



**Shri Vaishnav Vidyapeeth Vishwavidyalaya, Indore**  
**Department of Mathematics (GE for UG Students)**

SUBJECT CODE	Category	SUBJECT NAME	TEACHING & EVALUATION SCHEME								
			THEORY			PRACTICAL		Th	T	P	CREDITS
			END SEM	MST	Q/A	END SEM	Q/A				
MAUGGE04	GE	<b>Descriptive Statistics</b>	60	20	20	0	0	3	0	0	3

### Course Objective

To introduce the students with the Fundamentals of the Correlation and Regression.

### Course Outcomes

After the successful completion of this course students will be able to:

1. understand the correlation and regression between two data sets
2. apply the concept of correlation and regression in real life problems
3. analyse the data sets for possible similarities
4. construct the line of best fit for a data
5. criticize the data based on correlations and regression.

### Course Content:

#### UNIT – I

Correlation: Meaning of correlation, scatter plot, Karl Pearson coefficient of correlation and related examples.

#### UNIT – II


Rank Correlation: Spearman rank correlation coefficient, Tied ranks (repeated ranks) and untied ranks (non-repeated ranks) and related examples.

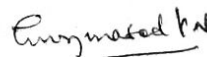
#### UNIT – III


Linear regression, regression coefficient, lines of regression and related examples.

#### UNIT – IV

Method of least square for fitting of a straight line.

  
**Chairperson**  
Board of Studies  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore

  
**Chairperson**  
Faculty of Studies  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore

  
**Controller of Examination**  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore

  
**Joint Registrar**  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore



**Shri Vaishnav Vidyapeeth Vishwavidyalaya, Indore**  
**Department of Mathematics (GE for UG Students)**


SUBJECT CODE	Category	SUBJECT NAME	TEACHING & EVALUATION SCHEME								
			THEORY			PRACTICAL		Th	T	P	CREDITS
			END SEM	MST	Q/A	END SEM	Q/A				
MAUGGE04	GE	<b>Descriptive Statistics</b>	60	20	20	0	0	3	0	0	3

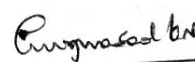
**UNIT – V**

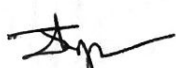
Curvilinear regression: parabola and exponential curve.

**References:**

1. Fundamentals of mathematical statistics, S.C. Gupta and V.K.Kapoor, sultan chand & sons.
2. Fundamental of statistics, Goon, Gupta and Dasgupta.
3. Statistical Methods: An Introductory Text, J. Medhi.

  
**Chairperson**  
Board of Studies  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore

  
**Chairperson**  
Faculty of Studies  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore

  
**Controller of Examination**  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore

  
**Joint Registrar**  
Shri Vaishnav Vidyapeeth  
Vishwavidyalaya, Indore