

PEA308:ADVANCED ANALYTICAL SKILLS-II

L:2 T:1 P:0 Credits:3

Course Outcomes: Through this course students should be able to

CO1 :: apply the concepts learned to solve the problems related to time and work

CO2 :: select an appropriate approach for solution of time, speed and distance related problems

CO3 :: learn the various logical reasoning techniques to reach appropriate conclusions and solve the question related to logarithm and ranking.

CO4 :: use mathematical concepts learned to solve problems of mensuration, height and distance

CO5 :: understand the concepts of clock and calendar to solve competition based questions

CO6 :: remember various fast calculation techniques for quick and accurate data interpretation

Unit I

Time and work. : efficiency based problems, wages based problems, chain rule, alternate work problems, advanced time and work problems

Pipes and cistern : inlet-outlet, part of the tank filled, time-based problems

Unit II

Time, speed and distance : average speed concept, advanced time and speed based questions, ratio based problems, races

Problem on trains : relative speed concept & application

Boats and stream : downstream and upstream, two variable problems

Unit III

Syllogism : logical venn diagrams, possibility based problems, negative statement-based problems

Ranking test : ranking test problems

Logarithm : concepts of the logarithm

Unit IV

Mensuration : perimeter and area of 2-D figures, problems on surface area and volume of cube, cuboid, problems on surface area and the volume of sphere and hemisphere, problems on surface area and volume of cone and cylinder

Height and distance : problem based on height and distance, moving object based

Unit V

Calendar : finding the exact day, advanced concept of calendar

Clocks : concept of clock, gain and loss of time, angle based problems

Inequalities : advanced concepts of inequalities

Analytical reasoning. : linear seating arrangement, circular seating arrangement, combined problems

Unit VI

Data interpretation : bar graph-based problems, tabular based problems, pie-chart based problems, linegraph based problems, mixed graph-based problems, histogram based problems

Data sufficiency : check sufficiency of data

Text Books:

1. A MODERN APPROACH TO VERBAL & NON-VERBAL REASONING by DR. R. S. AGGARWAL, S Chand Publishing
2. QUANTITATIVE APTITUDE by DR. R. S. AGGARWAL, S Chand Publishing

References:

1. ANALYTICAL REASONING by MK PANDAY, BANKING SERVICE CHRONICLE
2. MAGICAL BOOK ON QUICKER MATHS by M.TYRA, BANKING SERVICE CHRONICLE