SYLLABUS :-

Unit 1 :- Definition of Partition of a Positive integers - Graphical representation. ν-Series and Theta-functions : Ramanujan's general theta-functions and Special Cases - Entries 18, 21, 23, 24, 25, 27, 29, 30 and 31 of Ramanujan's Second note book.

10 Hrs

Unit 2 :- A Theorem of Jacobi - theorem 353 & 354 :- application of 353. Bilateral Series - Ramanujan Theta-function - identities involving Lambert series $1 0(:) q q^{\infty}$.

Rank and crank of partitions and restricted partitions.

10 Hrs.

Unit 3 :- Jackson - Transformation formula - che - - Vandermonde Summation formula - Pfaff transfor- - mation formula - Euler's transformation formula. Modular relation related to Hypergeometric Series and its Applications.

10 Hrs.

Books for Reference :-

1. T.M. Apostal : Introduction to Analytical numbe Oxford university press, 2020.

2. G.E. Andrews : The theory of Partitions, Cambridge University Press, 1984

3. B.C. Berndt : Ramanujan's Note books, Part-III, Springer-Verlag, New York, 1991

4) B.C Berndt : Ramanujan's Note books, Part-IV, Springer-Verlag, New York, 1994.

5) B.C. Berndt : Ramanujan's Note books, Part V, Springer-Verlag, New York, 1998.

6) George Gasper and Mizan Rahaman : Hyper-geometric Series, Cambridge University Press, 1990.

ದಿನಾಂಕ: 14/06/2021 ರಂದು ಕಾಲೇಜಿನ ಗಣಿತಶಾಸ್ತ್ರ ಸ್ನಾತಕೋತ್ತರ ವಿದ್ಯಾರ್ಥಿಗಳ ಶೈಕ್ಷಣಿಕ ಗುಣಮಟ್ಟವನ್ನು ಹೆಚ್ಚಿಸುವ ನೆಲುವಾಗಿ ಪ್ರಾಂಶುಪಾಲರು ಹಾಗೂ ಗಣಿತಶಾಸ್ತ್ರ ಸಂಯೋಜಕರು ಸಮ್ಮುಖ-ದಲ್ಲಿ "ಸ್ಪೆಷಲ್ ಫಂಕ್ಷನ್" ಎಂಬ ಸರ್ಟಿಫಿಕೇಟ್ ಕೋರ್ಸ್ ಹೊಸದಾಗಿ 2020-2021 ನೇ ಸಾಲಿನ ಶೈಕ್ಷಣಿಕ ವರ್ಷದಲ್ಲಿ ಪ್ರಾರಂಭ ಮಾಡಲು ಸಭೆಯನ್ನು ಕರೆಯಲಾಗಿತ್ತು.

Sub: Composition of Board of Studies in Department of Mathematics for the certificate Course in "Special Function" During the year 2020-2021.

Pursuant to the approval of the honourable Principa P.E.S College of Science, Arts and Commerce, the board of Studies in P.G. (M.Sc) has been Constituted as Under:

		Signature.
1. Dr. Manjunatha. M HOD and Co-Ordinator	chairperson	
2. Smt. Nischitha. M Assistant Professor.	Member	Nischitha.M
3. Sri. Mahesh. S.A Assistant Professor.	Member	
4. Smt. Shruthi. Y.P. Assistant Professor.	Member	Shruthi.Y.P.

5. Mr. Nithin. J.V. Assistant Professor.	Member	
6. Mr. Kiran Kumar. M Assistant Professor.	Member	

* The term of the nominated members shall be upto the completion of the course.
* The Principal of the college shall schedule for meeting of the board of studies.
* The members are requested to kindly accept the nomination and give your valuable suggestion (or) guidance in framing the Syllabus of the course.

Principal

Copy to:

1. NAAC Co-ordinator, P.E.S college of Science, Arts and Commerce, Mandya.
2. All the above BOS members.
3. office file.