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# SHARMILI VIDYADARAN

## | EDUCATION & QUALIFICATIONS |

- |                      |   |
|----------------------|---|
| Oct 2001 – July 2005 | <b>PhD (Neuroscience)</b> , Imperial College London<br><i>Thesis title: Neuroprotective properties of HSP27 in the central nervous system</i>   |
| May 1998 – May 2001  | <b>BSc (Hons) Biomedical Sciences</b> , Universiti Putra Malaysia, First Class Honours<br><i>Thesis title: The effect of yeast and hyphal forms of <u>Candida albicans</u> on cytokine mRNA expression in a human liver cell line</i> |

## | APPOINTMENT |

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| 1 <sup>st</sup> May 2012 – present                               | Associate Professor<br>Immunology Unit, Department of Pathology<br>Faculty of Medicine and Health Sciences<br>Universiti Putra Malaysia. |
| 1 <sup>st</sup> October 2008<br>– 30 <sup>th</sup> April 2012    | Senior Lecturer<br>Immunology Unit, Department of Pathology<br>Faculty of Medicine and Health Sciences<br>Universiti Putra Malaysia.     |
| 31 <sup>st</sup> December 2005<br>– 1 <sup>st</sup> October 2008 | Lecturer<br>Faculty of Medicine and Health Sciences<br>Universiti Putra Malaysia.  |

July 2001 – Aug 2005

Tutor,  
Immunology Unit,  
Faculty of Medicine and Health Sciences  
Universiti Putra Malaysia.

| RESEARCH |

*GRANTS*

*As Principal Investigator:*

1. DT0034  
Dana Tautan 2017 - RM 8070.4
2. GP-IPS 7  
Geran Putra IPS 2017 – RM19 876 *Ongoing*  
Developing a culture model of microglia-induced neurotoxicity
3. FRGS/2/2013/SKK01/UPM/02/15  
Fundamental Research Grant Scheme (FRGS) 2013 – RM137 000 *Completed*  
A developmental role for microglia: pinpointing a function for microglia in embryonic neurogenesis
4. 02-01-04-SF1538  
Sciencefund 2012 – RM196 000 *Completed*  
MicroRNA-mediated immunomodulation of microglia by mesenchymal stem cells.
5. ERGS/1/2012/5527106  
Exploratory Research Grant Scheme (ERGS) 2012 – RM166 200 *Completed*  
Gene expression and cell migration in mesenchymal stem cell-mediated modulation of microglia.
6. 04-02-12-1796RU  
Research University Grant Scheme (RUGS) 2012 – RM15 000 (UPM) *Completed*  
Remodelling microglia in vitro in a 3D collagen construct
7. 04-02-11-1392RU  
Research University Grant Scheme (RUGS) 2011 – RM15 000 (UPM) *Completed*  
Determining the role of matrix metalloproteinases (MMPs) in microglia activation.
8. 04-02-10-0924RU  
Research University Grant Scheme (RUGS) 2010 – RM 184 000 (UPM) *Completed*  
Elucidating immunoregulatory mechanisms of mesenchymal stem cells on microglia.

9. 102-FR  
Fundamental Research Grant Scheme (FRGS) 2009 – RM 50 000 (Ministry of Higher Education) *Completed*  
Profiling gene expression of aged microglia: a snapshot view of microglial immunosenescence.
10. 6365900-14001  
L'Oreal Malaysia Women in Science Fellowship 2008 – RM 20 000 *Completed*  
Determining functional inhibition of microglia inflammatory responses by mesenchymal stem cells.
11. 03-10-07-331FR  
Fundamental Research Grant Scheme (FRGS) 2007 – RM 195 000 (Ministry of Higher Education) *Completed*  
Investigating the effects of immunosenescence on microglia response.
12. 04/01/07/0117RU  
Research University Grant Scheme (RUGS) 2007 – RM 70 000 (UPM) *Completed*  
Determining immunoregulatory function of mesenchymal stem cells on microglia: implications for treatment of neurodegenerative diseases.
13. Geran Pensyarah Lantikan Baru (PLB) 2005- RM 5 000 (UPM) *Completed*  
Investigating the neuroprotective effects of inducing HSP70 expression in the kainic acid model of neurotoxicity.

*As Co-investigator:*

1. Fundamental Research Grant Scheme (FRGS) 2016 - RM 71 037.74  
Principal investigator: Dr Elaine Chan Wan Ling (IMU)  
FRGS/1/2016/SKK08/IMU/03/1  
A gene trap mutagenesis approach for the identification of NLRP1 inflammasome activation targets mediating beta amyloid (A $\beta$ )-induced neuronal pyroptosis
2. NKRA Research Grant Scheme (NRGS) 2015 – RM431 400  
Immunomodulatory and protective effects of standardized extract of Phyllanthus amarus in inflammatory-mediated neurodegeneration
3. Fundamental Research Grant Scheme (FRGS) 2015 – RM 148, 100  
Principal investigator: Assoc. Prof. Dr. Say Yee How (UTAR)  
FRGS/1/2015/SKK08/UTAR/02/1  
Investigation of angiogenin organophosphate pesticide interaction in ALS microglia activation
4. Fundamental Research Grant Scheme (FRGS) 2015-2017 – RM 139,000

Principal investigator: Dr. Cheah Pike See (UPM)

FRGS/1/2015/SKK08/UPM/02/1

Role of JAK-STAT signaling pathway during neurogenic-to-gliogenic shift in the brain of Ts1Cje Mouse Model for Down syndrome

5. Research University Grant Scheme (RUGS) 2007 – RM 168 000 (UPM)  
Principal Investigator: Dr. Maha Abdullah (UPM)  
Immunomodulatory effect of Malaysian Fruits, Vegetables and Local Traditional Herbs.
6. e-Science Fund 2006 – RM100 000 (Ministry of Science & Technology)  
Principal investigator: Dr. Syahrilnizam Abdullah  
Gene therapy for beta-thalassemia: development of vector with persistent transgene expression for haematopoietic stem cell gene transfer.
7. Science Fund 2006 – RM100 000 (Ministry of Science & Technology)  
Principal investigator: Assoc. Prof. Dr. Fauziah Othman  
Combating biofilm: gentamycin drug delivery system in bone tissue.
8. Science Fund 2006 – RM100 000 (Ministry of Science & Technology)  
Principal investigator: Dr. Rajesh Ramasamy  
Studies on mesenchymal stem cells as a potential cellular therapy for cancer.
9. Science Fund 2006 – RM249 000 (Ministry of Science & Technology)  
Principal investigator: Prof. Dr. Seow Heng Fong  
Discovering signal transduction inhibitors from Actinomycetes for potential anti-cancer drugs.

## PUBLICATIONS & PRESENTATIONS

### ISI Citation

Total Citations: 512

*h*-index: 13

### Books

1. STEM CELLS AND CANCER STEM CELLS: Therapeutic Applications in Disease and Injury. **Sharmili Vidyadaran**, Rajesh Ramasamy and Heng Fong Seow. Bone Marrow- Derived Mesenchymal Stem Cells: Role in Modulating Microglia. Volume 6. Editor Eric M. Hayat. Springer. 2012. pg 261-272.
2. Essential Guide to Postgraduate Study and Research. **Sharmili Vidyadaran**. Chapter 4: The Real Challenge; The Science and Art of Scientific Writing. Editors Haliza Mohd Riji and Syed Tajuddin Syed Hassan. Penerbit Universiti Putra Malaysia. 2009.
3. Problem Based Learning: Cases for Medical Students. Chapter: Yellow Eyes, Zainina Seman, Rushdan Abdul Aziz and **Sharmili Vidyadaran**. Volume 2, No. 2, December 2008.

## Full paper

1. Sandrasaigaran P, Algraittee SJR, Ahmad AR, **Vidyadaran S**, Ramasamy R. Characterisation and immunosuppressive activity of human cartilage-derived mesenchymal stem cells. *Cytotechnology*. (2018) Mar 1. doi: 10.1007/s10616-017-0182-4. **Impact factor: 1.857**
2. Wang H, **Vidyadaran S**, Mohd Moklas MA, Baharuldin MTH. Inhibitory Activity of *Ficus deltoidea* var. *trengganuensis* Aqueous Extract on Lipopolysaccharide-Induced TNF- $\alpha$  Production from Microglia. *Evid Based Complement Alternat Med*. (2017) 2017:2623163. **Impact factor: 1.750**
3. Abedi Z, Khaza'ai H, **Vidyadaran S**, Mutalib MSA. The Modulation of NMDA and AMPA/Kainate Receptors by Tocotrienol-Rich Fraction and  $\alpha$ -Tocopherol in Glutamate-Induced Injury of Primary Astrocytes. *Biomedicines*. (2017) 5(4). pii: E68. **PubMed cited**
4. Musa NH, Mani V, Lim SM, **Vidyadaran S**, Abdul Majeed AB, Ramasamy K. Lactobacilli-fermented cow's milk attenuated lipopolysaccharide-induced neuroinflammation and memory impairment in vitro and in vivo. *J Dairy Res*. (2017) 84(4):488-495. **Impact factor: 2.573**
5. Seow SL, Naidu M, Sabaratnam V, **Vidyadaran S**, Wong KH. Tiger's Milk Medicinal Mushroom, *Lignosus rhinocerotis* (Agaricomycetes) Sclerotium Inhibits Nitric Oxide Production in LPS-Stimulated BV2 Microglia. *Int J Med Mushrooms*. (2017) 19(5):405-418. **Impact factor: 1.357**
6. Zuhaida Md Zain, **Sharmili Vidyadaran** and Masriana Hassan. GSK-3 inhibition reduces inflammatory responses of microglia and upregulates IL-10 production. *Malaysian Journal of Medicine and Health Sciences*. (2017) 13: 1-8.
7. Nassim Karimi Hosseini, **Sharmili Vidyadaran**, Shinsmon Jose, Narges Eskandarian, Zalina Ismail, Syafinaz Amin Nordin. Comparative Analysis of Inflammatory Markers Produced by Macrophages Inoculated with Invasive and Colonizing Strains of *Streptococcus Agalactiae* (Group B *Streptococcus*) and Evaluation of Patients' Clinical Data. *Malaysian Journal of Medicine and Health Sciences*. (2017) 13: 55-60.
8. Shi Wei Tan, Maha Abdullah, Daud Israf Ali and **Vidyadaran S**. Palm Tocotrienols Reduce Lipopolysaccharide-Stimulated Inflammatory Responses of Microglia. *Malaysian Journal of Medicine and Health Sciences*. (2016) 12: 1-8.
9. Tong CK and **Vidyadaran S**. The role of microglia in embryonic neurogenesis. *Exp Biol Med* (2016) 241: 1669-1675. Review
10. Lye KL, Nordin N, **Vidyadaran S**, Thilakavathy K. Mesenchymal stem cells: From stem cells to sarcomas. *Cell Biol Int*. (2016) 40(6):610-8. Review. **Impact factor: 1.831**

11. Jose S, Tan SW, Tong CK, **Vidyadaran S**. Isolation and characterization of primary microglia from post-natal murine brain tissues: a comparison of two methods. *Cell Biol Int.* (2015) **39**(12):1355-63. ISSN: 1065-6995.
12. CK Tong, Md S Hasan, **S Vidyadaran**, N Nordin. Functions of microglial cells on neurogenesis, synaptic pruning and neurotransmission: a brief review. *Regenerative Research.* (2015) **4**(1): 52-26. E-ISSN 2232-0822.
13. Mohadese Hashem Borojerdi, Maryam Maqbool, Zuraidah Yusoff, **Sharmili Vidyadaran**, Ling King Hwa, Elizabeth George, Rajesh Ramasamy. The efficiency of cell sorting and harvesting methods for in vitro expansion of human umbilical cord blood derived CD34+ hematopoietic stem cells. *Malaysian Journal of Medicine and Health Sciences.* (2015) **11**(2): 21-28. *SCOPUS cited*
14. Harun A, **Vidyadaran S**, Lim SM, Cole AL, Ramasamy K. Malaysian endophytic fungal extracts-induced anti-inflammation in lipopolysaccharide-activated BV-2 microglia is associated with attenuation of NO production and, IL-6 and TNF- $\alpha$  expression. *BMC Complement Altern Med.* (2015) **15**(1):166-174. ISSN 1472-6882. **Impact factor: 1.88**
15. Neeranjini Nallathamby, Lee Guan-Serm, **Sharmili Vidyadaran**, Sri Nurestri Abd Malek, Jegadeesh Raman and Vikineswary Sabaratnam. Ergosterol of Cordyceps militaris attenuates LPS induced inflammation in BV2 microglia cells. (2015) *Natural Product Communication.* **10** (6):885-6. ISSN1934-578X. **Impact factor: 0.924**
16. Koh RY, Lim CL, Uhal BD, Abdullah M, **Vidyadaran S**, Ho CC, Seow HF. Inhibition of transforming growth factor- $\beta$  via the activin receptor-like kinase-5 inhibitor attenuates pulmonary fibrosis. (2015) *Mol Med Rep.* **11**(5):3808-13. ISSN 1791-3004. **Impact factor: 1.692**
17. Nasim Karimi Hosseini, Shinsmon Jose, **Sharmili Vidyadaran**, Syafinaz Amin Nordin. Optimization of cell density and LPS concentration for the evaluation of nitric oxide production on BV-2 cells in a Griess assay. (2014) *Malaysian Journal of Medicine and Health Sciences.* **10**(2):1-8.
18. Selvaraju, T.R., Khaza'ai, H., **Vidyadaran, S.**, Mutalib, M.S.A., Ramachandran, V., Hamdan, Y. Cytoprotective effect of tocotrienol-rich fraction and  $\alpha$ -tocopherol vitamin e isoforms against glutamate-induced cell death in neuronal cells. (2014) *International Journal for Vitamin and Nutrition Research.* **84**(3-4 ):140 – 151. **Impact factor: 1.117**
19. Siti Nurusaadah Hamzah, **Sharmili Vidyadaran**, Norshariza Nordin. Differentiation of rat full term amniotic fluid stem cells into dopaminergic neurons phenotype via adherent and non-adherent neural induction protocols. (2014) *Regenerative Research.* **3**:140-141.
20. Selvaraju TR, Khaza'ai H, **Vidyadaran S**, Abd Mutalib MS, Vasudevan R. The neuroprotective effects of tocotrienol rich fraction and alpha tocopherol against glutamate injury in astrocytes. (2014) *Bosn J Basic Med Sci.* **14**(4):195-204. **Impact factor: 0.906**
21. Shinsmon Jose, Shi Wei Tan, Yin Yin Ooi, Rajesh Ramasamy and **Sharmili Vidyadaran**. Mesenchymal stem cells exert anti-proliferative effect on lipopolysaccharide-

- stimulated BV2 microglia by reducing tumour necrosis factor-alpha levels. (2014) *Journal of Neuroinflammation*. **11**:149. ISSN 1742-2094. *Impact factor: 4.9*
22. Haw Tatt Randy, Tong Kong Chih, Yew Andrew, Lee Chung Han, Phillips B James, **Vidyadaran Sharmili**. A three-dimensional collagen construct to model lipopolysaccharide-induced activation of BV2 microglia. (2014) *Journal of Neuroinflammation*. **11**:134. ISSN 1742-2094. *Impact factor: 4.9*
  23. Ling King-Hwa, Hewitt A Chelsea, Tan Kai-Leng, Cheah Pike-See, **Vidyadaran Sharmili**, Lai Mei-I, Lee Han-Chung, Simpson Ken, Hyde Lavinia, Pritchard A Melanie, Smyth K Gordon, Thomas Tim, Scott S Hamish. Functional transcriptome analysis of the postnatal brain of the Ts1Cje mouse model for Down syndrome reveals global disruption of interferon-related molecular networks. (2014) *BMC Genomics*. **15**:624-642. *Impact factor: 4.40*
  24. Hajjar T, Goh YM, Rajion MA, **Vidyadaran S**, Li TA, Ebrahimi M. Alterations in neuronal morphology and synaptophysin expression in the rat brain as a result of changes in dietary n-6: n-3 fatty acid ratios. *Lipids Health Dis*. (2013) **12**:113-121. *Impact factor: 2.073*
  25. Yin Yin Ooi, Zul'atfi Rahmat, Shinsmon Jose, Rajesh Ramasamy and **Sharmili Vidyadaran**. Immunophenotype and differentiation capacity of bone marrow-derived mesenchymal stem cells from CBA/Ca, ICR and Balb/c mice. (2013). *World J Stem Cells*. **5**(1): 34-42. *PubMed cited*.
  26. Vellasamy S, Sandrasaigaran P, **Vidyadaran S**, Abdullah M, George E, Ramasamy R. Mesenchymal stem cells of human placenta and umbilical cord suppress T-cell proliferation at G0 phase of cell cycle. (2012) *Cell Biology International*. **37**(3):250-6. *Impact factor: 1.48*
  27. Zul'atfi Rahmat, Shinsmon Jose, Rajesh Ramasamy and **Sharmili Vidyadaran**. Reciprocal interactions of bone marrow-derived mesenchymal stem cells and BV2 microglia after LPS stimulation. (2013) *Stem Cell Research and Therapy*. **4**(1):12. *Impact factor: 4.2*
  28. T Hajjar, YM Goh, MA Rajion, **S Vidyadaran**, F Othman, AS Farjam, AL Tan and M Ebrahimi. Omega 3 polyunsaturated fatty acid improves spatial learning and hippocampal Peroxisome Proliferator Activated Receptors (PPARalpha and PPARgamma) gene expression in rats. (2012) *BMC Neuroscience*. **13**: 109. *Impact factor: 3.04*
  29. Vellasamy S, Sandrasaigaran P, **Vidyadaran S**, George E, Ramasamy R. Isolation and characterisation of mesenchymal stem cells derived from human placenta tissue. *World Journal of Stem Cells*. (2012) **4**(2):1-7. *Peer-reviewed*
  30. Shalini V, Pratheep S, Muhammad AMH, **Sharmili V**, Elizabeth G, Rajesh R. Generation and Characterisation of Human Mesenchymal Stem Cells Derived from Umbilical Cord and Placenta. *Regenerative Research* (2012)**1**(1): 48-56. *Peer-reviewed*

31. Lee KH, Chow YL, **Sharmili V**, Abas F, Alitheen NB, Shaari K, Israf DA, Lajis NH, Syahida A. BDMC33, A Curcumin Derivative Suppresses Inflammatory Responses in Macrophage-Like Cellular System: Role of Inhibition in NF- $\kappa$ B and MAPK Signaling Pathways. *Int J Mol Sci.* (2012) **13**(3):2985-3008. *Impact factor: 2.279*
32. Chow YL, Lee KH, **Vidyadaran S**, Lajis NH, Akhtar MN, Israf DA, Syahida A. Cardamonin from *Alpinia rafflesiana* inhibits inflammatory responses in IFN- $\gamma$ /LPS stimulated BV2 microglia via NF- $\kappa$ B signalling pathway. (2012) *Int Immunopharmacol.* **12** (4):657-665. *Impact factor: 2.376*
33. Abdullah M, Chai PS, Chong MY, Tohit ER, Ramasamy R, Pei CP, **Vidyadaran S**. Gender effect on in vitro lymphocyte subset levels of healthy individuals. (2012) *Cellular Immunology.* **272**(2):214-9. *Impact factor: 2.58*
34. Alireza Badieli, Seow Heng Fong, Rajesh Ramasamy, **Sharmili Vidyadaran**. *In vitro* effects of lipopolysaccharide and active fragment of beta amyloid on the morphology and ultrastructure of microglia. (2011) *Journal of Advanced Biomedical & Pathobiology Research.* **1**: 8-14.
35. Maqbool M, **Vidyadaran S**, George E, Ramasamy R. Optimisation of laboratory procedures for isolating human peripheral blood derived neutrophils. (2011) *Med J Malaysia.* **66**(4):296-9. *PubMed cited*
36. Shi Wei Tan, Rajesh Ramasamy, Maha Abdullah and **Sharmili Vidyadaran**. Inhibitory effects of palm  $\alpha$ -,  $\gamma$ - and  $\delta$ -tocotrienol on lipopolysaccharide-induced nitric oxide production in BV2 microglia. (2011) *Cellular Immunology.* **271**(2): 205-9. *Impact factor: 2.58*
37. AL Tan, M Ebrahimi, T Hajjar, **S Vidyadaran**, AQ Sazili, MA Rajion and YM Goh. Effects of long term polyunsaturated fatty acids supplementation on membrane lipid composition and growth characteristics in rats. *Journal of Animal and Veterinary Advances* **10**(19):2575-2581. *Impact factor: 0.39*
38. Maryam Maqbool, **Sharmili Vidyadaran**, Elizabeth George and Rajesh Ramasamy. Human mesenchymal stem cells protect neutrophil from serum deprived cell death. (2011) *Cell Biology International.* **35**(12): 1247-51. *Impact Factor: 1.80*
39. Maha Abdullah, Pei-Shin Chai, Chiew-Yee Loh, Mun-Yee Chong, Huai-Wei Quay, **Sharmili Vidyadaran**, Zainina Seman, Mirnalini Kandiah and Heng-Fong Seow. Carica papaya increases regulatory T cells and reduces IFN- $\gamma$ <sup>+</sup>CD4<sup>+</sup> T cells in healthy human subjects. (2011) *Molecular Nutrition and Food Research.* **55**(5): 803-6. *Impact factor: 4.40*
40. Tong CK, Vellasamy S, Tan BC, Abdullah M, **Vidyadaran S**, Seow HF, Ramasamy R. Generation of Mesenchymal Stem Cell from Human Umbilical Cord Tissue Using Combination of Enzymatic and Mechanical Disassociation Method. (2011) *Cell Biology International.* **35**: 221-226. *Impact factor: 1.80*
41. VH Sarmadi, CK Tong, **S Vidyadaran**, M Abdullah, HF Seow and R Ramasamy. Mesenchymal stem cells inhibit proliferation of lymphoid origin haematopoietic



- tumour cells by inducing cell cycle arrest. (2010) *Medical Journal of Malaysia*. **65** (3): 38-43. *PubMed cited*
42. Yin Yin Ooi, Rajesh Ramasamy, Zul'atfi Rahmat, Hemavathy Subramaiam, Shi Wei Tan, Maha Abdullah, Daud Ahmad Israf, **Sharmili Vidyadaran**. Mesenchymal stem cells suppress microglia proliferation and modulate nitric oxide production. (2010) *International Immunopharmacology*. **10** (12): 1532-1540. *Impact factor: 2.214*
  43. Hemavathy Subramaiam, Alireza Badiei, Rajesh Ramasamy, Maha Abdullah and **Sharmili Vidyadaran**. Establishing a culture system that supports in vitro expansion of adult microglia. (2010) *Malaysian Journal of Medicine and Health Sciences*. **6** (2): 25-30. *SCOPUS cited*
  44. R Ramasamy, K Krishna, M Maqbool, S Vellasamy, VH Sarmadi, M Abdullah and **S Vidyadaran**. The effect of mesenchymal stem cell on neutrophil oxidative burst. (2010). *Malaysian Journal of Medicine and Health Sciences*. **6** (2):11-17. *SCOPUS cited*
  45. A Maha, L Rampal, MZ Azhar, MS Sherina, **V Sharmili**, A Abdah, R Rajesh, S Zamberi, YY Loong, A Hamidin, AR Firdaus, AAA Fazli, PH Lim, KO Noorjan and PB Kho. Attitude towards sex: study of secondary school children in Selangor state. *Malaysian Journal of Medicine and Health Sciences*. **6** (1): 33-63. *SCOPUS cited*
  46. **Sharmili Vidyadaran**, Yin Yin Ooi, Hemavathy Subramaiam, Alireza Badiei, Maha Abdullah, Rajesh Ramasamy, Heng Fong Seow. Effects of macrophage colony-stimulating factor on microglial responses to lipopolysaccharide and beta amyloid. (2009) *Cellular Immunology*. **259**(1): 105-10. *Impact factor: 2.698*
  47. Rajesh Ramasamy, Francesco Dazzi, Chih Kong Tong, **Sharmili Vidyadaran**, Heng Fong Seow. The immunosuppressive effect of human bone marrow-derived mesenchymal stem cell targets T cell proliferation but not its effector functions. (2008) *Cellular Immunology*. **251** (2): 131-6. *Impact factor: 1.80*
  48. **Sharmili Vidyadaran**, Maha Abdullah, Lekhraj Rampal, Eusni Rahayu Mohd Tohit, Mirnalini Kandiah, Khor Geok Lin, Norhafizah Mohtaruddin, Joyce Leong Whye Sook, Choo Beng Huat, Rajesh Ramasamy, Mohan Arumugam, Chan Yoke Mun, Abdulmumin Saad. Execution and challenges of using focus group discussions as a research tool in secondary school students. (2008) *Malaysian Journal of Medicine and Health Science*. **5** (1): 39-48. *SCOPUS Cited*
  49. Chih Kong Tong, Sarmadi Vahid Hossien Pour, **Vidyadaran Sharmili**, Saiful Yazan Latifah, Heng Fong Seow & Ramasamy Rajesh. Human Bone Marrow-derived Mesenchymal Stem Cells Suppress T Cell Proliferation by Inducing Cell Cycle Arrest. (2007) *Malaysian Journal of Medicine and Health Sciences*. **4** (1): 41-50. *SCOPUS cited*
  50. Akbar MT, Lundberg AMC, Liu K, **Vidyadaran S**, Wells KE, Dolatshad H, Wynn S, Wells DJ, Latchman DS and Bellerocche J. The neuroprotective effects of heat shock protein 27 overexpression in transgenic animals against kainate-induced seizures and hippocampal cell death. (2003) *J Biol Chem*. **278** (22): 19956-65. *Impact factor: 7.385*  
*Page rank = 1*

1. Z Rahmat, YY Ooi, R Ramasamy and **S Vidyadaran**. Mesenchymal stem cells-microglia interactions in response to lipopolysaccharide. (2010). *The Medical Journal of Malaysia*. 65(Supp B): 9.
2. T Hajjar, YM Goh, **S Vidyadaran**, O Fauziah, MA Rajion and M Ebrahimi. The effect of n-3 Long Chain Polyunsaturated Fatty Acids (LC-PUFA) on Cognitive Function Development in Rats. (2009). *Proc. of the International Conference on Animal Health and Human Safety*. 201-204.
3. Ooi Yin Yin, Rajesh Ramasamy and **Sharmili Vidyadaran**. Mouse bone marrow mesenchymal stem cells acquire CD45-CD106+ immunophenotype only at later passages. 2<sup>nd</sup> Malaysian Tissue Engineering and Regenerative Medicine Scientific Meeting. (2008) *The Medical Journal of Malaysia*. 63(Supp A): 65.
4. Au Lee Fong, Rusnah Mustaffa, **Sharmili Vidyadaran**, Abdah Md Akim, Mohd Azam Khan Goriman Khan, Saidi Moin, Mariana Nor Shamsudin, Gabriele Anisah Froemming, Abdul Karim Ishak, Asmah Rahmat and Fauziah Othman. Cytotoxicity and scanning electron microscopy study of gentamycin-coated HA effect on biofilm. 2<sup>nd</sup> Malaysian Tissue Engineering and Regenerative Medicine Scientific Meeting. (2008) *The Medical Journal of Malaysia*. 63(Supp A): 16.
5. **Sharmili Vidyadaran**, Mirnalini Kandiah, Lekhraj Rampal, Maha Abdullah, Eusni Rahayu. Behaviour Intervention Programme for Cardiovascular Diseases amongst Secondary School Students: Study Design. *Malaysian Journal of Public Health Medicine* (2007) Volume 7 (Supp. 2) pg. 31.
6. Lim CS, Vidyadaran MK, Zulkifli I, **Vidyadaran S**, Sharma RSK, Ho OK and Suleka M. Cellular changes in the hippocampus of deer velvet-treated rats following exposure to chronic stress. (1999) *Proc. of the 8<sup>th</sup> Electron Microscopic Conference*.

#### Proceedings (Abstract)

1. S Jose and **S Vidyadaran**. Mesenchymal stem cells require to be in close vicinity with microglia to arrest cell cycle. (2014) XI European Meeting on Glial Cells in Health and Disease, Berlin. Published in *Glia* 6: S184.
2. T. Hajjar, Y. M. Goh, **S. Vidyadaran**, O. Fauziah, M. A. Rajion & M. Ebrahim. Effect of Fish Oil Supplemented Diets on Fatty Acid Content of Brain in Rats. (2011) *2nd Malaysian Anatomical Conference, Malaysia*.
3. Tan Shi Wei, Maha Abdullah and **Sharmili Vidyadaran**. Tocotrienol action on microglia responses. (2011) *Palm International Nutra-Cosmoceutical Conference, Malaysia*.
4. T. Hajjar, Y. M. Goh, **S. Vidyadaran**, O. Fauziah, M. A. Rajion & M. Ebrahim. Dietary n-3 and n-6 Long Chain Polyunsaturated Fatty Acids Supplementation (Lc-Pufa) on PPAR $\alpha$  Gene Expression and Cognitive Function Development in Rats. (2010) *22nd Veterinary Association Malaysia & 4th Wildlife Society of Zoo and Wildlife Medicine, Malaysia*.
5. Hemavathy Subramaiani, Rajesh Ramasamy and **Sharmili Vidyadaran**. Effects of age on microglia responses to cellular stress. (2010). *International Anatomical Sciences and Cell Biology Conference, Singapore*.

6. Shi Wei Tan, Maha Abdullah and **Sharmili Vidyadaran**. Inhibition of nitric oxide production and proliferative activities of microglia treated with tocotrienols. (2010). *International Anatomical Sciences and Cell Biology Conference, Singapore*.
7. Yin Yin Ooi, Rajesh Ramasamy and **Sharmili Vidyadaran**. Immunoregulatory function of mesenchymal stem cells on microglia responses. (2010). *International Anatomical Sciences and Cell Biology Conference, Singapore*.
8. Zul'atfi Rahmat, Rajesh Ramasamy and **Sharmili Vidyadaran**. Co-culturing mesenchymal stem cells and microglia: effects on MSC. (2010). *International Anatomical Sciences and Cell Biology Conference, Singapore*.
9. Hemavathy Subramaiam, Rajesh Ramasamy and **Sharmili Vidyadaran**. Does age effect microglia responses to cellular stress? (2010) *Pameran Reka Cipta, Penyelidikan dan Inovasi (PRPI), Universiti Putra Malaysia*.
10. Azzeme H, James JRM, Lim SM, Kalavathy R, Sharmili V, Abdul Majeed AB. Inhibitory effects of endophytic fungal extracts on BACE1 and neuroinflammation. *International Conference and Exhibition of Pharmaceutical, Nutraceutical and Cosmoceutical Technology, Malaysia. 2010*
11. Azzeme H, James JRM, Lim SM, Kalavathy R, Sharmili V, Abdul Majeed AB. BACE1 inhibitory and anti-inflammatory activity of Malaysian endophytic extracts. *13<sup>th</sup> Asia-Pacific Regional Conference of Alzheimer's Disease International, Malaysia (2010)*
12. T. Hajjar, Y. M. Goh, **S. Vidyadaran**, O. Fauziah, M. A. Rajion & M. Ebrahim. The Effect of n-3 Long Chain Polyunsaturated Fatty Acids (LC- PUFA) on Cognitive Function Development in Rats. (2009) *2nd International Conference on Animal Health and Human Safety, Malaysia*.
13. **Sharmili Vidyadaran**, Rajesh Ramasamy and Yin Yin Ooi. Immunoregulatory properties of mesenchymal stem cells on microglial responses. (2009) *Neuroscience 2009, Society for Neuroscience, Chicago USA*.
14. Ooi Yin Yin, Zul'atfi Rahmat, Rajesh Ramasamy and **Sharmili Vidyadaran**. Mouse mesenchymal stem cells inhibit microglia proliferative responses: implications for treatment of neurodegenerative diseases. (2009) *Pameran Reka Cipta, Penyelidikan dan Inovasi (PRPI), Universiti Putra Malaysia*.
15. Rajesh Ramasamy, Maryam Maqbool, Kalidasan Krishna, Vahid Hosseinpour Sarmadi and **Sharmili Vidyadaran**. The effect of human mesenchymal stem cells on neutrophil mediated immune responses. (2009) *Pameran Reka Cipta, Penyelidikan dan Inovasi (PRPI), Universiti Putra Malaysia*.
16. Alireza Badiiei and **Sharmili Vidyadaran**. Establishing adult rat microglia cell cultures for the study of immunosenescence. *Buku Abstrak Pameran Reka Cipta, Penyelidikan dan Inovasi*. (2007).
17. Alireza Badiiei and **Sharmili Vidyadaran**. Establishing adult rat microglia cell cultures for the study of immunosenescence. *Buku Abstrak Malaysian Technology Expo*. (2008).

18. Au Lee Fong, Fauziah Othman, Asmah Rahmat, Rusnah Mustaffa, Idris Besar, **Sharmili Vidyadaran**, Abdah Md Akim, Mohd Azam Goriman Khan, Saidi Moin, Mariana Nor Shamsudin, Gabriele Anisah Froemming, Abdul Karim Ishak and Fuzina Nor Hussein. Cytotoxicity effect of gentamycin-coated hydroxyapatite on biofilm formation under scanning electron microscopy. *Scientific Conference of Electron Microscopy Society of Malaysia*.
19. Alireza Badiei, Yip Wai Kien, Ooi Yin Yin, Ho Oi Kuan, Rajesh Ramasamy, **Sharmili Vidyadaran**. Evaluation of morphological changes in microglia activated with LPS and A $\beta$ <sub>25-35</sub>. *6<sup>th</sup> ASEAN Microscopy Conference (2007)*. pg 50-51.
20. **Vidyadaran S**, Akbar MT and de Bellerocche J. 3-NP as a model of Huntington's disease. (2006). *18th Annual Scientific Meeting of the Malaysian Society of Neurosciences*.
21. **Vidyadaran S**, Akbar MT and de Bellerocche J. c-jun and ATF-3 mRNA expression in HSP27-overexpressing mice following kainic-acid induced seizures. (2006). *6<sup>th</sup> National Health Symposium on Health Sciences*.
22. **Vidyadaran S**, Akbar MT and de Bellerocche J. The neuroprotective properties of HSP27 *in vivo* in two models of neurotoxicity. (2006). *International Conference: Exploring New Frontiers in Medicine and Health*.
23. **Vidyadaran S**. *In situ* hybridization as a tool to detect changes in gene expression. (2005) *Proc. of the 14<sup>th</sup> Scientific Conference of Electron Microscopy Society of Malaysia*.
24. **Vidyadaran S**, Akbar, MT and Bellerocche J. The neuroprotective properties of HSP27 in the CNS. (2005) *British Neurosci. Assoc. Abstracts*, vol. 18, P10.03, 2005.
25. Vidyadaran MK, Chua CG, Chong KL, Ho, OK and **Vidyadaran S**. Modified toluidine blue technique for routine epoxy semi-thin sections. (2001) *Proc. of Advances in Application of Electron Microscopy for Biological Material and Medical Sciences*.

#### Oral Presentations

1. Palm International Nutra-Cosmeceutical Conference (PINC) 2017. Putrajaya. Tocotrienols and their effects on microglia: implications for brain inflammatory conditions
2. Invited speaker, Tissue Engineering and Regenerative Medicine Society of Malaysia (TESMA) Seminar Series. November 2016. Mesenchymal stem cells as modulators of neuroinflammation.
3. 14th Annual Meeting of Asian-Pacific Society for Neurochemistry 2016. Kuala Lumpur. Microglia immunomodulation and its implications.
4. Annual Neuroscience Seminar, Universiti Putra Malaysia March, 2016. CNS debutants: recent discoveries that redefine microglia.
5. Invited Speaker, International Anatomy and Cell Biology Conference 2012. Chiang Mai Thailand. Guarding the sentinels of the brain.
6. Invited Speaker, Singapore Neuroscience Association Symposium 2012. National University Singapore. An immunomodulatory role for mesenchymal stem cells in

neurodegeneration.

7. Invited Speaker, Neuroscience Symposium 2011. Monash University Sunway. An immunomodulatory role for mesenchymal stem cells in the central nervous system.
8. Invited Speaker, Neuroscience Seminar 2010. Faculty of Medicine and Health Sciences, Universiti Putra Malaysia. Modulatory effects of mesenchymal stem cells on microglial inflammatory responses.
9. Invited Speaker, Neurobiology course, Universiti Malaya.
10. Invited Speaker, Malaysian Society of Pharmacology and Physiology Meeting, 2010. Immunomodulatory effects of mesenchymal stem cells on microglia.
11. 9<sup>th</sup> World Congress International Association for Adolescent Health, 2009. Outcome of Focus Group Discussions to Design a Cardiovascular Disease Intervention Programme for Secondary School Children.
12. Invited Speaker, Singapore Neuroscience Association & Singapore Microscopy Society Joint Meeting, 2008. The role of microglia in neuroimmunity.
13. 18th Annual Scientific Meeting of the Malaysian Society of Neurosciences, 2006. 3-NP as a model of Huntington's disease.
14. Invited by the Microscopy Society (Singapore) to give a seminar entitled "The Neuroprotective Properties of HSP27" at the Department of Anatomy, National University of Singapore, 2006.
15. 6<sup>th</sup> National Health Symposium on Health Sciences, 2006. c-jun and ATF-3 mRNA expression in HSP27-overexpressing mice following kainic-acid induced seizures.
16. 14<sup>th</sup> Scientific Conference of Electron Microscopy Society of Malaysia, 2005. *In situ* hybridization as a tool to detect changes in gene expression.

#### Research Articles

1. Cheah PS, Tan NJ, **Vidyadaran S**, Nordin N, Baharuddin MN, Lim CL, Seth E, Ling KH. (2016) *Alzheimer's Brain Changes*. In: Nature's Yield and Wonders of Art (NYAWA)16: Brain. University Putra Malaysia, Serdang, Selangor, pp. 32-35. ISBN 9789679604153
2. **Sharmili Vidyadaran**, Alireza Badiei, Yin Yin Ooi, Hemavathy Subramaiam, Shi Wei Tan, Zul'atfi Rahmat, Maha Abdullah, Rajesh Ramasamy and Heng Fong Seow. Understanding microglia: the immune cells of the central nervous system. (2009) *Synthesis*. Issue 25: 12.
3. Sarmadi VH, Tong CK, **Vidyadaran S**, Seow HF and Ramasamy R. The effect of human mesenchymal stem cell on tumour cell proliferation. (2008) *The Bioscientist*.

#### MANUSCRIPTS REVIEWED FOR

1. PLoS ONE
2. Stem Cell Research and Therapy

3. Cell Proliferation
4. Cellular and Molecular Immunology
5. Cellular Immunology
6. Food and Chemical Toxicology
7. Malaysian Journal of Medicine and Health Sciences
8. Medical Journal of Malaysia
9. Experimental Biology and Medicine
10. Malaysian Journal of Nutrition.

#### *EDITORIAL BOARD*

Experimental Biology and Medicine, published by The Royal Society of Medicine Press, USA

#### | POSTGRADUATE SUPERVISION |

*As Main Supervisor*

1. Alireza Badiei (Matric No: GS17529) MSc (Immunobiology) *In vitro responses of rat microglia to lipopolysaccharide and beta amyloid*
2. Ooi Yin Yin (Matric No: GS19145) MSc (Immunobiology) *Immunoregulatory function of mesenchymal stem cells on microglia*
3. Hemavathy a/p Subramaiam (Matric No: 21676) MSc (Immunobiology) *Effects of immunosenescence on microglia function*
4. Tan Shi Wei (Matric No: GS23505) MSc (Immunobiology) *Modulating inflammatory responses of microglia by tocotrienols*
5. Muhammad Zul'atfi Rahmat (Matric No: GS24758) MSc (Immunobiology) *Elucidating mechanisms of immunoregulation by mesenchymal stem cells on microglia*
6. Shinsmon Jose (Matric No:GS27640) PhD (Immunobiology) *Mesenchymal stem cell mediated immunomodulation of microglia*
7. Randy Haw (Matric No: GS 36910) MSc (Neuroscience) *Characterisation of Microglia Cultured In a 3D Collagen Construct: A Novel Approach to Better Mimic Microglia Phenotype In Vitro*
8. Tong Chih Kong (Matric No: GS32670) PhD (Immunobiology) *Reciprocal interactions of microglia and neurones*
9. Tan Shi Wei (Matric No: GS33648) PhD (Immunobiology) *Determining Molecular Mechanisms of Palm Tocotrienols on Microglial Responses for Neuroprotection*

*Ongoing*

1. Siti Sarah Omar Zaki (Matric No: GS46806) PhD (Immunology) *Immunomodulatory mechanisms of mesenchymal stem cells on microglia*

*As Co-supervisor*

1. Noor Aishah Mohammed Izham (Matric No: GS49831) MSc (Human Physiology) *The investigation of the effect of zerumbone on the expression of transient receptor potential cation channel subfamily v member 1 (TRPV1) channels and n-methyl-d-aspartate receptors (NMDA-R) in neuroinflammation lipopolysaccharide(lps)-induced SH-SY5Y cells*
2. Thiban a/l Sandramuti (Matric No: GS42826) MSc (Immunobiology) *Inhibitor of GSK3 in primary microglia for prevention of neuroinflammation.*
3. Keshavardini Sahathevan (Matric No: GS39643) *Invasion of stenotrophomonas maltophilia in murine macrophages and human monocytes*
4. Hui Ling PhD
5. Zahra Abedi (GS35289) MSc (Molecular Medicine) *Modification of NMDA and AMPA receptors by tocotrienols*
6. Syntyche Seow Ling Sing (Matric No: SHC 110104) PhD *In vitro* anti-neuroinflammatory and neuritogenic stimulatory effects of a medicinal mushroom Lignosus rhinocerotis (Cooke) Ryvardeen. Faculty of Science, Universiti Malaya.
7. Elson Lye Kwan Liang (Matric No: GS39062) PhD (Stem Cells) *Spontaneous transformation of murine bone marrow mesenchymal stem cells into sarcomas*
8. Zuhaida Md Zain (Matric No: GS39067) MSc (Immunobiology) *Effects of GSK-3 inhibition on LPS induced neuroinflammation and IL-10 production in microglia*
9. Maryam Maqbool (Matric No: GS31808) PhD (Immunobiology) *Exploring the inhibitory mechanism of mesenchymal stem cells on monocyte activation and differentiation into dendritic cells*
10. Nasim Karimi Hosseini (Matric No: GS29319) MSc (Immunobiology) *Comparative analysis of inflammatory markers by peripheral and brain macrophages inoculated with invasive and colonising strains of group B Streptococcus*
11. Lee Han Chung (GS35408) PhD (Neuroscience) *Molecular characterisation of Jak-Stat signaling pathway in the brain of the Ts1Cje mouse model for Down syndrome*
12. Thilaga Rati Selvaraju (Matric No: GS29626) PhD (Molecular Biology) *Effect of vitamin E in the prevention of glutamate induced injury in nerve cells*
13. Siti Nursaadah binti Hamzah (Matric No: GS36355) MSc (Stem Cells) *Exploring differentiation potential of rat full term amniotic fluid stem cells into functional dopaminergic neurons in vitro: a potential model for Parkinson's Disease*

14. Tan Kai Leng (Matric No: GS30462) PhD (Neuroscience) *The identification of disrupted molecular networks involved in brain maturation and function in the Ts1cje mouse model of Down Syndrome*
15. Pratheep Sandrasaigaran (Matric No: GS27330) PhD (Immunobiology) *Generation and characterization of MSC from human cartilage tissue*
16. Renjan Thomas (Matric No: GS24573) PhD (Medical Microbiology) *Elucidation of Pathogenic Determinants Involved in Infection Stenotrophomonas Maltophilia*
17. Tan Ai Li (Matric No: GS25690) PhD (Physiology) *PUFA-induced body composition changes and insulin resistance in a rat model*
18. Chitra Sathe (Matric No: GS27692) PhD (Molecular Biology) *Identification and characterization of the roles of miRNAs in the neurogenic differentiation of mesenchymal stem cells*
19. Chow Yuh Lit (Matric No: GS24367) MSc (Medical Chemistry) *Effects of phytochemical isolated from Malaysian traditional plant on proinflammatory mediators in microglial cell line*
20. Elizabeth Chai Pei Shin (Matric No: GS19947) MSc (Immunobiology) *In vitro immunomodulatory effects of fruits and herbs on peripheral blood mononuclear cells*
21. Shalini Vellasamy (Matric No: GS21718) PhD (Immunobiology) *Generation and Characterisation of Stem Cell Derived from Human Foetal Tissues: Placenta, Placental Membrane and Umbilical Cord*
22. Fatemeh Khoshkhou PhD (Community Health) *A randomized controlled field trial on behavioural modification intervention amongst adolescents for cardiovascular disease prevention in Zahedan, Iran*
23. Toktam Hajjar (Matric No: GS22038) PhD (Physiology) *The effect of omega-3 LC PUFA on PPAR, c-fos expression and cognitive function development in rats*
24. Yip Wai Kien (Matric No: GS18258) PhD (Cell Biology) *Isolation and characterisation of protein kinase inhibitors from actinomycetes for potential anti-cancer drugs*
25. Ooi Suek Chin (Matric No: GS16517) PhD (Oncology) *Effect of S1 and GM-H-1 (Citrinin) in combination on the induction of cell cycle arrest and apoptosis on HT-29 cells*
26. Homa Davoodi (Matric No: GS17120) PhD (Immunobiology) *TLRs and cancer*
27. Koh Rhun Yian (Matric No: GS16982) PhD (Molecular Biology)
28. Lim Chooi Ling (Matric No: GS16983) PhD (Immunobiology) *Effect of a potential TGF- $\beta$ 1 inhibitor extracted from Actinomycetes on human hepatic stellate cells and liver fibrosis*
29. Maryam Maqbool (Matric No: GS21954) MSc (Immunobiology) *The effects of human mesenchymal stem cells on neutrophil function*
30. Au Lee Fong (Matric No: GS19885) MSc (Medical Biotechnology) *Combating Biofilm: Gentamycin drug delivery system in bone tissue*
31. Jenny Lim Jia Xian (Matric No: 125192) BSc (Biomedical Science) Final Year Project *Investigating the effects of heat shock preconditioning on LPS-treated microglia*



32. Cathy Woolson BSc project, Imperial College London MBBS student. *The neuroprotective properties of HSP27 in the 3-NP model of neurodegeneration.*  
Duration of project: 6 months Place: Department of Cellular and Molecular Neuroscience, Imperial College London

## | MEMBERSHIP |

### *PROFESSIONAL SOCIETIES*

1. Society for Neuroscience (SFN).
2. NeuroMalaysia Society.
3. Malaysian Neuroscience Association.
4. Electron Microscopy Society Malaysia (EMSM).
5. Tissue Engineering and Regenerative Medicine Society (TESMA).
6. Nutrition Society Malaysia.

### *WORKSHOPS ATTENDED*

1. Workshop on Advance Live Cell Imaging. Monash University, Sunway Campus. 11-12<sup>th</sup> September 2007.
2. Facilitator, Flowcytometry: An Update on the Applications in Diagnostics and Research Faculty of Medicine and Health Sciences, UPM. 27-28<sup>th</sup> November.
3. 11<sup>th</sup> International Brain Research Organisation (IBRO) Associate School of Neuroscience. Monash University, Sunway Campus. 3<sup>rd</sup>-7<sup>th</sup> December 2008.
4. Dr Ranjeet Bhagwan Singh Technical Workshop 2005 on New Methods for Monitoring Immunity. Faculty of Medicine, Universiti Malaya. 14-17<sup>th</sup> Dec 2005.
5. Seminar on Cryosample Preparation for Nanobiotechnology. Microscopy Imaging and Nanoscience Unit, IBS Universiti Putra Malaysia. 29<sup>th</sup> November 2005.
6. 2-week placement at Allergy and Immunology Center, Institute for Medical Research (IMR) for overview of specialised immunological diagnostic tests carried out at this national reference center, Institute for Medical Research. 19-30<sup>th</sup> September 2005.
7. Personal licence training for handling of animals for experimental purposes, Imperial College London, 2001.
8. Electron Microscopy workshop, UPM, 2001.

## | AWARDS & ACHIEVEMENTS |

1. Best 10 Researchers Award, Faculty of Medicine and Health Sciences UPM, 2012
2. Best Micrograph, Light and Confocal – Life Sciences Category, 20<sup>th</sup> Scientific Conference of Microscopy Society Malaysia (EMSM).
3. Best Publication Award 2010, Malaysian Society for Neurosciences.
4. Bronze winner, BIOMALAYSIA 2009, Kuala Lumpur Convention Centre. Mesenchymal Stem Cells Mediated Tumour Cell Suppression: A Potential Therapy for Cancer
5. Cemerlang, 2009 Universiti Putra Malaysia.
6. Silver winner, Pameran Reka Cipta, Penyelidikan dan Inovasi 2009, UPM. Yin Yin Ooi, Zul'atfi Rahmat, Rajesh Ramasamy and Sharmili Vidyadaran. Mouse mesenchymal stem cells inhibit microglia proliferative responses.
7. Winner, L'Oreal Malaysia For Women in Science Fellowship 2008. Determining functional inhibition of microglia inflammatory responses by mesenchymal stem cells.
8. Bronze winner, Malaysian Technology Expo (MTE) 2008, PWTC. Alireza Badiei and Sharmili Vidyadaran. Establishing adult microglia cell cultures for the study of immunosenescence.
9. 3<sup>rd</sup> place, Light Microscopy Micrograph Competition, 6<sup>th</sup> ASEAN Microscopy Conference 2007, Pahang. Alireza Badiei and Sharmili Vidyadaran. 'Tornado'; confocal image of microglia cultures stained with lectin and DAPI.
10. Bronze winner, Pameran Reka Cipta, Penyelidikan dan Inovasi 2007, UPM. Alireza Badiei and Sharmili Vidyadaran. Establishing adult rat microglia cell cultures for the study of immunosenescence.
11. Best oral presenter, Malaysian Neuroscience Conference 2006, Penang. 3-NP as a model of Huntington's disease.
12. Ministry of Science, Technology and Innovation (MOSTI) HRD Scholarship Award, 2001 to pursue a PhD in Neuroscience at Imperial College London.
13. Golden Key Scholar. Awarded to BSc students whom achieve 2 consecutive placings on the dean's list.
14. Abbott Laboratories Award. Prize for runner-up of best presenter for final year BSc project, 2001.

*POSTS HELD*

1. Head of Unit, Immunology (2014-2018)
2. Coordinator, Immunology Module, Medical Programme, Faculty of Medicine and Health Sciences, UPM
3. Research Coordinator, Faculty of Medicine and Health Sciences, UPM
4. Secretary, NeuroMalaysia Society, 2008-2012.
5. Committee member, Tissue Engineering Society Malaysia (TESMA), 2009 - 2011.
6. Imperial College Alumni Association Malaysia (Membership No 189).
7. Persatuan Pegawai Akademik UPM.