

## SNS College of Technology(Autonomous) Coimbatore-35 Academic Year 2023 – 2024 (Even)



## **UNIT 2 QUANTITATIVE ABILITY IV**

T4: Divisibility

## **Divisibility Rules: Chart**

	Divisibility Rules Chart			
Divisibility by 1	Every number is divisible by 1.			
Divisibility by 2	When the last digit is 0, 2, 4, 6, or 8			
Divisibility by 3	When the sum of digits is divisible by 3			
Divisibility by 4	When the last two digits of any dividend are divisible by 4 (NOTE: Numbers having 00 as their last digits are also divisible by 4.)			
Divisibility by 5	When the last digit is either 0 or 5			
Divisibility by 6	When the number is divisible by both 2 and 3			
Divisibility by 7	When the last digit is subtracted twice from the remaining digits and gives the multiple of 7			
Divisibility by 8	When the last three digits are divisible by 8(NOTE: Numbers having 000 as their last digits are also divisible by 8.)			
Divisibility by 9	When the sum of all digits is divisible by 9			
Divisibility by 10	When the last digit is 0			
Divisibility by 11	When the difference between the sums of the alternative digits is divisible by 11			
Divisibility by 12	When a number is both divisible by 3 and 4			
Divisibility by 13	Multiply 4 with the last digit and add this product to the remaining number. Continue till a two-digit number is found. If the 2-digit number is divisible by 13, the number is divisible by 13.			

The divisibility rule for 3 asks you to find the sum of the digits. If the sum of the digits is a multiple of 3, then the number is divisible by 3.

$$257 2 + 5 + 7 = 14$$
.  
14 is not a multiple of 3.

257 is not divisible by 3.

$$3423 + 4 + 2 = 9$$
.

9 is a multiple of 3.

342 is divisible by 3.

To cast out 3's don't add any 3, 6 or 9's. 342 ... 4 + 2 = 6 268 ... 2 + 8 = 10 692 ... 2 = 2

Apply the divisibility rule for 3. If the number is divisible by 3, write 3. If the number is not divisible by 3, enter  $\emptyset$ .

4 🖚	70	400	4.40
 47	70	122	140
 169	51	111	60
 86	100	38	14
 164	68	77	61
 148	145	46	64
 81	131	119	26
 54	137	92	83
 141	56	90	44
 75	159	166	50
 156	55	107	87
 78	96	155	72
 167	134	69	40
 108	117	106	31
 41	74	19	124
 36	95	59	29