following guests:

1. Name: _____ Designation: _____
 Company/Institution: _____ Tel: _____ Member: Yes/No

2. Name: _____ Designation: _____
 Company/Institution: _____ Tel: _____ Member: Yes/No

LOCATION MAP



Along Clementi Road: Bus nos. 33, 96*, 188

Along Kent Ridge Crescent: Bus nos. 95, 96*, 151

(*96 may be boarded at Clementi Interchange, next to Clementi MRT station)

Campus map: <http://www.nus.edu.sg/campusmap/>

Parking in NUS

Motorists can choose to park FREE-of-charge at 2 fringe car parks, i.e. **Kent Vale Car Park 6** and the **CRISP Car Park** (Car Park 10A) at Kent Ridge Road next to King Edward VII Hall. They can take the **Internal Shuttle Bus (ISB) Service** from there to various campus locations. Visitors and students may park their vehicles in WHITE-coloured lots at the pay car parks at the rate of 1.5 cents per minute. All RED-coloured parking lots are strictly reserved for staff holding the appropriate NUS season passes. A ticketless, licence plate recognition technology system is in operation at all pay car parks. Payment is by CashCard only.