Time and Work

Part 1 - Basic

Model 1: Basic

1. 15 men can type 3240 pages in 6 days working 2 hours per day. How many men would be required to type 5400 pages working 4 hours per day for 3 days?

   1) 10 2) 16 3) 12 4) 25 5) None of these

2. If 5 workers collect 60 kg wheat in 3 days, how many kilogram of wheat will 8 workers collect in 5 days?

   1) 80 kg 2) 100 kg 3) 120 kg 4) 160 kg 5) None of these

3. 50 people consume 350 kg of rice in 30 days. In how many days will 35 people consume 50 kg of rice?

   1) 2 days 2) 3days 3) 56 days 4) 7 days 5) None of these

4. 4 men work 12 hours daily to complete a work in 9 days. If 16 men work 2 hours a day, in how many days will the work be completed?

   1) 4.5 days 2) 18 days 3) 13.5 days 4) 27 days 5) None of these

5. 15 labours complete a work in 10 days working 6 hours per day, If 18 labours are employed on that work and the work is to be completed in 5 days, then how many hours per day should the work be continued?

   1) 8 2)10 3) 12 4) 9 5) None of these

6. 18 children can do a piece of work in 12 days. How many children would be required to do the same work in 8 days?

   1) 12 2) 18 3) 24 4) 27 5) None of these

7. If 18 men can do a certain job in 36 days, then in how many days can 9 men do the same job?

   1) 36 2) 72 3) 48 4) 90 5) None of these

8. If 15 boys can finish a piece of work in 12 days of 8 hours a day, then how long will it take for 16 boys to do a piece of work 4/6 as great, working 9 hours a day?

   1) 3.33 days 2) 6.66 days 3) 10 days 4)15 days 5) None of these

9. 30 men can do a piece of work in 6 days. How many men would be required to do twice that work in 20 days?

   1) 5 2) 6 3) 18 4) 9 5) None of these

Model 2: Time to finish the given Work

10. A, B and C can finish a piece of work in 10, 15 and 30 days respectively. How many days will be required if A, B and C work together to finish the given work?

    1) 5 2) 6 3) 7 4) 8 5) None of these

11. Govind alone can complete a work in 20 days. Jagdish alone completes it in 30 days. How many days will be required if both of them work together?

    1) 12 days 2) 24 days 3) 25 days 4)10 days 5) None of these

12. Gopal can complete a work in 8 hours and Jai can complete it in 5 hours. How much time will be required if both of them work together?

    1) 6.5 hours 2) 2 1/13 hours 3) 3 1/13 hours

4) 4 1/13 hours 5) None of these

13. A, B and C can finish a piece of work in 8, 12 and 24 days respectively. In how many days can they finish the work if all of them work together?

    1) 10 days 2) 8 days 3) 6 days 4) 4 days 5) None of these

14. B and C together can complete a work in 8 days, A and B together can complete the same work in 12 days, and A and C together can complete the same work in 16 days. In how many days can A, B and C together complete the work?

    1) $3\frac{9}{13}$ 2) $7\frac{5}{13}$ 3) $7\frac{\mathbf{5}}{\mathbf{12}}$ 4) $3\frac{\mathbf{5}}{\mathbf{12}}$ 5) None of these

15. Father and Son can together finish a work in 3 days. Father alone can finish it in 5 days. How many days will the Son alone take to finish the work?

    1) 5 days 2) 7.5 days 3) 9 days 4)10 days 5)None of these

16. 12 men can complete a work in 6 days. 8 women can do it in 12 days. If 6 men and 8 women are employed together, how many days will be required to finish the work?

    1) 8 days 2) 6 days 3) 12 days 4) 9 days 5) None of these

17. 10 men can complete a piece of work in 15 days and 15 women can complete the same work in 12 days. If all the 10 men and 15 women work together, in how many days will the work get completed?

    1) 6 2) 6.33 3) 6.66 4) 7.66 5) None of these

18. 10 women can complete a work in 7 days and 10 children take 14 days to complete the work. How many days will 5 women and 10 children take to complete the work?

    1) 3 2) 5 3) 7

    4) Cannot be determined 5) None of these

19. 3 men or 7 women can do a piece of work in 32 days. Find the number of days required by 5 men and 7 women to do a piece of work twice as large. **[January 03, 2015 @ 1h 53m 40s]**

1) 29 days 2) 31 days 3) 24 days 4) 19 days 5) None of these

Model 3: Work = Men X Days

20. A work is started by 15 people. After 5 days, 5 more people accompanied them to finish the work in next 10 days. How many people should have started the work to finish it in 11 days?

1) 24 2) 22 3) 20 4) 25 5) None of these

21. A garrison of 1500 men is provisioned for 60 days. After 25 days, the garrison is reinforced by 500 men. How long will the remaining provisions last? **[October 18, 2014 @ 1h 53m 40s]**

1) 24 days 2) 21.75 days 3) 26.25 days 4) 52 days 5) None of these

22. 24 men can complete a work in 16 days. The same work can be completed by 8 women in 72 days, whereas 24 children take 32 days to complete it. If 10 men, 15 women, and 24 children work together, in how many days can the work be completed?

1) 18 2) 8 3) 22 4) 12 5) None of these

23. 12 men and 18 women can complete a work in 6 days whereas 12 women can complete the work in 18 days. 4 days after they started the work 4 men left, how many days will the remaining people take to complete the remaining work?

1) 2.4 2) 4 3) 3 4) 5 5) None of these

24. 8 men and 4 women can complete a piece of work in 6 days. The work done by a man in one day is double the work done by a woman in one day. If 8 men and 4 women started working and after 2 days 4 men left and 4 new women joined, in how many more days will the work will be completed? **[January 03, 2015 @ 10m 02s]**

    1) 5 days 2) 8 days 3) 6 days 4) 4 days 5) 9 days

25. A father can finish a work in 8 days. After working for 3 days, his son joined him and the remaining work got finished in next 1 day. If son works alone, how many days does he take to finish the work?

    1) 8 2) 2 3) 4 4) 32 5) None of these

26. A can do a piece of work in 24 days and B in 30 days. A worked for 6 days and then B also joined him. In how many days will the whole work be completed?

    1) 12 days 2) 14 days 3) 15 days 4) 16 days 5) None of these

27. X and Y can do a piece of work in 20 days and 12 days respectively. X started the work alone and then after 4 days Y joined him till the completion of the work. How long did the work last? **[November 25, 2014 @ 1h 28m 02s]**

    1) 6 days 2) 10 days 3) 15 days 4) 20 days 5) None of these

28. A and B can do a piece of work in 45 days and 40 days respectively. They began to do the work together but A leaves after some days and then B completed the remaining work in 23 days. After how many days did A leave the work? **[March 19, 2016 @ 51m 15s]**

    1) 6 2) 8 3) 9 4) 12 5) None of these

29. 5 men and 6 boys finish a piece of work in 4 days; 4 men and 3 boys in 6 days. In how many days would 3 men and 6 boys finish the same work?

    1) 5 days 2) 36/7 days 3) 4 days 4) 29/7 days 5) None of these

30. Sejal alone can complete a task in 12 days. She works alone for 4 days. She completes the remaining work in 4 days with the help of her colleague. How many days will the colleague alone take to complete the task? **[October 18, 2014 @ 44m 15s]**

    1) 9 2) 12 3) 10

    4) Cannot be determined 5) None of these

Model 4: Change in Workforce/Capacity

31. 6 typists can do a piece of work in 8 hours. If 3 more typists whose working speed is double the earlier typists join together, then the work will be finished in how many hours?

    1) 6 hours 2) 5 hours 3) 4 hours

    4) Data inadequate 5) None of these

32. 8 workers can do a work in 12 days. Two more workers whose efficiency is double than the earlier ones join them, in how many days they will be able to finish that work? **[November 25, 2014 @ 1h 32m 15s]**

    1) 6 2) 8 3) 10

    4) Cannot be determined 5) None of these

33. Work done by A in one day is half of the work done by B in one day. Work done by B is half of the work done by C, in one day. If C alone can complete the work in 7 days, in how many days can A, B and C together complete the same work?

    1) 28 2) 14 3) 4 4) 21 5) None of these

34. A alone can complete a piece of work in 8 days. Work done by B alone in one day is half of the work done by A alone in one day. In how many days can the work be completed if A and B work together?

    1) 6.33 2) 5.66 3) 5.33 4) 6.66 5) None of these

35. A, B and C together can do a piece of work in 10 days; B and C together work thrice as much as A and A and B together work 4 times as much as C. In how many days can each do it alone?

    1) 45, 22, 52 2) 40, 18, 50 3) 40, 200/11, 50
    4) 30, 200/11, 5 5) None of these

Model 5: Persons Working on Alternate Days

36. X alone can complete a piece of work in 12 days and Y alone can complete the same work in 24 days. If they work on alternate days with X working on the first day, then in how many days will the work be completed?

    1) 15 2) 16 3) 4 4) 8 5) None of these

37. A alone can complete a piece of work in 8 days and B alone can complete the same work in 16 days. If they work on alternate days with A working on the first day, then in how many days will the work be completed?

    1) 5.5 2) 10 3) 10.5 4) 11 5) None of these

Model 6: Distribution of Wages

38. A can do a piece of work in 15 days and B in 20 days. They finished the work with the assistance of C in 5 days and got ₹ 45 as their wages. What is the share of each person?

    1) ₹ 22.5, ₹ 12, ₹ 10.5 2) ₹ 10.5, ₹ 12, ₹ 22.5 3) ₹ 15, ₹ 11.25, ₹ 18.75

4) ₹ 12.5, ₹ 13, ₹ 19.5 5) None of these

39. A, B and C can do a piece of work in 6, 12 and 30 days respectively. They agreed to work together and finish the work for an amount of ₹ 3400. What will be the share of the person B from the given amount?

1) ₹ 1500 2) ₹ 1000 3) ₹ 2000 4) ₹ 400 5) None of these

Model 7: Pipes and Cisterns

40. Pipes A and B can fill a cistern in 10 and 12 hours respectively and pipe C can empty it in 6 hours. If all the three are opened simultaneously, then how much time is required for the tank to be full?

1) 20 hours 2) 60 hours 3) 80 hours 4) 40 hours 5) None of these

41. A cistern can be filled by two taps in 20 min and 30 min respectively and can be emptied by a third tap in 48 min. If they are all turned on at once, when will the cistern be half full?

1) 16 min 2) 8 min 3) 10 min 4) 12 min 5) None of these

42. A water tub can be filled by two taps in 8 min. One tap is closed after 3 min; the other tap fills the remaining tub in 15 min. How much time will the faster tap take to fill the tub?

1) 10 min 2) 11 min 3) 12 min 4) 15 min 5) None of these

43. Three pipes A, B and C can fill a cistern in 15, 20 and 30 min respectively. They were all turned on at the same time but after 5 min the first two pipes were turned off. In what time will the cistern be full? **[October 18, 2014 @ 1h 55m 15s]**

1) 7.5 min 2) 5 min 3) 13 min 4) 12.5 min 5) None of these

44. Two pipes A and B together can fill a cistern in 4 hours. Had they been opened separately, then B would have taken 6 hours more than A to fill the cistern. How much time will be taken by A to fill the cistern separately? **[August 16, 2014 @ 08m 16s]**

1) 1hr 2) 2 hrs 3) 6 hrs 4) 8 hrs 5) None of these

Answers

1 - 4	2 - 4	3 - 5	4 - 3	5 - 2	6 - 4	7 - 2	8 - 2	9 - 3	10 - 1
11 - 1	12 - 3	13 - 4	14 - 2	15 - 2	16 - 2	17 - 3	18 - 3	19 - 3	20 - 4
21 - 3	22 - 4	23 - 1	24 - 1	25 - 2	26 - 4	27 - 2	28 - 3	29 - 2	30 - 2
31 - 3	32 - 2	33 - 3	34 - 3	35 - 3	36 - 2	37 - 3	38 - 3	39 - 2	40 - 2
41 - 2	42 - 3	43 - 4	44 - 3						

Note: The date and time mentioned against some questions refer to the doubts clarification session on Quantitative Aptitude in which the question was solved.