



Progress of Nuclear Science Research Center in Huizhou 惠州核科學研究中心進展

Date: Wednesday, April 12, 2023

Time: 11:00 a.m.

**Venue: Lecture Theatre 4, 1/F, Meng Wah Complex,
The University of Hong Kong**

Prof. Wenlong ZHAN 詹文龍教授

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Academician of the Chinese Academy of Sciences, China,
Former Vice President of the Chinese Academy of Sciences, China*



Abstract:

The Nuclear Science Research Center was established in Huizhou, Guangdong. Its main research objectives are nuclear physics and its related foundation physics, carbon neutralization energy which is focused on accelerator-driven advanced nuclear energy system, and advanced accelerator-based precision radiotherapy, including hadron cancer treatment and targeted a radio-medicine. The Center includes two national mega-scale scientific facilities, the Highly Intensive Accelerator Facility (HIAF, 2018~2025) and the Chinese Initial Accelerator Driven System (CIADS, 2021~2027), which are under construction will provide the highest beams from proton to uranium. This talk shows the progress of the scientific facilities, some pre-research based on existing facilities, and the development of key techniques and their applications.

Biography:

Prof. Zhan Wenlong is a noted nuclear physicist and an academician of the Chinese Academy of Sciences. He was the previous director of the Institute of Modern Physics, vice-chair of the National Laboratory of Heavy Ion Accelerator in Lanzhou, vice-president of the Chinese Academy of Sciences, and vice-president of the executive council of the 28th International Union of Pure and Applied Physics (IUPAP). He was elected as an alternate member of the 17th and 18th China Central Committee and a deputy to the 13th National People's Congress (NPC).

Now he is a member of the Social Development Affairs Committee of NPC, chair of the Advanced Energy Science and Technology Guangdong Laboratory, and General Commander of the "12th Five-Year Plan" Key National Technology Infrastructures "High Intensity Heavy-ion Accelerator Facility (HIAF)" and "China initiative Accelerator Driven System". He has been in charge of the study of heavy ion nuclear physics for a long time, leading and pushing for tumour therapy by heavy ion in China. He devotes himself to the research and application of advanced heavy-ion accelerator technology. He has published more than 160 papers in academic journals and conferences at home and abroad. He has been honoured with various awards, such as the State Science and Technology Progress Award Second Class, Natural Science Prize of the Chinese Academy of Sciences First Class and Third Class, Technology Progress Prize of the Chinese Academy of Sciences First Class, and the first prize of Science and Technology Progress Award of Gansu Province. He was funded by Outstanding Youth Science Fund of Natural Science Fund Committee and awarded for Outstanding Young Scholar Physics Award of Qiushi Foundation, Ho Leung Ho Lee Science and Technology Progress Award, and the National Silver Winner of the Outstanding Sons and Daughters Border. He was named an outstanding returned overseas student, outstanding scientific and technological personnel, outstanding professional and technical personnel, May 1st Labor Medal winner, and National Outstanding Party Member.