

2015 2nd International Conference on Biomedical Engineering

(ICoBE 2015)

**Penang, Malaysia
30-31 March 2015**



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Technical Sessions

TECHNICAL SESSIONS SCHEDULE

Date	Time	Session		
30 March 2015, Monday	1400-1600	ICoBE B1	ICoBE B2	
	1615-1800	ICoBE B3	ICoBE B4	
31 March 2015, Tuesday	0830-1030	ICoBE B5	ICoBE B6	
	1045-1230	ICoBE B7	ICoBE B8	ICoBE B9
	1400-1600	ICoBE B10	ICoBE B11	
	1615-1800	ICoBE B12	ICoBE B13	

Sessions:

ICoBE B1 Biomedical Signal and Image Processing 1

ICoBE B2 Biomedical Signal and Image Processing 2

ICoBE B3 Biomedical Signal and Image Processing 3

ICoBE B4 Biomedical Devices & Others 1

ICoBE B5 Biomedical Signal and Image Processing 4

ICoBE B6 Biomedical Devices & Others 2

ICoBE B7 Biomedical Device & Others 3

ICoBE B8 Biomedical Device & Others 4

ICoBE B9 Biomedical Signal and Image Processing 5

ICoBE B10 Biomedical Devices & Others 5

ICoBE B11 Biomaterials and Biomechanics & Rehabilitation

TECHNICAL SESSION (B1)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B1: Biomedical Signal and Image Processing 1

Date & Time: 30 March 2015, 2.00 p.m

Venue: Room 3

- B1-1 Appraisal of EEG Beta summative power towards Learning Style classification....1**
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- B1-2 Dose Reduction in Breast Imaging: A Phantom Study....6**
Presenter: Surangkana Kantharak
- B1-3 Somatosensory Source Localization for the Magnetoencephalography (MEG) Inverse Problem in Patients with Brain Tumor....12**
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- B1-4 3D Reconstruction of Spine from Partial Biplanar Radiographic Image Data....17**
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- B1-5 Analysis of the effects of Distance between Head and Mobile Phone on SAR....22**
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- B1-6 A Survey of Analysis and Classification of EEG Signals for Brain-Computer Interfaces....26**
Presenter: Mohd Zaizu Ilyas
- B1-7 Intelligibility modification of Dysarthric Speech using HMM-based Adaptive synthesis system....32**
Presenter: Dhanalakshmi Munirathnam
- B1-8 Low Computational Complexity EEG Epilepsy Data Classification Algorithm for Patients With Intractable Seizures....37**
Presenter: Ahmad M. Aldabbagh

TECHNICAL SESSION (B2)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B2: Biomedical Signal and Image Processing 2

Date & Time: 30 March 2015, 2.00 p.m

Venue: Room 4

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- B2-2 Automatic Exclusion of Skin Border Regions from Breast MRI Using Proposed Combined Approach....47**
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- B2-4 Toward Intelligent Ankle Foot Orthosis for Foot-drop, a Review of Technologies and Possibilities....58**
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- B2-5 An Overview: Investigation of Electroporation and Sonoporation Techniques....63**
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Presenter: Hassan Buhari Mamman
- B2-7 Electromyography (EMG) based Signal Analysis for Physiological Device Application in Lower Limb Rehabilitation....73**
Presenter: Nurhazimah Nazmi

TECHNICAL SESSION (B3)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B3: Biomedical Signal and Image Processing 3

Date & Time: 30 March 2015, 4.15 p.m

Venue: Room 3

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- B3-2 Enhancing Physionet Electrocardiogram Records for Fetal Heart Rate Detection Algorithm....83**
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- B3-3 Analysis of Volatile Metabolites Emitted by Various Species to Reveal Their Roles in Chemical Ecology and Healthcare....89**
Presenter: Azian Azamimi Abdullah
- B3-4 Rehabilitation Exercise Game Model for Post-stroke using Microsoft Kinect Camera....95**
Presenter: Azrulhizam Shapi'i
- B3-5 Analysis of Touching Sensation by Varying Weights of Rectangular Object....101**
Presenter: Siti Nabilah Binti Eleyas

TECHNICAL SESSION (B4)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B4: Biomedical Devices & Others 1

Date & Time: 30 March 2015, 4.15 p.m

Venue: Room 4

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Presenter: Lee Jia Ji

- B4-3 A Promising Electrochemical Sensing Platform Based On A Graphene
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Presenter: Nurulasma Zainudin

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- B4-5 Effect Of Doping To The Pore Structure And Pore Diameter On Silicon
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Presenter: Norhafizah Burham

TECHNICAL SESSION (B5)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B5: Biomedical Signal and Image Processing 4

Date & Time: 31 March 2015, 8.30 a.m

Venue: Room 3

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Presenter: Nurul Zhafikha Noor Rashid
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Presenter: Chawki Berkai
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Presenter: Nur Hidayah Ismail

TECHNICAL SESSION (B6)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B6: Biomedical Devices & Others 2

Date & Time: 31 March 2015, 8.30 a.m

Venue: Room 4

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- B6-2** **An Overview on Jaundice Measurement and Application in Biomedical: The potential of Non-invasive method....165**
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Presenter: Nur Arina Hasmimi Bt Ramli
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Presenter: Shazwani Binti Sarkawi

TECHNICAL SESSION (B7)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B7: Biomedical Devices & Others 3

Date & Time: 31 March 2015, 10.45 a.m

Venue: Room 3

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Presenter: Mohamad Azman Abu Hassan

TECHNICAL SESSION (B8)

2015 2nd International Conference on Biomedical Engineering (ICoBE)

Session ICoBE B8: Biomedical Devices & Others 4

Date & Time: 31 March 2015, 10.45 a.m

Venue: Room 4

- B8-1** **Colorimetric Method for Visualizing Biotin-Labeled DNA Probes Hybridized to DNA Human Papillomavirus (HPV) Immobilized on Silicon dioxide (SiO₂) Thin Film....209**
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Presenter: Fatin Nabilah Mohd Faudzi
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TECHNICAL SESSION (B9)

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Session ICoBE B9: Biomedical Signal and Image Processing 5

Date & Time: 31 March 2015, 10.45 a.m

Venue: Room 3

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- B9-2** **ECG Signals Classification Based on Discrete Wavelet Transform, Time Domain and Frequency Domain Features....245**
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- B9-3** **Color and Morphological Based Techniques on White Blood Cells Segmentation....251**
Presenter: Huey Nee Lim
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Presenter: M. Mahadi Abdul Jamil

TECHNICAL SESSION (B10)

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Session ICoBE B10: Biomedical Devices & Others 4

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TECHNICAL SESSION (B11)

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Session ICoBE B11: Biomaterials and Biomechanics & Rehabilitation

Date & Time: 31 March 2015, 2.00 p.m

Venue: Room 5

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- B11-3 Accuracy and Reliability of Optimum Distance for High Performance
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- B11-4 The Effects of Contact Area and Surface Curvature on Biomechanical
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- B11-5 Development And Characterization Of PVA Based Hydrogel For
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- B11-6 Finite Element Analysis for Stent in Patent Ductus Arteriosus (PDA)....323**
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