#### Clinical Engineer System in JAPAN

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## **Clinical Engineer System in Japan**

#### National License The Clinical Engineers Act (Act No. 60 of 1987)

- Need to pass the national examination.
- Those who pass the national examination need to register on the name list of clinical engineers at the Ministry of Health, Labour and Welfare by application, and their license will be issued by the Minister of Health, Labour and Welfare.





## Training and Education

Three to four years education at school (university or college) designated by the government.

(about 80 schools have CE course in Japan)

CONTENTS	
BASIC FIELDS	The Foundation of Scientific Thinking
	Humanity and Life
SPECIALISED BASIC FIELDS	Structure and Function of the Human Body
	Basic Medicine
	Basic Science and Engineering
	Basic Medical Information Technology and
	System Engineering
SPECIALISED FIELDS	Medical Bioengineering
	Medical Instrument Science
	Biomedical Technology
	Medical Safety Management
	Clinical Medicine
	Practical Clinical Training

#### Table1. Essential Education Contents



#### **Business Scope**

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- Respiratory Treatment
- Perfusion (Cardiopulmonary Bypass)
- Blood Purification including Haemodialysis
- Operation Room
- Intensive Care
- Cardiovascular Catheter
- Hyperbaric Oxygen Therapy
- Cardiac Implantable Electronic Devices such as Pacemakers, ICDs
- Medical Equipment Management
- Endoscope



The Clinical Engineer Basic Operation Guide 2010



#### Our Clinical Fields (a case of Aso lizuka Hospital)



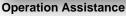


Haemodialysis



**Operation Room** 







Perfusion



Critical Care / Intensive Care



Capsule Endoscopy (Interpretation)



Cardiac Catheter (intervention)



Pacemaker Clinic

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Hyperbaric Oxygen Therapy



**Staff Education** 

Endoscopy

#### Japan Association for Clinical Engineers (JACE) est. 1990

# JACE was recognised as a public interest incorporated association by the Japanese Cabinet Office in 2012.

The objective of JACE is to contribute to the promotion and development of the nation's medical care and welfare through the raise of professional ethics of CEs, enhancement of their professional knowledge and skills, and improvement of reliability of equipment-based medical care and welfare, including life-support systems.

About 42,000 licensed Clinical Engineers in Japan About 20,000 of them are the members of JACE





## **Roles of JACE**

- Safety Management Activities in Clinical Engineering Fields
- Awareness Activities
- Development of Knowledges and Skills, and Quality Improvement
- Welfare for the Members
- Publishing Books and Journals







## Annual Conference of JACE

#### Participant: Over 5,000

(The 25<sup>th</sup> Congress of JACE in 2015)

- 120 Oral Presentations 500 Poster Presentations
  - 5 Lectures
  - 18 Luncheon Seminars
  - 2 Lectures Open to the Public
  - 4 Symposiums
  - 17 Workshops
  - 40 Exhibitions



The 30<sup>th</sup> Congress of JACE will be held in Nagoya on 23-24 May 2020.

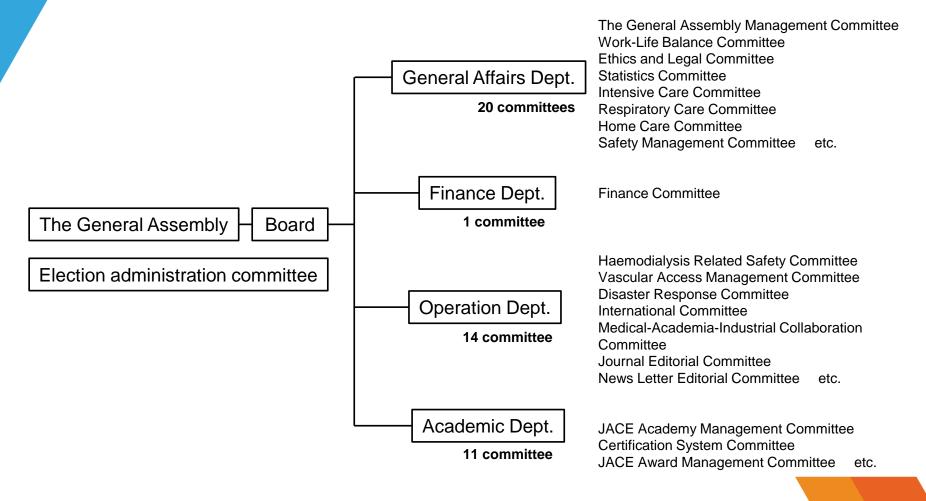
http://www.congre.co.jp/jace30/







#### **Organisations of JACE**





## Thank you for your attention

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