



### Curriculum Vitae

Name : Guntur Eric Luis Adiwati (雷雨力)

Phone : +853 62989165

Email : laguntureric@must.edu.mo

### QUALIFICATIONS

- MBChB (Edinburgh, UK) - Bachelor of Medicine, Bachelor of Surgery
- MRCS Surgery (Edinburgh, UK) - Membership of the Royal College of Surgeons of Edinburgh
- CTCM (Beijing, China) - Certificate of Advance Study in Acupuncture
- MPH (Harvard, USA) - Master of Public Health
- MMed (Orthopaedic Surgery) (Singapore) - Master of Medicine in Orthopedic Surgery
- MOrthSurg (Orthopaedic Surgery) (Malaysia) – Master of Orthopedic Surgery
- Sp(Orth & Tr)- Specialist in Orthopaedic and Trauma Surgery Board Certified
- PhD (NTU, Singapore) - Doctor of Philosophy-3D Printing
- Clinical Fellowship in Minimally Invasive Surgery & Sports Medicine (Sydney. Australia)

### PRIZES AND AWARDS

- Singapore-China Nanxun Innovative & Entrepreneurship Challenge Grand Finals Outstanding Award - 2019
- Falling Walls Lab Finalist, Singapore-2017
- 2<sup>nd</sup> APOA (Asia-Pacific Orthopaedic Association) Trauma Award Runner-up-2007
- Tan Tock Seng Hospital Courage Star Award in Singapore SARS outbreak- 2003
- Distinction Award in General Practice Medicine (University of Edinburgh)-1993
- Hunter Book Prize in Dermatology (University of Edinburgh)-1993

### SCHOLARSHIPS AND BURSARIES

- 2016 to 2019 NTU PhD Research Scholarship (Nanyang Technological University, Singapore)
- 1991-Gunning Medical Research Scholarship (University of Edinburgh)

## **EDUCATIONAL BACKGROUND**

1989 Sept – 1994 July	Edinburgh University Medical School, Scotland, United Kingdom Bachelor of Medicine, Bachelor of Surgery
1997 Feb – 1997 Aug	Beijing University of Traditional Chinese Medicine, PR China CTCM
1997 Sept – 1998 July	Harvard University, USA Master of Public Health
1999 Nov – 2002 Dec	Membership of the Royal College of Surgeon of Edinburgh
2000 Nov -- 2003 Aug	National University of Singapore, Singapore Master of Medicine in Orthopedic Surgery
2004 Sept – 2008 July	University of Malaya, Kuala Lumpur, Malaysia Master of Orthopedic Surgery
2016 Jan –2019 Oct	PhD, Nanyang Technological University, Singapore  PhD Thesis: 3-D Direct Printing of Silicone Meniscus Using a Novel Heat-Curing Extrusion Based Silicone Printer

## **PROFESSIONAL / WORKING EXPERIENCE**

1995 Aug – 1996 Feb	Glasgow Royal Infirmary, Department of Internal Medicine. United Kingdom. House Officer
1996 Feb – 1996 Aug	Newcastle General Hospital, Department of General Surgery, United Kingdom. House Officer
1996 Sept – 1997	Yale University Medical School. USA. Postdoctoral Fellow.
1998 Nov – 1999 Aug	Singapore Tan Tock Seng Hospital Department of Neurosurgery. Medical Officer. Department of Orthopedic Surgery. Medical Officer/ Lecturer in Orthopedics
2000 Sept – 2001 Jan	Singapore Tan Tock Seng Hospital Department of Orthopedic Surgery. Medical Officer / Lecturer in Orthopedics
2001 Feb – 2002 Feb	Singapore Alexandra Hospital Department of General Surgery. Medical Officer. Department of Accident and Emergency. Medical Officer / Lecturer in Orthopedics
2002 Mar – 2003 Aug	Singapore National University Hospital Department of Orthopedic Surgery. Registrar/ Senior Lecturer in Orthopedics
2004 Sep – 2008 May	University of Malaya. Faculty of Medicine.

	<b>Department of Orthopedic Surgery, Kuala Lumpur, Malaysia</b>
<b>2008 Jun – 2008 Nov</b>	<b>Singapore Alexandra Hospital Department of Orthopedic Surgery. Registrar. Senior Lecturer in Orthopedics</b>
<b>2009 Jan – 2014 Apr</b>	<b>Consultant Private Practice</b>
<b>2014 Aug – 2015 Oct</b>	<b>Asia Metropolitan University, Faculty of Medicine Deputy Dean (Clinical), Faculty of Medicine Clinical Coordinator. Senior Lecturer in Orthopedics</b>
<b>2016 Jan – 2019 Oct</b>	<b>PhD Nanyang Technological University Department of Mechanical and Aerospace Engineering, Singapore</b>
<b>2019 Nov- 2020 Aug</b>	<b>Royal College of Surgeons of Ireland &amp; University College Dublin (Malaysia Campus) Senior Lecturer in Orthopedic Surgery &amp; General Surgery Royal College of Surgeons of Ireland (RCSI)- Basic Surgical Skills (BSS) Course Teaching Faculty</b>
<b>2021 Feb - Current</b>	<b>Associate Professor, Faculty of Medicine Macau University of Science and Technology</b>

#### **ORTHOPAEDIC RESEARCH COLLABORATION**

- 1) **Luis GE (PRINCIPAL INVESTIGATOR)**  
2007-2008 Biomechanical Testing of New Synthes Product: Clavicle Hook Plate.  
Collaboration with Synthes GmbH. Reference: LUIS ADIWATI MD L.300.19.2/CW i. Mandating unit:  
Eimattstrasse 3, 4436 Oberdorf, Switzerland
- 2) **Luis GE (PRINCIPAL INVESTIGATOR)**  
2017-2018 AMT Collaboration 3D Printer Research & Development, Singapore

#### **INTELECTUAL PROPERTY / PATENTS**

1. **Disposable arthroscope -2018 Patent granted**
2. **3D Printed Silicone meniscus with slow-released mechanism -2018 Patent granted**
3. **3D Human Bone Printer -2017 Patent granted**
4. **3D Silicone Printer-2019 Patent filed**
5. **Shape-memory silicone technology-2019 Patent filed**

## **PUBLICATIONS**

1. Abhishek Kafle<sup>1</sup>, Eric Luis<sup>2</sup>, Raman Silwal<sup>1</sup>, Pratisthit Lal Shrestha<sup>1</sup>, Houwen Matthew Pan<sup>3</sup>, Anil K. Bastola<sup>4,\*</sup> **Review: 3D Printing of polymer materials: FDM, SLS, and SLA** Under review **Aug 2021**
2. E.Luis et al. Primary Leiomyosarcoma of the Lumbar Spine: A Case Report and Literature Review **DOI: 10.31487/j.SCR.2021.01.02 Jan 2021**
3. E.Luis, H.M Pan, A.Bastola, R. Bajpai, S.L.Sing, J.H. Song, W.Y.Yeong. 3D Printed Silicone Meniscus Implants: Influence of the 3D Printing Process on Properties of Silicone Implants. **Polymers (Basel). 2020 Sep; 12(9): 2136. (Impact factor 3.426)**
4. E, Luis, H. M. Pan, R. Bajpai, S. Agarwala, J. Song, W. Y. Yeong. 3D Direct Printing of Silicone Meniscus Implant Using a Novel Heat-Cured Extrusion Based Printer. **Polymer 2020,12(5),1031 (Impact factor 3.426)**
5. E, Luis, H. M. Pan, S. L. Sing, A. Bastola, G. D. Goh, G. L. Goh, H. K. J. Tan, R. Bajpai, J. Song, W. Y. Yeong. Silicone 3D-Printing: Process Optimization, Product Biocompatibility and Reliability of Silicone Meniscus Implants. **3D Printing and Additive Manufacturing 6; 6: 2019 (Impact factor 3.579)**
6. E. Luis, W. Y. Yeong, J. Song, H. M. Pan, S. L. Sing. Silicone Meniscus with Slow-Released Mechanism. *Provisional Patent No: 2018-265-01-SG PRV*
7. Luis E, et al., A Review of Medical Silicone 3D-Printing Technologies and Clinical Applications. *Journal of Orthopedic Research and Therapy. 2018 JORT-1104 DOI: 10.29011/2575-8241.001104 (Impact factor 1.02)*
8. Li YH, Luis E. 2016- Partridge Publication- 2016. **3D Printing of Medical Models from CT-MRI Images.**
9. Luis E, Mervyn J Cross. Using Femoral Notch Width Index and Medial Condyle-to-Lateral Condyle Ratio (M:L ratio) as Predictors in Subjects Prone to Anterior Cruciate Ligament Injury (ACL) Injury: An MRI Study. *SM Journal of Orthopedics. 2015;1(4):1017.*
10. Ken CC, Singh VA, Luis GE Kienbock's disease: percutaneous cement lunatoplasty--a cadaver study. *Journal of Hand Surgery. (European Vol). 2012 Jan;37(1):81-2. (Impact factor 2.648)* doi:10.1177/1753193411423882. Epub 2011 Nov 8.
11. GE Luis, Chee-Khuen Yong, Deepak A Singh, S Sengupta and David SK Choon. Acromioclavicular joint dislocation: a comparative biomechanical study of the palmaris-longus tendon graft reconstruction with other augmentative methods in cadaveric models. *Journal of Orthopaedic Surgery and Research 2007, 2:22 doi:10.1186/1749-799X-2-22 (Impact factor 2.030)*
12. GE Luis, Eng-Seng Ng. Acute compartment syndrome of the hand in Henoch-Schonlein-Purpura. *Journal of Medical Case Reports 2007, 1:6 doi:10.1186/1752-1947-1-6 (Impact factor 0.620)*
13. Financial Analysis and Audit of the Intensive Care Unit Critical Care Pathways in Good Samaritan District Hospital –GE Luis. *Harvard 1998*
14. Cell culture, growth and purification of human melanocytes, fibroblast and keratinocytes- GE Luis. *Yale University 1996*
15. Scientific Evaluation of Acupuncture –GE Luis. *Edinburgh University 1994*
16. The effects of EP405, a new prostacyclin analogue, on rabbit platelets and tracheal smooth muscle- GE Luis. *Edinburgh University 1993*

## **EDITORIAL BOARD AND REVIEWER**

- 1) Guest Editor for “Polymers”

- 2) Reviewer for JOSR- Journal of Orthopedic Surgery and Research
- 3) Section Editor for “ SM Journal of Orthopaedics”
- 4) Reviewer for “Indian Journal of Orthopaedics” (IJO)- 2007-current
- 5) Reviewer for “British Journal of Medicine and Medical Research”
- 6) Reviewer for “Saudi Medical Journal”
- 7) Reviewer for “International Journal of Shoulder Surgery”

### **COMMITTEE and TEACHING FACULTY**

- 1) 2020- Teaching Faculty for Basic Surgical Skills (BSS) Course-Royal College of Surgeons of Ireland
- 2) 2019- Teaching Faculty for Basic Surgical Skills (BSS) Course-Royal College of Surgeons of Ireland
- 3) 2014/15-MBBS Faculty of Medicine, Deputy Dean (Clinical), Asia Metropolitan University (AMU), Malaysia
  - i. MBBS Faculty of Medicine, Clinical Coordinator, AMU
  - ii. MBBS Examination and Vetting Committee, Vice-Chairman, AMU Faculty of Medicine, Asia Metropolitan University, Malaysia
- 4) 2007-Organising Committee Member for “Cadaveric Shoulder Arthroscopy Workshop”, University of Malaysia
- 5) 2006-Organising Committee Member for “Cadaveric Musculoskeletal Flap Dissection Course”- University of Malaya
- 6) 2001-Alexandra Hospital, Junior Staff Committee Member, Singapore
- 7) 1998-Harvard University, HSPH Student Coordinating Committee Member, USA

