

Dr.M.Shanthi

Degree : MBBS, MD, PhD, Advance course in Medical Education.,

Designation : Associate Professor

Area of research expertise with projects conducted : Bacteriology

- PhD research project :Characterisation of carbapenemases in gram negative bacteria
- Medical education project: impact of multidisciplinary project based learning among second year MBBS students
- Testing for incidence of Microbes producing ESBLs study involving screening of Gram Negative bacteria causing serious nosocomial / ICU infections for production of ESBLs [TIME study]-Coinvestigator
- Multi-drug resistant Pseudomonas aeruginosa and Acinetobacter baumannii infections among hospitalised patients: risk factors and outcomes
- Co investigator in TEST study- Tigecycline evaluation and surveillance trial conducted by International Health Management Associates,Inc-
- Co investigator in STAR study- Evaluation of the susceptibility of Staphylococcal isolates including methicillin resistant Staphylococcus aureus (MRSA) to teicoplanin isolated from hospitalized patients in high risk areas
- Co investigator in Study for monitoring antimicrobial trends and in vitro susceptibility of Gram negative isolates from intra abdominal infection and Ertapenem trial(SMART study)
- Coinvestigator in MYSTIC study 2007 (Meropenem yearly susceptibility test information collection program)
- Detection of Metallobetalactamases among carbapenem resistant Pseudomonas aeruginosa using MBL E-test strips

Awards and recognitions of faculty:

- Research Ambassador of Sri Ramachandra University since Feb 2017
- Award for publication by the Sri Ramachandra University -6th place in the University for the year 2012
- Director and coordinator for Phase -2 MBBS at SRMC and RI since 2017

Conferences, Seminars, Workshop, training undergone by faculty:

- Workshop on NABH standards @ SRMC and RI
- CME program on Highlights on newer challenges in Laboratory Diagnosis and Control of Infection held at SRM Medical College in February 2006
- SIHAM Mycology workshop held at Nizams Institute of Medical Science in January 2006 at Hyderabad
- Participated in CME and Conference of VIII National conference of hospital infection society of India held at Hyderabad in January 2005.
- CME on Neurocysticercosis by Madras Medical College in November 2005
- Spiral scenario 2004 – CME on Leptospirosis held at Stanley Medical College in October 2004.
- CME on Challenging Frontiers in Infectious Disease Surveillance at PIMS in February 2004
- CME on Clinical Microbiology and Infectious Disease in Global Hospital, Hyderabad in January 2004
- CME on Advances / Prevention and Treatment of HIV / AIDS by SRMC & RI in Jan 2004
- IAMM Tamil Nadu Chapter CME held at Kings institute December 2003
- ISAAR 2007 Singapore
- Sozocon 2011
- Molecular biology –workshop- February 2010
- NABL internal audit workshop –July 2010

Membership in committee :

1. Member, Medical education unit.
2. Member of curriculum committee for MBBS
3. Member, Board of studies for undergraduate MBBS, SRMC &RI
4. Member, Hospital infection control committee

5. Life member in Indian Association of Medical Microbiologist
6. Life member in Academy of Clinical Microbiologist

List of publications

1. Geetha PV, Aishwarya K, **Shanthi M**, Uma Sekar. Plasmid Mediated Fluoroquinolone Resistance Determinants in Clinical Isolates of Escherichia coli. Int.J.Adv.Microbiol.Health.Res., 2019; 3(2):1-6. [original article]
2. Remya P A, **Shanthi M**, Sekar U. Characterisation of virulence genes associated with pathogenicity in Klebsiella pneumoniae. Indian J Med Microbiol 2019;37:210-8 [original article]
3. Remya P, **Shanthi M**, Sekar U. Prevalence of *bla*_{KPC} and its occurrence with other beta-lactamases in *Klebsiella pneumoniae*. J Lab Physicians 2018;10:387-91. [original article]
4. Remya P, **Shanthi M**, Sekar U. Occurrence and characterization of hyperviscous K1 and K2 serotype in Klebsiella pneumoniae. J Lab Physicians 2018;10:283-8. DOI: 10.4103/JLP.JLP4818 [original article]
5. Remya. PA, **Shanthi. M**, Uma Sekar Phenotypic and genotypic characterisation of extended Spectrum beta-lactamases (ESBLs) and amp C beta- lactamases among Klebsiella pneumoniae. Int J Pharma Bio Sci 2018 January; 9(1): (B) 341 – 347 [original article]
6. **M.Shanthi**, Uma Sekar, Arunagiri.K. Carbapenemase producing Enterobacteriaceae: Risk factors for infection and impact of resistance on outcomes. International Journal of Applied and Basic Medical Research .2017; 7(1) :32-39[original article]
7. Aishwarya Ramachandran, **Mariappan Shanthi**, Uma Sekar. Detection of blaCTX-M Extended Spectrum Betalactamase Producing Salmonella enterica Serotype Typhi in a Tertiary Care Centre . Journal of clinical and diagnostic research. 2017; 11(9): DC21-DC24 [original article]
8. Santhi Gunasekaran, Ananya Tupaki-Sreepurna, Vijayakishore Thanneru, Uma Sekar, **Mariappan Shanthi**, Anupma Jyoti Kindo. A Rare Case of Curvularia Hawaiiensis in the Ear Following Trauma . Journal of Medical Sciences and Clinical research . Volume 05 Issue 09 September 2017 [Case report]
9. **M.Shanthi**, Uma Sekar ,K Arunagiri, B,Sekar . Occurrence of New Delhi Metallobetalactamase mediated carbapenem resistance among Acinetobacter species in intensive care units . International Journal of Recent Trends in Science And Technology,. 2016;21(2) Volume 21: 114-118 [original article]
10. Ramya Rengaraj , **Shanthi Mariappan** , Uma Sekar , Arunagiri Kamalanadhan. Detection of Vancomycin Resistance among Enterococcus faecalis and Staphylococcus aureus.

Journal of Clinical and Diagnostic Research. 2016 , Vol-10(2): DC04-DC06 [original article]

11. Mariappan Shanthi, Uma Sekar et al . Disseminated Cryptococcosis presenting as community acquired pneumonia in a patient with acquired immunodeficiency syndrome. International Journal of Biomedical Research 2016; &(3): 150-152 [Case report]
12. Uma Sekar, **M.Shanthi**. Recent insights into the genetic diversity ,epidemiology and clinical relevance of Blastocystis species. The journal of Medical research 2015;1(1):33-39. [review article]
13. Premamalini T, **M.Shanthi** et al. Disseminated *Mycobacterium fortuitum* infection associated with venous access device. IJSS case reports and reviews. 2015;1(11): 66-69 [original article]
14. Padmalakshmi Y., **Shanthi M.**, Uma Sekar, Arunagiri K., Pugazhenthien. Phenotypic and Molecular Characterisation of Carbapenemases in Acinetobacter Species in a Tertiary Care Centre in Tamil Nadu, India. National Journal of Laboratory Medicine. 2015 Jul, Vol 4(3): 55-60. [original article]
15. Abiramasundari VK, Uma Sekar , **Shanthi. M** et al . Detection of carbapenemase production in *Klebsiella pneumoniae* in a tertiary care centre . Int J Pharm Bio Sci 2015 July; 6(3): (B) 847 – 856 [original article]
16. **M.Shanthi**, Uma Sekar ,K Arunagiri, B,Sekar. Detection of NDM-1 carbapenemase in Pseudomonas aeruginosa in a single centre in southern India. India Journal of Medical research 2014;140:546-550. [original article]
17. Diji Sara Varugese, Uma Sekar, **Shanthi. M et al** . Concurrent occurrence of Amp C and Cefotaxime (CTX)-M in clinical isolates of Enterobacteriaceae. Journal of The Academy of Clinical Microbiologists . 2014; 16(1): 11-16[original article]
18. Uma Sekar, **Shanthi. M**. Blastocystis hominis- consensus of treatment and controversies. Tropical parasitology, 2013;3(1): 35-39 [review article]
19. **M.Shanthi**, Uma Sekar ,K Arunagiri, HG. Brahmne. OXA -181 betalactamase is not a major mediator of carbapenem resistance in Enterobacteriaceae. Journal of clinical and diagnostic research. 2013; 7(9): 1986-88 [original article]
20. **M.Shanthi**, Uma Sekar ,K Arunagiri, B,Sekar. Clonal diversity of New Delhi metallo-beta-lactamase -1 producing Enterobacteriaceae in a tertiary care centre. Indian Journal of Medical Microbiology. 2013; 31(3): 242-249 [original article]
21. **M.Shanthi**, Uma Sekar .Unusual presentation of *Streptococcus pneumoniae* in Human immunodeficiency virus infection – A case report- Journal of association of physicians of India . 2013;61:47-48

22. **M.Shanthi**, Uma Sekar ,K Arunagiri, B,Sekar. Bla_{VIM} and bla_{IMP} mediated carbapenem resistance in *Pseudomonas* species and *Acinetobacter* species in a tertiary care hospital in India- Journal of infections in developing countries 2012;6(11):757-762[original article]
23. **M.Shanthi**, Uma Sekar ,K Arunagiri, B,Sekar .Detection of Amp C genes encoding for beta-lactamases in *Escherichia coli* and *Klebsiella pneumonia*. Indian Journal of Medical Microbiology 2012;30(3):290-295[original article]
24. **M.Shanthi**, Uma Sekar, K.S. Sridharan. Septic arthritis of hip caused by *Salmonella typhi*: A case report. Case reports in Infectious diseases 2012; ID 464527.
25. **M.Shanthi**, Uma Sekar ,K Arunagiri, B,Sekar New Delhi metallo betalactamase producing *Acinetobacter baumannii* : A report from a tertiary care center. Clinical Microbiology and Infection 2012; 18(s3): 475
26. Uma Sekar, **M.Shanthi**, K Arunagiri, B,Sekar The increasing prevalence of New Delhi metallo betalactamase producing Enterobacteriaceae: the challenge. Clinical Microbiology and Infection 2012; 18(s3): 475
27. **M.Shanthi**, Uma Sekar, K.Arunagiri, B.Sekar. OXA beta lactamase mediated carbapenam resistance in *Acinetobacter baumannii* . Indian Journal of Medical Microbiology2011;29(3):269-74 [original article]
28. **M.Shanthi**, Uma Sekar .Invitro Activity of Tigecycline Against Gram Positive and Gram Negative Isolates in a Tertiary Care Hospital. Journal of clinical and diagnostic research. 2011 .5(8): 1559-63. [original article]
29. **M.Shanthi**, Uma Sekar .Minimal inhibitor concentration of eight antimicrobial agents against hospital isolates of Gram negative bacteria in a tertiary care center. Journal of Academy of clinical Microbiologist; June 2011;13(1):4-14. [original article]
30. **M.Shanthi**, Uma Sekar. Extended spectrum beta lactamase producing *Escherichia coli* and *Klebsiella pneumoniae*: risk factors for infection and impact of resistance on outcomes. Supplement to Journal of Association of physicians of India Dec 2010;58:41-44.[original article]
31. **M.Shanthi**, Uma Sekar. Multidrug resistant *Pseudomonas aeruginosa* and *Acinetobacter baumannii* infections among hospitalized patients: risk factors and outcomes. Journal of Association of physicians of India. Sept 2009;57:636-640.[original article]
32. **M.Shanthi**, Uma Sekar . Antimicrobial susceptibility pattern of methicillin resistant *Staphylococcus aureus* at Sri Ramachandra Medical Centre. Sri Ramachandra Journal of Medicine June 2009; vol II(2):1-4 [original article]
33. Uma Sekar, **M.Shanthi**. The expanding family of beta lactamases. The Journal of the academy of clinical Microbiologists 2009;11(2): 72-86 [review article]