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Technical Seminar on Effective Use of S690 to S960 High Strength Steel in Construction 2025.11.21

The Chinese National Engineering Research Centre for Steel Construction (Hong Kong Branch) and Hong Kong Constructional Metal Structures Association jointly organized a Technical Seminar entitled "*Effective Use of High Strength Steel S690 to S960 in Construction*" on 21 November 2025 in a Hotel ICON, PolyU. The event was supported by Development Bureau of the Government of Hong Kong SAR, the Construction Industry Council, and the Building Technology Research Institute.

Ir Ricky C. K. Lau, Permanent Secretary for Development (Works) of the Government of Hong Kong SAR was invited as Guest of Honour to give an Opening Speech, and Prof. K. F. Chung, Director of CNERC has given a Welcoming Speech.

The Technical Seminar was organized as a platform to disseminate research findings and experiences on advanced construction technology of high strength S690 to S960 steel with special emphases on practical applications. It also served as a focal point for renowned engineers to share experiences in adopting high strength S690 to S960 steel in their construction projects. A total of 10 presentations were made, and the Seminar was attended by about 200 engineers.

The Seminar was attended by about 200 engineers
Hotel ICON, TST East. 2025.11.21

Sponsors

Prof. K. F. Chung (left) presented the Final Draft of the "*Standard for Design of Steel Structures using 690 to 960 MPa High Strength Steel*" to Prof. Shi Yongjiu (right), Vice Chairman of the China Steel Construction Society, and witnessed by Ir Ricky Lau (middle).

The Opening Ceremony of the Technical Seminar was attended by a number of honorable guests including:

- Ir Joseph Lo, Head of Project Strategy and Governance Office, Development Bureau
- Ir Thomas Ho, Chairman of Construction Industry Council
- Ir Albert Cheng, Executive Director of Construction Industry Council
- Ir Harry Ma, Deputy Director of Civil Engineering and Development Department
- Ir Julian Kwan, Assistant Director (Tech) of Civil Engineering and Development Department
- Ir Thomas Hui, Dep Head of GEO (Mainland), Civil Engineering and Development Department

From left: Ir Joseph Lo, Ir Albert Cheng, Prof. K. F. Chung, Ir Ricky Lau, Prof. Y. J. Shi, and Ir Thomas Ho.

Group photo of the Speakers of the morning session with the Guest of Honor.
From left: Prof. Michael Yam, Mr. Alfred Wong, Prof. K. F. Chung, Ir Ricky Lau, Prof. Y. J. Shi, and Prof. S. Y. Zhu.

Group photo of the Speakers of the afternoon session with the Guest of Honor.
From left: Mr. Kenny Wong, Mr. Y.W. Leung, Dr. M. F. Hui, Prof. K. F. Chung, Ir Ricky Lau, Prof. Y. J. Shi, Prof. Andy Leung, Ir Tom Leung, Ir Bear Ding, and Dr. H. C. Ho.

Prof. K. F. Chung presented a souvenior to Ir Ricky Lau as a token of appreciation.

Programme

9:00 am	**Opening Ceremony** ***Welcoming Speech*** ***Opening Speech*** *by* **Ir Ricky C. K. Lau, Permanent Secretary for Development (Works)**
9:30 am **Presentation 1**	**S690 to S960 high strength steel and their benefits in construction** *by* K. F. Chung, H.C. Ho and Y.F. Hu
10:10 am **Presentation 2**	**Development of S460 to S690 high strength steel in China** *by* Y. J. Shi
10:40 am	***Coffee Break***
11:10 am **Presentation 3**	**From Research to Reality: Forging future with lighter, stronger, and greener structures in GBA** *by* Alfred K. F. Wong
11:40 am **Presentation 4**	**Iron-based shape memory alloy BRBs for seismic resilience: Active restoration and low-cycle fatigue performance** *by* Michael C. H. Yam
12:10 noon **Presentation 5**	**High performance steel structures enabled by novel shape memory alloy elements** *by* S. Y. Zhu
12:40 pm	***Lunch***
2:00 pm	***Opening Speech*** *by* **Ir Joyce Lau**, Project Manager (North), North Development Office, **Civil Engineering and Development Department, Development Bureau.**
2:10 pm **Presentation 6**	**Construction of footbridges using ultra-high strength S960 steel** *by* Tom W. L. Leung and Bear Z. C. Ding
2:40 pm **Presentation 7**	**Design of high strength S960 steel members and welded sections** *by* K. F. Chung and Y. W. Leung
3:05 pm **Presentation 8**	**Robotic site welding of S960 steel and related quality assurance** *by* H. C. Ho and Kenny Y. L. Wong
3:30 pm	**Coffee Break**
4:00 pm **Presentation 9**	**Field investigation of socketed S690 steel pile performance** *by* Andy Y. F. Leung
4:30 pm **Presentation 10**	**Innovation in modular integrated construction** *by* M. F. Hui
5:00 pm	***End***

Jointly Organized by

THE HONG KONG POLYTECHNIC UNIVERSITY 香港理工大學

國家鋼結構工程技術研究中心香港分中心 Chinese National Engineering Research Centre For Steel Construction (Hong Kong Branch)

HONG KONG CMSA Constructional Metal Structures Association 香港建築金屬結構協會

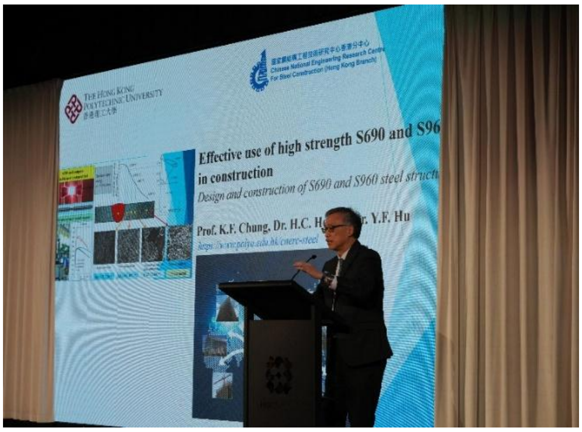
Supported by

Development Bureau The Government of the Hong Kong Special Administrative Region of the People's Republic of China

Building Technology Research Institute 香港建築科技研究院 Wholly Owned by the Financial Secretary Incorporated

CONSTRUCTION INDUSTRY COUNCIL 建造業議會

To kick off the Technical Seminar, Prof. K. F. Chung, Director of CNERC gave a presentation on “S690 to S960 high strength steel and their benefits in construction”.

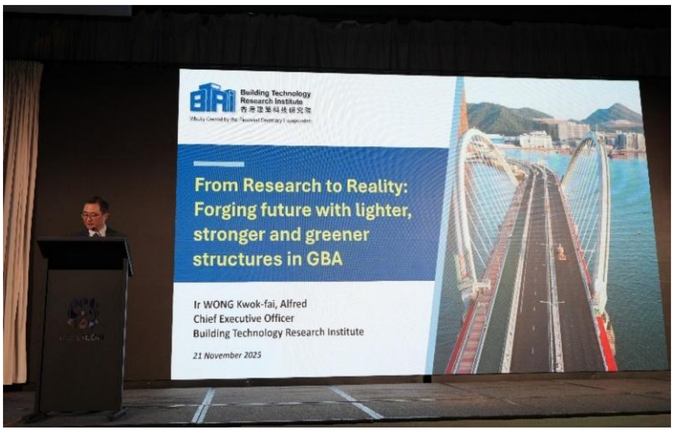


Prof. K. F. Chung

After that, Prof. Y. J. Shi of Tsignhua University gave a presentation entitled “Development of S460 to S690 high strength steel in China”.

Prof. Y. J. Shi

Mr. Alfred K. F. Wong, Chief Executive Officer of Building Technology Research Institute, gave a presentation on “From Research to Reality: *Forging future with lighter, stronger, and greener structures in GBA*”.



Mr. Alfred K. F. Wong

Prof. Michael C. H. Yam, Head of Department of Building and Real Estate, PolyU gave a presentation on "Iron-based shape memory alloy BRBs for seismic resilience: Active restoration and low-cycle fatigue performance".

Prof. Michael C. H. Yam

Prof. S. Y. Zhu, Head of Department of Civil and Environmental Engineering, PolyU gave a presentation entitled "High performance steel structures enabled by novel shape memory alloy elements".

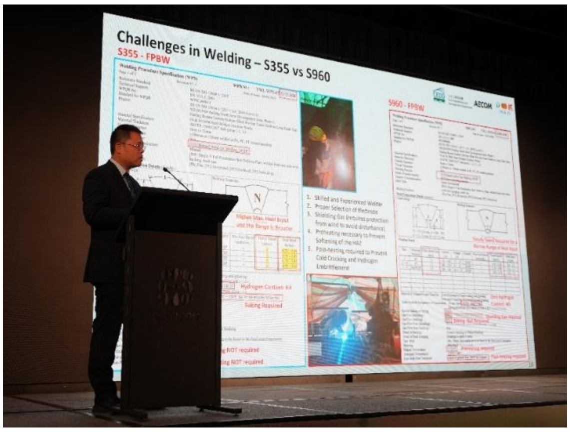
Prof. S. Y. Zhu

Ir Joyce Lau, Project Manager (North), North Development Office, Civil Engineering and Development Department was invited as the Guest of Honour for the afternoon session of the Technical Seminar.

Ir Joyce Lau gave an Opening Speech
in the afternoon session of the Technical Seminar.

Prof. K. F. Chung presented a souvenior to
Ir Joyce Lau as a token of appreciation.

Ir Tom W. L. Leung, Senior Engineer of Civil Engineering and Development Department, and Ir Bear Z. C. Ding, Construction Business Head of Chun Wo, gave a presentation entitled "Construction of footbridges using ultra-high strength S960 steel".



Ir Tom Leung

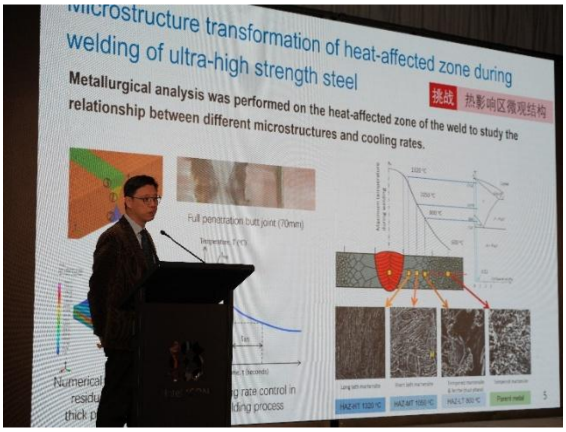
Ir Bear Ding

Prof. K. F. Chung, Director of CNERC, and Ir Y. W. Leung, Managing Director of YWL Engineering Pte Limited, gave a presentation entitled "Design of high strength S960 steel members and welded sections".

Prof. K.F. Chung

Ir Y.W. Leung

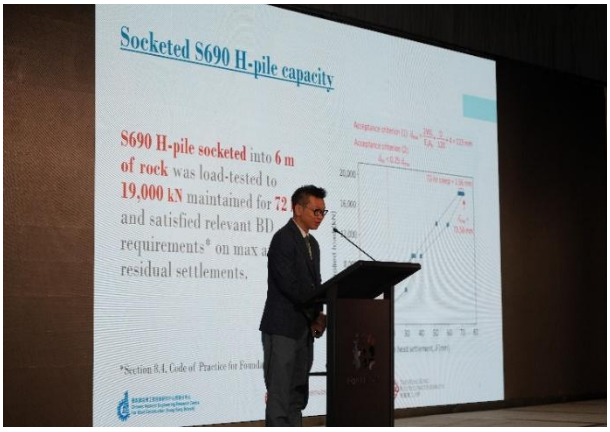
Dr. H. C. Ho, Deputy Executive Secretary of CNERC, and Mr. Kenny Y. L. Wong, Managing Partner of Jumbo Construction Technology Limited, gave a presentation entitled "Robotic site welding of S960 steel and related quality assurance".



Dr. H.C. Ho

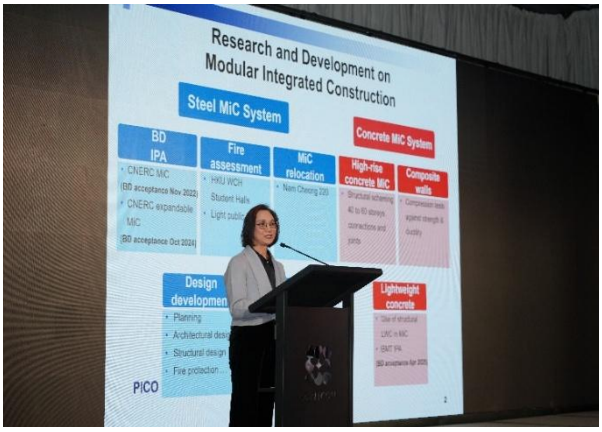
Mr. Kenny Wong, JCT

Prof. Andy Y. F. Leung, Associate Head of Department of Civil and Environmental Engineering, PolyU, gave a presentation entitled “Field investigation of socketed S690 steel pile performance”.



Prof. Andy Leung, CEE, PolyU

Dr. M. F. Hui, Principal Research Fellow of CNERC, gave a presentation entitled “Innovation in modular integrated construction”.



Dr. M. F. Hui, CNERC

A group photo of the Honorable Guest and Speakers of the afternoon session.