C. U. SHAH UNIVERSITY, WADHWAN CITY.

Faculty of: **Sciences and Life Sciences**
Course: **Bachelor of Science (Physics)**
Semester**: II**
Subject Code**:VAC202-1C**
Subject Name:**Vedic Mathematics**

Sr. No	Category	Subject Code	Subject Name	Teaching hours/ Week			Credit hours	Credit Points	Evaluation Scheme/ Semester								
									Theory				Tutorial / Practical				Total
									Continuous and Comprehensive Evaluation		End Semester Exams		Internal Assessment		End Semester Exams		
				Th	Tu	Pr			Marks		Marks	Duration	Marks	Duration	Marks	Duration	
7	VAC	VAC202-1C	Vedic Mathematics	2	-	0	2	2	10 10 05	Assignment Quiz Attendance	25	1	-	-	-	-	50

AIM

- To enable the learners to explore the power of Vedic Mathematics.
- To make learners strong in Numerical Mathematics.
- To enable learners to recognize and understand simple techniques of Arithmetic Calculations.
- To train learners to use the ideas of Vedic Mathematics in daily calculations and make those calculations with accuracy and speed.

COURSE CONTENTS

Course Outline for Theory

UNIT	COURSE CONTENT	TEACHING HOURS
I	History and Evolution of Vedic Mathematics, Introduction of Basic Vedic Mathematics Techniques in Multiplication (Special Case, Series of 9, Series of 1 etc.), Tables etc. Various techniques to carry out basic operations covering addition, subtraction, multiplication, division	**10**
II	Multiplications by numbers near base, Verifying answers by use of digital roots, Divisibility tests, Division of numbers near base, Cubes, Cube roots, square roots, General division	**10**
III	Quadratic Equations, Simultaneous Equations, Use of various Vedic Techniques for answering numerical aptitude questions from Competitive Examinations	**10**

TEACHING METHODOLOGY

Conventional method (classroom blackboard teaching)
ICT Techniques
Teaching through the classroom
Variety of learning styles and tools (PowerPoint presentations, audio-visual resources, e-resources,

seminars, workshops, models)

LEARNING OUTCOME

By successfully completing this course, the learner will be able to:

- Perform simple arithmetic calculations with speed and accuracy.
- Will be able to generate tables of any number.
- To perform products of large numbers quickly.
- Develop confidence in calculating square roots and cube roots of integers.
- Perform difficult calculations speedily.
- Face the Numerical Aptitude part of any Competitive Examination confidently.

ARRANGEMENT OF LECTURE DURATION AND PRACTICAL SESSION AS PER DEFINED CREDIT NUMBERS

Units	Lecture Duration (In Hrs.)		Calculation of Credits (In Numbers)		Total Lecture Duration	Credit Calculation
	Theory	Practical	Theory	Practical	Theory+ Practical	Theory+ Practical
Unit – 1	10	00	2	00	30	4
Unit – 2	10	00				
Unit – 3	10	00				
TOTAL	**30**	**30**	**2**	**00**	**30**	**2**

EVALUATION

Theory Marks	Practical Marks	Total Marks
50	**00**	**50**

REFERENCE BOOKS

1. Vedic Mathematics Made Easy,**Bhatiya Dhaval,***Jaico Publishing House*
2. Vedic Mathematics for students taking Competitive Examinations.Thakur, **Rajesh Kumar**, *Unicorn Books 2015 or Later Edition*
3. Power of Vedic Mathematics with Trigonometry, **Gupta Atul,** , *Jaico Books*
4. Magical World of Mathematics ,**V. G. Unkalkar,** Vandana Publishers, Bangalore