

## 2018 Research Grants

### Malaysia Toray Science Foundation (MTSF) Grants

**1) Analysis of MSH2 and epcam gene silencing and their effects in the WNT/B-Catenin pathway**

Grant Amount: RM20,000.00

Duration: 01 Jan 2018 - 31 Dec 2018

Researchers: Dr. Khairul Bariah Ahmad Amin Noordin

**2) Differentiation and characterization of Epithelial Cells and Fibroblasts from Stem Cell from Human Exfoliated Deciduous Teeth (SHED)**

Grant Amount: RM20,000.00

Duration: 01 Jan 2018 - 31 Dec 2018

Researchers: Dr. Zurairah Berahim

### Bridging Grants

**1) The effect of experimental portland cement-based endodontic material on osteogenic differentiation of stem cells from human exfoliated deciduous teeth (Shed)**

Grant Amount: RM10,000.00

Duration: 25 Jan 2018 - 24 Jan 2019

Researcher: Prof. Dr Adam Husein

**2) Development of antimicrobial pmma composites for craniofacial reconstruction application**

Grant Amount: RM8,800.00

Duration: 25 Jan 2018 - 24 Jan 2019

Researcher: Assoc. Prof. Dr Dasmawati Mohamad

**3) Anti inflammatory effect of raw local honey on expression level of pro-inflammatory genes in lipopolysaccharide nduced inflammation in human periodontal ligament fibroblast cells**

Grant Amount: RM9,700.00

Duration: 25 Jan 2018 - 24 Jan 2019

Researcher: Dr. Siti Lailatul Akmar Zainuddin

**4) Effect of growth factors on the co-culture of human gingival fibroblasts and vein endothelial cells on a 3D chitosan scaffold**

Grant Amount: RM10,000.00

Duration: 25 Jan 2018 - 24 Jan 2019

Researcher: Dr. Zurairah Berahim

**5) In Vitro Evaluation of Spirulina as Anticaries Agent for Oral Health Products**

Grant Amount: RM25,000.00

Duration: 15 Nov 2018 - 14 Nov 2019

Researcher: Dr. Kasmawati @ Norhidayati Mokhtar

**6) Endothelial differentiation potential of human stem cells from extracted deciduous teeth (SHED) treated with vascular endothelial growth factor (VEGF) and seeded on human amniotic membrane (HAM) for dental pulp regeneration**

Grant Amount: RM10,000.00

Duration: 15 Dec 2018 - 14 Dec 2019

Researcher: Dr. Khairul Bariah Ahmad Amin Noordin

**7) Interfacial adaption between different root canal sealers and obturation techniques in oval canal**

Grant Amount: RM5,000.00

Duration: 15 Dec 2018 - 14 Dec 2019

Researcher: Dr. Huwaina Abd Ghani

**8) Colonization of streptococcus sanguinis on titanium dental implant with different hygiene instruments**

Grant Amount: RM5,000.00

Duration: 15 Dec 2018 - 14 Dec 2019

Researcher: Dr. Akram Hassan

**9) Antibacterial property of virgin coconut oil (VCO) against cariogenic bacteria**

Grant Amount: RM5,000.00

Duration: 15 Dec 2018 - 14 Dec 2019

Researcher: Dr. Nor Aidaniza Abdul Muttlib

**10) A 5 year study of the outcome of deep caries management in patients attending Hospital Universiti Sains Malaysia and their level of knowledge, attitude and practice towards dental caries**

Grant Amount: RM5,000.00

Duration: 15 Dec 2018 - 14 Dec 2019

Researcher: Dr. Rabihah Alawi

**11) Influence of different access cavity designs on the fracture resistance of endodontically treated teeth**

Grant Amount: RM4,700.00

Duration: 15 Dec 2018 - 14 Dec 2019

Researcher: Dr. Nik Rozainah Nik Abdul Ghani

**USM Short Term Grants**

**1) The association between musculoskeletal disorders and practice of dental ergonomics among dental students in two public universities in Malaysia**

Grant Amount: RM33,078.60

Duration: 15 Feb 2018 - 14 Feb 2020

Researchers: Dr Munirah Mohd Adnan, Assoc. Prof. Dr Normastura Abd Rahman, Dr Aza Fazura Asmaon

**2) Comparison of craniofacial morphology in late adolescent class III molocclusion patient treated with active skeletonized sutural distractor and facemask appliance : a randomized clinical trial**

Grant Amount: RM35,000.00

Duration: 15 Mar 2018 - 14 Mar 2020

Researchers: Dr Jawaad Ahmad Asif, Prof. Dr Rozita Hassan, Assoc. Prof. Dr Shaifulizan Ab Rahman, Assoc. Prof. Dr Norkhafizah Saddki, Dr Norma Ab Rahman

**3) Prospective evaluation of muscle activity in Class II malocclusions treated by low level laser therapy : an electromyography study**

Grant Amount: RM27,272.00

Duration: 1 Apr 2018 - 31 Mar 2020

Researchers: Dr Siti Aishah Zainal, Prof. Dr Adam Husein, Dr Saidi Jaafar, Dr Norma Ab Rahman

**4) Influence of Copper Nanoparticles Addition on the Antibacterial Properties of Dental Titanium Alloy**

Grant Amount: RM32,413.84

Duration: 15 Sep 2018 - 14 Sep 2020

Researchers: Dr. Azirrawani Ariffin, Prof. Dr Adam Husein, Assoc. Prof. Dr. Norhayati Luddin

## **Research University Grants**

### **1) Reinforcement and antibacterial mechanism of 3D printed hybrid carbon fiber / ZnO filled polyamide 6 for craniofacial reconstruction application**

Grant Amount: RM80,000.00

Duration: 1 Feb 2018 - 31 Jan 2021

Researchers: Assoc. Prof. Dr Dasmawati Mohamad, Prof. Dr Hazizan Md Akil

### **2) Developing a new dimension of exponential regression model : application in health sciences**

Grant Amount: RM42,634.00

Duration: 1 Apr 2018 - 31 Mar 2021

Researchers: Assoc. Prof. Dr. Wan Muhammad Amir Wan Ahmad, Nor Azlida Aleng @ Mohamad, Dr Ruhaya Hassan, Zalila Ali

### **3) Cosmos caudatus encapsulated in exosomes as nanoparticle drug delivery system to enhance cytotoxicity activity in autologous oral squamous cell carcinoma**

Grant Amount: RM97,475.48

Duration: 1 Apr 2018 - 31 Mar 2021

Researchers: Dr Wan Nazatul Shima Shahidan, Dr Wan Amir Nizam Wan Ahmad

### **4) Gene expression profile analysis on the effects of betel quid and areca nut extracts in oral epithelium malignant transformation using mouth-ordinary-epithelium 1 cell model**

Grant Amount: RM97,751.50

Duration: 1 Apr 2018 - 31 Mar 2021

Researchers: Dr Masitah Hayati Harun, Dr Azlina AHmad, Assoc. Prof. Dr Sarina Sulong, Mohamad Ezany Yusoff

### **5) Effects of gypsum-chitosan based biomaterial on dentinogenic/osteogenic differentiation of stem cells from human exfoliated deciduous teeth**

Grant Amount: RM89,999.00

Duration: 1 Apr 2018 - 31 Mar 2021

Researchers: Prof. Dr Adam Husein, Assoc. Prof. Dr. Nurul Asma Abdullah

### **6) A comparative study between graftless and grafted maxillary sinus lift procedure for implant placement**

Grant Amount: RM98,000.00

Duration: 1 Jun 2018 - 31 May 2019

Researchers: Assoc. Prof. Dr. Shaifulizan Ab. Rahman, Dr. Shaifuzain Ab. Rahman

### **7) Morphological and molecular evaluation of human amnionic membrane as a scaffold for periodontal tissue regeneration**

Grant Amount: RM100,000.00

Duration: 1 Oct 2018 - 31 Sep 2021

Researchers: Assoc. Prof. Dr Haslina Taib, Dr. Zurairah Berahim, Dr. Azlina Ahmad, Prof. Dr Suzina Sheikh Abdul Hamid