IES Preparation Course for PPE Examination Part 2 - Mechanical Engineering- Lifting and Vertical Transportation Systems

Date: 5, 12 & 19 August 2020 (Wednesdays)

Time: 9.00am to 6.15pm

Venue: IES Academy@e2i, Devan Nair Institute for Employment and Employability

80 Jurong East Street 21 #04-10 Singapore 609607

CET Hours - Confirmed

Fees * : \$898.80Nett (IES Members) \$1123.50Nett (Non-Members)

The Practice of Professional Engineering Examination Part 2 (Mechanical) has been implemented since 2007. The paper aims to examine candidates on their proficiency in the practice of mechanical engineering at a professional level. Candidates are expected to have a good knowledge of the regulatory requirements and practices in Singapore. In particular, knowledge is required in the areas of regulatory framework, submission and approval procedures, statutory acts and regulations, practice guidelines and codes of practices.

The course aim to equip participants and interested parties on the knowledge in the field of: <u>Lifting and Vertical Transportation Systems</u> which is <u>one of the topics</u> in the syllabus of the PPE Examinations Part 2. Salient points and working knowledge of the relevant regulations, by-laws, Acts and accepted/approved codes of practices, circulars issued by the Authorities will be covered in this preparation course.

Course Outline/Outcomes:

1st Session

- Preparations for the Practice of Professional Engineering Examination Part 2 (Mechanical)
- Salient points of SS 595- Part 3: Code of practice for the selection, use, care and maintenance of steel wire ropes for hoisting
- Salient points of SS 536: Code of practice for the safe use of mobile cranes

2nd Session

- Salient points of SS 559: Code of Practice for safe use of tower cranes
- Salient points of CP 617: Code of Practice for the lifting of persons in work platforms suspended from cranes

3rd Session

- Salient points of SS498: Code of Practice for design, safe use and maintenance of gantry cranes, overhead travelling cranes and monorail hoists
- Learning points arising from accidents from lifting operations.
- MOM circulars related and relevant to cranes and lifting operations
- Working examples from past questions from the Practice of Professional Engineering Examination Part 2 (Mechanical)

4th Session

- Regulatory regime and requirements for lifts and escalators in Singapore
- Sections of the Building Control Act relevant to lifts and escalators, Approved Documents
- Salient points of SS 626: Code of Practice for design and maintenance of escalators and moving walks

5th Session

- Salient points of SS 550: Code of Practice for safe installation, operations and maintenance of electric passenger and goods lifts
- Salient points of EN 81:41: Safety rules for the construction and installation of lifts Special lifts
 for the transport of persons and goods. Vertical lifting platforms intended for use by persons with
 impaired mobility
- BCA circulars related and relevant to lifts and escalators
- Accessibility Code Context: Lifts

6th Session

- Introduction to Workplace Safety and Health (WSH) Act
- WSH(General Provisions) Regulations, WSH(Risk Management) Regulations and WSH(Operations of Cranes) Regulations
- Building Maintenance and Strata Management (Lifts, Escalators and Building Maintenance) Regulations 2016 and subsequent revisions and amendments
- Approved Code of Practice (ACOP) for Safe Lifting Operations at the Workplace

Target Audience

Any interested parties but this course will benefit individuals who are aspiring to be professional engineers and participants who are preparing for the Practice of Professional Engineering Examination Part 2 (Mechanical) in the area



Er. Winson Lee
B.Eng (Hons) - Mechanical Engineering
M.Sc (Safety, Health & Environmental Technology)
Professional Engineer (Mechanical Engineering)
Specialist Professional Engineer in Crane Engineering, Lift and
Escalator Engineering, Access Platform Engineering &
Amusement Rides Engineering
Ministry of Manpower Authorised Examiner in Lifting Equipment
Registered Workplace Safety and Health Officer
Qualified Workplace Safety and Health Auditor
Qualified Train the Trainer for Working at Heights

Lecturer

Er. Winson Lee is currently in his own private engineering practice. He was a Deputy Director with the Electrical and Mechanical Engineering Department of the Building and Construction Authority. He graduated with a Bachelor's degree in Mechanical Engineering from the National University of Singapore in 2005. After graduation, he joined the Occupational Safety and Health Division, Ministry of Manpower (MOM) where he subsequently obtained a Master's degree in Safety, Health and Environmental Technology from his alma mater in 2009.

Er. Lee has more than 12 years of regulatory public sector experience and had served the Ministry of Manpower from 2006 where he led inspectors in conducting workplace safety and health inspections and audits, conducting investigations into serious and fatal industrial accidents including fall from heights accidents. He has investigated a number of fall from heights accidents, prosecuting culpable parties under the WSH Act and its Regulations. Having joined the Building and Construction Authority in 2012 after serving a brief stint as a Senior Workplace Safety and Health (WSH) Manager in the private sector, he assumes regulatory role by enforcing the Amusement Rides Safety Act.

Er. Lee is a qualified Train the Trainer for working at heights and has audited and drafted fall prevention height plans and emergency response procedures on working at heights for various companies. Er. Lee's interest lies in WSH risk management. In his current practice, he has been advising companies including rope access companies on matters pertaining to work at heights and adequacy of anchorage/lifelines as well as temporary edge protection.

Registration Form

Date

IES Preparation Course for PPE Examination Part 2 – Mechanical Engineering- Lifting and Vertical Transportation Systems

: 5, 12 & 19 August 2020(Wednesdays)

: 9am to 6.15pm Time CPD Programme: 24 CET Hours - Confirmed : IES Academy@e2i, Devan Nair Institute for Employment and Employability 80 Jurong East Street 21 #04-10 Singapore 609607 : \$898.80Nett (IES Members) Fees * \$1123.50Nett (Non-Members) Please register online/mail/fax the completed form by 28 July 2020 Before 3pm to: Karen Phua IES Academy@e2i, Devan Nair Institute for Employment and Employability, 80 Jurong East Street 21, #04-10 S(609607) (Tel) 6463 9211 Email: karen@iesnet.org.sg **Participant Details** : NRIC Name Company : _____ Designation: _____ Address 1 (For mailing of invoice and receipt) Address 2 (For mailing of Certificate) Postal Code : Sex: Male / Female : ______ Fax : _____ Tel **Email** IES M'ship No.: P.E. No.: (if applicable) Please indicate: ☐ IES members ■ Non-members ☐ Sponsored by company **Contact Person Details** (if different from participant) Name Designation: Tel Fax: **Payment Details** Bank / Cheque No.: Amount(\$): * All Fees are inclusive of 7% GST ** Cheque should be made payable to: 'Engineers Singapore Pte Ltd' Acceptance of Terms and Conditions for Registrations of IES Academy's Events I agree to abide by the Terms and Conditions for Registration of IES Academy's Events. Signature: Name:

TERMS & CONDITIONS

Registration

Any registration, whether on-line or fax will be on a *first-come-first-served basis* and will only be confirmed upon receipt of full payment by Engineers Singapore Pte Ltd unless otherwise invoice to company.

All registrations must be submitted with duly completed registration form.

Closing Date & Payment

The closing date of the event will be 1 week prior to event commencement date or earlier. Cheques should be crossed 'A/C payee only' and made payable to 'Engineers Singapore Pte Ltd', with the <u>Title of The Event</u> <u>indicated clearly written on the back of the cheques</u>, and submitted with the duly completed registration forms to:

IES Academy@Jurong East

Devan Nair Institute for Employment and Employability, 80 Jurong East Street 21, #04-10 Singapore 609607

Confirmation of Registration

Confirmation of registration will be given at least 1 week before the commencement date via email. If you do not receive the said confirmation email, you are required to contact IESA at 6463 9211 during office hours.

IESA reserves the right to allow only confirmed registrants to attend the Event.

Withdrawals/Refunds of Fees

Written notice *at least 1 week in advance* before the commencement of the event Full course fee shall be refunded subjected to 4.5% transaction charge. NO refund otherwise.

No show of participant would not be accepted as a valid reason for withdrawal/refund.

One time replacement is allowed only if written notice is received by us at least 1 week before the commencement of the event. However, when an IES member is replaced by a non-member, the participant has to pay the difference in the relevant fees.

Cancellation/Postponement

Changes in Venue, Dates, Time and Speakers for the Events can occur due to unforeseen circumstances. IES reserves the full rights to cancel or postpone the Event under such circumstances without prior reasons. Every effort, however, will be made to inform the participants or contact person of any cancellation or postponement. Fees will be refunded in FULL if any Event is cancelled by IESA.

SkillsFuture Credit (SFC) "All Singaporeans aged 25 and above can use their \$500 SkillsFuture Credit from the government to pay for a wide range of approved skills-related courses. Visit the SkillsFuture Credit website (www.skillsfuture.sg/credit) to choose from the courses available on the SkillsFuture Credit course directory."

Please visit **HERE** for more information on SFC & UTAP claim.

PERSONAL DATA PROTECTION ACT

I consent to the processing by Institution of Engineers, Singapore of personal data, including sensitive personal data as defined in the Data Protection Act 2014, about me for the proper purposes of Institution of Engineers, Singapore (IES). I undertake to observe the provisions of the Data Protection Act 2014 in relation to any personal data I may myself hold and process as a Members of Institution of Engineers, Singapore, and I agree to indemnify Institution of Engineers, Singapore from liability for any claims or damages that may arise from the processing of this data. For more information kindly refer to here.

Enquiries

For further enquiries, please contact IESA general office at Tel: 6463 9211.