



College of Surgeon, Academy of Medicine of Malaysia
Annual Scientific Meeting 2018

PRECONGRESS WORKSHOP (NEUROSURGERY)



Traumatic Brain Injury & Practical Training on High Speed Drills and ICP Monitoring

Date : 10 May 2018 (Thursday)

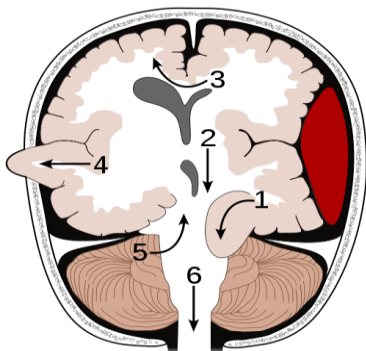
Venue : Auditorium and Seminar Room, Ambulatory Care Centre (ACC),
Hospital Raja Permaisuri Bainun (HPRB), Ipoh, Perak

COURSE OBJECTIVES AND LEARNING OUTCOMES

A. DIDACTIC LECTURE

The lecture will cover the following topics:

- Traumatic Brain Injury (Epidemiology, Classification, Outcome)
- Practical Neurosurgical Radiology in Emergencies and Traumatic Head Injury (typical and atypical radiological findings, CT scan interpretation in emergencies and patient's management)
- Treatment protocol for Head Injury (Evidence Based & Practical)
- Management of Polytrauma and its impact on Cerebral Perfusion and Injury
- Surgical Treatment For Intracranial Hemorrhages
 - operative techniques for traumatic intracranial hemorrhage ie Extradural Hemorrhage (EDH) , Subdural Hemorrhage (SDH)
- Panel of Discussion & Case Scenario

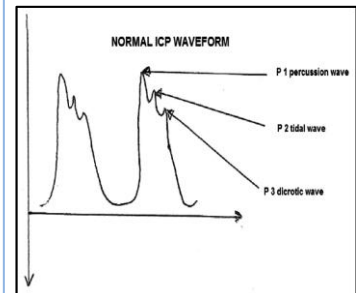
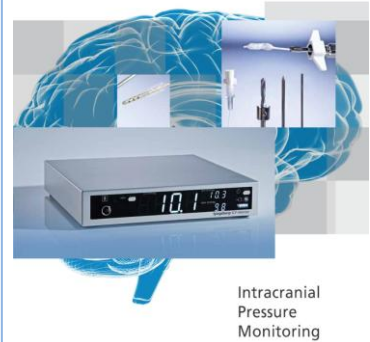


B. HANDS ON PRACTICAL SESSION

B.1 INTRACRANIAL PRESSURE (ICP) MONITORING.

1. Principles of Intracranial Pressure Physiology
 - a. Monroe Kellie Doctrine
 - b. Pathophysiology of Raised ICP
2. Principles of ICP Monitoring
 - a. Indications of Monitoring
 - b. Types / Anatomical Sites of Monitoring
 - c. Normal ICP Parameters
3. Technical Aspects of ICP Monitor Insertion
 - a. Surgical Technique
 - b. Trouble Shooting Measures Intra operatively
 - c. Complication Avoidance
4. Post Operative Care & Management of ICP Monitoring
 - a. Technical Nuances
 - b. Reliability of ICP values
 - c. Care of ICP Device in ICU
 - d. Management of Raised ICP

Spiegelberg
Technology for brains



B.2 HIGH SPEED DRILLS

1. Principle of High Speed Drills
2. Components and handling:
 - a. Drill Motor
 - Power source, speed range, torque, operating Pressure, connection
 - b. Hand piece
 - * Attachment – Craniotome, straight, angle, length
 - c. Control
 - * Hand / Foot
 - d. Burr / Cutter / Drill Bit
 - * Attachment size, Head diameter,
 - * Head Shape – round, match, acorn, pin cutter
 - * Head Type – fluted, diamonds
 - * Coarseness / Grit - Fine, Coarse, Extra Coarse
3. Special procedures:
 - a. Burr Hole / Craniotomy / Craniectomy
 - b. Shelling of Egg
 - c. Durotomy / Dura Repair / Dura Tenting

