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GENERAL MATHS

Q1. Milk & Water in two vessels A and B are in the ratio 4:3 and 2:3 respectively. In what ratio the liquids in both the vessels should be mixed to obtain a new mixture in vessel C, maintain half milk & half water?
(A) 1 : 1 (B) 7 : 5 (C) 2 : 4 (D) 1 : 3

Q2. A picture was bought at a certain sum, which was the price paid for its frame. Had the frame cost Rs. 100/- less and the picture Rs. 75/- more the price for the frame would have been only half of that of the picture. What is the price of the frame?
(A) 75 (B) 100 (C) 175 (D) 275

Q3. What is the closest time between 7 & 8 when the hands of your watch are exactly opposite each other?
(A) 7 Hr – 5 Min (B) 7 Hr – 5.5 Min
(C) 7 Hr – 6 Min (D) 7 Hr – 6.5 Min

Q4. There are 6 tickets to the theater, four of which are four seats in the front now. 3 tickets are selected at random. What is the probability that two of them are for the front row?
(A) 0.6 (B) 0.7 (C) 0.9 (D) 1/3

Q5. When 75% of a no. is added to 75, the result is the same number. The no. is?
(A) 150 (B) 300 (C) 100 (D) 450

Q6. Any traveled $4/7^{th}$ as many miles on foot by water and $2/5^{th}$ as many miles on horse back as by water. If she covered a total of 3036 miles, how many miles did she travel in each manner: foot and horseback?
(A) 1540, 880, 616 (B) 616, 880, 1540
(C) 1540, 880, 616 (D) 880, 1540, 616

Q7. A family has several children. Each boy in the family has as many sisters as brothers both each girl has twice as many brother & sisters are there?
(A) 3 Brothers, 4 Sisters (B) 4 Brothers, 4 Sisters
(C) 4 Brothers, 4 Sisters (D) Cannot say

Q8. You are given 50 white marbles, 50 black marbles and two jars. You need to put 100 marbles in any of these two jars. The jars will then be shaken & you will be asked to pick one marble from either jar. How would you distribute the marbles in two are to maximize the possibility of picking a white marble blind folded?
(A) 25 white and 25 black in each
(B) White in one and till 99 in the other.
(C) 50 white in one and 50 black in the other.
(D) All hundred in one.

Q9. The no. plate of a bus had peculiarity. The bus number was a perfect square. It was also a perfect square when the plate was turned upside down. The bus company had only five hundred buses numbered from 1 to 500. What was the number?
(A) 169 (B) 36 (C) 196 (D) Cannot say

Q10. If 5 spiders can catch five flies in five minutes. How many flies can hundred spiders catch in 100 minutes?
(A) 100 (B) 1000 (C) 5000 (D) 2000

Q11. Recently my brother and 1 played chess for chocolates. Who ever lost the game gave the other a chocolate. After the last game we counted the chocolates 1 had 20 more chocolates than 1 started with, although he won 7 games. There no draws. How many games did we play?
(A) 27 (B) 34 (C) 37 (D) 54

Q12. Study the series carefully 'B 8 4 C R M 9 P D K W F A 2 E J 7 X U Q H L T Y 6 G S'. If it is possible to make a meaningful word with the ninth, the sixteenth, the twenty-fourth and the twenty-seventh letters from the left in the above series, which of the following will be the first letter of that word? If no such word can be made, give 'X' as the answer. If more than one such word can be made, give 'M' as the answer.
(A) X (B) M (C) J (D) Y

Q13. The value of $5^{1/4} \times (125)^{0.25}$
(A) 5 (B) 25 (C) 50 (D) 10

Q14. Imagine you have two large pitchers, A & B. A contains 10 liters of wine and B contains 10 liters of water. One liter of water is removed from B and poured into A. the liquid is mixed very well. Then one liter of the mixture from A is poured into B. Which of the following statements is true?
(A) The water contents in A is more than the wine contents in B
(B) The water contents in A is less than the wine contents in B
(C) The water contents in A is same as the wine contents in B
(D) None of the above

Q15. Anand, Binoy, Chetan and Dharma together have Rs. 47 with them. Anand & Dinoy together have Rs. 27; Chetan & Anand have Rs. 25 and Dharam & Anand have Rs. 23. How much money does Binoy have?
(A) Rs. 9 (B) Rs. 11 (C) Rs. 13 (D) Rs. 28

Q16. David gets on the elevator at the 11th floor of a building and rides up at the rate of 57 floors per minute. At the same time Albert gets on an elevator at the 51 it floor of the same building and rides down at the rate of 63 floors per minute. If they continue traveling at these rates, then at which floor will their elevators meet?
(A) 19 (B) 30 (C) 28 (D) 37

Q17. The average of 5 consecutive number is n. If the next two numbers are also included the average will
(A) Remain the same (B) Increase by 1
(C) Increase by 1.4 (D) Increase by 2

Q18. Find the wrong term in the following sequence: 52, 51, 48, 43, 34, 27, 16
(A) 27 (B) 34 (C) 43 (d) 48

Q19. P is six times as large as Q. By what percent is Q less than P?
(A) $16\frac{2}{3}\%$ (B) 60% (C) $83\frac{1}{3}\%$ (D) 90%

Q20. When a heap of pebbles is grouped in 32, 40 or 72 it is left with remainders of 10, 18 or 50 respectively. What is the minimum number of pebbles that the heap contains?
(A) 1416 (B) 1418 (C) 1412 (D) 1420

Q21. Each of the series SI=2+4+6+..... and S2=3+6+9+..... is continued to 100 terms. Find how many terms are identical.
(A) 34 (B) 33 (C) 32 (D) None of the above

Q22. Ram Singh does to Pushkar Mela with Rs. 10000/- to buy exactly 100 animals. He finds that Cows are sold at Rs. 1000/-, Horses at Rs. 300/- and Chicken at Rs. 50/-. How many Chicken should he buy to meet his target of 100 animals?
(A) 92 (B) 94 (C) 90 (D) 88

Q23. Fill in '+' or '-' sign in between these numbers so that they give the correct answer.
$1\ 2^3\ 3^3\ 1\ 4^3 = 31$
(A) + + - - (B) + + + - (C) - - + + (D) - - - +

Q24. Symbiosis runs a Corporate Training Programme. At the end of running the first programme its total takings were Rs, 38950/-. There were more than 45 but less than 100 participants. What was the participants fee for the programme?
(A) Rs. 410/- (B) Rs. 450/- (C) Rs. 500/- (D) Rs. 510/-

Q25. Complete the series 1, 6, 6, 36, 216, ...
(A) 7775 (B) 7776 (C) 7777 (D) 7778

Q26. Three friends had a dinner at a restaurant. When the bill was received Amita paid 2/3 as much as Veena paid and Veena paid ½ as much as Tanya paid. What fraction of the bill did Veena pay?
(A) 1/3 (B) 3/11 (C) 12/31 (D) 5/8

Q27. 128 players start in the men's singles at a tennis tournament, where this number reduces to half on every succeeding round. How many matches are played totally in the event?
(A) 63 (B) 48 (C) 127 (D) 144

Q28. A crew can row 10 miles in $5/6^{th}$ of an hour downstream and 12 miles upstream in 90 minutes. Find the current's rate and crew's rate in still water.
(A) 12 mph, 4 mph (B) 10 mph, 2 mph
(C) 8 mph, 4 mph (D) 12 mph, 2 mph

Q29. If Swamy has two children and he truthfully answers yes to the question "Is at least one of your children a girl?" What is the probability that both his children are girls?
(A) ½ (B) 1/3 (C) 1 (D) 0

Q30. Starting from his house one day, a student walks at a speed of 2½ kmph and reaches his school 6 minutes late. Next day he increase his speed by 1 kmph and reaches his school 6 minutes early. How far is the school from the house?
(A) 1 km (B) 1 ½ km (C) 1 ¾ km (D) 2 km

Q31. What year comes next in the sequence 1973, 1979, 1987, 1993, 1997, 1999.....?
(A) 2001 (B) 2003 (C) 2005 (D) 2007

Q32. The numbers of students studying Physics, Chemistry and Zoology in a college were in the ratio 4:3:5 respectively. If the number in these three disciplines increased by 50%, 25% and 10% respectively in the next year, then what was the new respective ratio?
(A) 24:15:22 (B) 18:11:13 (C) 24:13:17 (D) Cannot be determined

Q33. A man earns Rs. 20/- on the first day and spends Rs. 15/- on the next day. He again earns Rs. 20/- on the third day and spends Rs. 15/- on the fourth day/ if he continues to save like this, how soon will he have Rs. 60/- in hand?
(A) On 17th day (B) On 27th day (C) On 24th day (D) On 30th day

Q34. A game of football with 11 players lasts for exactly 90 minutes. There are four substitutes that alternate equally. If each player plays for the same length of time, what is the duration?
(A) 22.5 mins (B) 18 mins (C) 66 mins (D) none of these

Q35. A, B & C start a business each investing Rs. 20000. After 5 months A withdrew Rs. 5000, B Rs. 4000 and C invested Rs. 6000 more. At the end of the year a total profit of Rs, 69900 was recorded. What is the share of B?
(A) Rs. 20500 (B) Rs. 21200 (C) Rs. 28200 (D) Rs. 27300

Q36. The current birth rate per thousand is 32, whereas corresponding death rate is 11 per thousand. The growth rate in terms of population increase in percent is given by
(A) 0.021% (B) 0.21% (C) 2.1% (D) 21%

Q37. A difference between two numbers is 1365, when larger number is divided by the smaller one, the quotient is 6 & the remainder is 12. What is the smaller number?
(A) 240 (B) 360 (C) 270 (D) 295

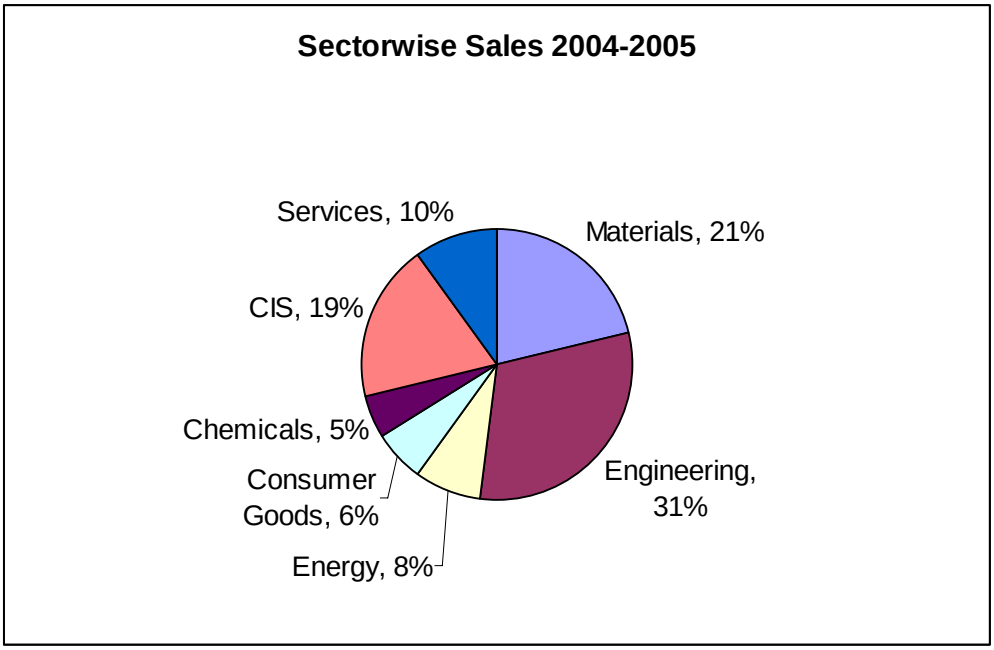
Q38. Two vertical poles are 40 meters apart and the height of one is double that of the other. From the middle point of the line joining their feet, an observer finds the angular elevations of their tops to be complementary. Find their heights.
(A) 14.14m, 28.28 m (B) 12m, 22 m
(C) 12.12 m, 24.24 m (D) None of the above

Q39. Meera & Sameera start moving from the same point. Meera goes 4 kms West followed by 3 kms North. Sammera goes 4 kms East and ten a right turn and keeps going for 3 kms. What is the shortest distance between the two of them?
(a) 10 kms (B) 12 kms (C) 8 kms (D) 14 kms

Q40. A boy was asked to multiply a certain number by 53. He multiplied it by 35 & got his answer less than the correct one by 1206. Find number to be multiplied.
(A) 68 (B) 67 (C) 77 (D) None of the above

DATA INTERPRETATION & DATA SUFFICIENCY

Directions : For questions no. 41 to 42
Study the sector-wise sales of a group of companies for the financial year 2004-2005 and answer the following questions.



Sectors	(Rs. Million)	% share
Materials	164,430	21.0
Engineering	244,830	31.2
Energy	62,990	8.0
Consumer goods	47,880	6.1
Chemicals	35,510	4.5
Communications and information systems	148,160	18.9
Services	78,950	10.1

Total	782,750	
* Sales turnover at US$ 17.4 billion (Rs. 78,224 crore) representing a year-on-year growth of 30.3 per cent in dollar terms and 27.4 per cent in rupee terms.		
* Sales figures shown are net of excise duty.		

Q41. This group of companies operates in multiple sectors. The holding company has decided to closely monitor minimum number of sectors (not exceeding 5) contribution together a major part (at least 80%) of sales of the group. Identify the correct set of sectors.
(A) Engineering, Services, CIS & Consumer Goods
(B) Engineering, Services, CIS, Energy & Consumer Goods
(C) Engineering, Materials, Services & CIS
(D) Engineering, Materials, CIS & Energy

Q42. The average profit against the sales across the sectors is 10% while the profit margin of Engineering is 12% and CIS, 20%. What is the average profit across the remaining sectors?
(A) 5.87% (B) %
(C) 4.94% (D) %

Directions for question No. 43 to 46 : Each question given below is followed by three statements. Study the question and the statements. Identify which option is necessary to answer the question.

Q43. The mean temperature of Money to Wednesday was 37 degree Celsius and of Tuesday to Thursday was 34 degree Celsius. What was the temperature on Thursday?
I. The temperature on Thursday was $4/5^{th}$ that of Monday.
II. The mean temperature of Monday and Tuesday was 40.5 degree Celsius.
III. The difference between the temperature on Monday and that on Thursday was 9 degree Celsius.
(A) I only (B) Either I or II
(C) Either I or II or III (D) None of the above

Q44. What will be the sum of two numbers?
I. Among the two numbers, the bigger number is greater than the smaller number by 6.
II. 40% of the smaller number is equal to 30% of the bigger number
III. The ratio of half of the bigger number to one third of the smaller number is 2:1.
(A) I or II (B) II or III
(C) I or II or III (D) Any two of the three

Q45. A tank is fitted with two taps A and B. In how much time will the tank be full if both the taps are opened together?
I. A is 50% more efficient than B
II. A alone takes 16 hours to fill the tank
III. B alone takes 24 hours to fill the tank

(A) I and III only
(B) I, II and III
(C) I and II only
(D) I and III only

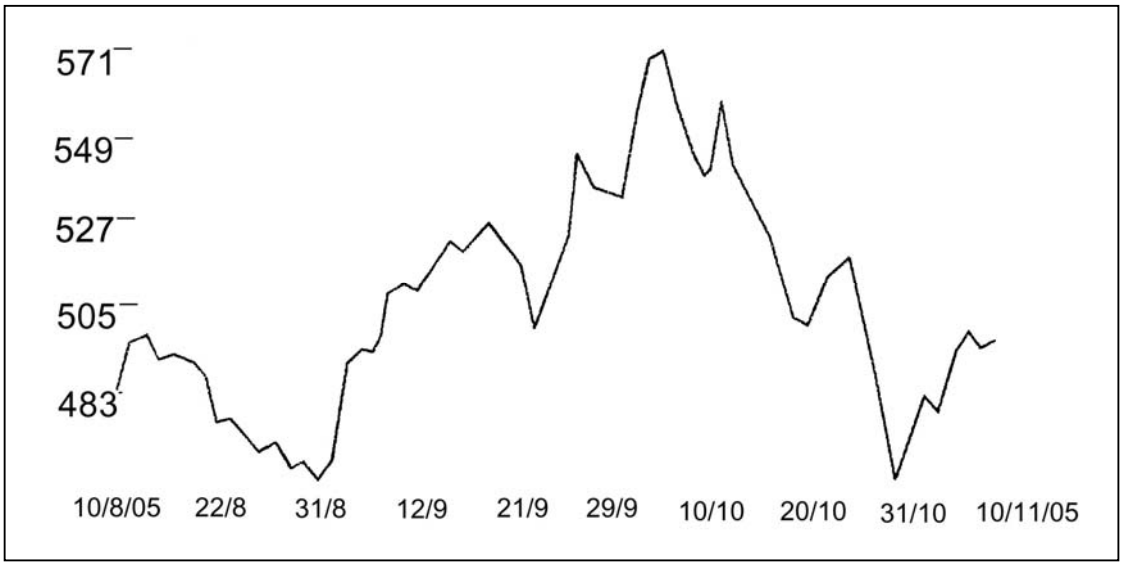
Q46. What is the principal sum?
I. The interest amount after 30 months is half the interest amount after 5 years.
II. The sum amounts to Rs. 750/- in five years at simple interest rate.
III. The rate of interest is 8% .a.

(A) I and III only
(B) II and III only
(C) I and II only
(D) I and III only, or II and III only

Directions for Question No 47 to 50 : Study the weekly data table and daily data graph for Toya Motors share prices at the National Stock Exchange. Answer the follwoign questions.

Toya Motors NSE Share prices for 3 months

10/8	22/8	31/8	12/9	21/9	29/9	10/10	20/10	31/10	10/11
483	475	461	513	516	535	538	500	461	498



Q47. What is the average share price for 10/8/2005 to 12/9/2005?
(A) 527 (B) 505 (C) 483 (D) 461

Q48. The drop in the sales price during October 2005 is approximately?
(A) 19% (B) 10% (C) 50% (D) 5%

Q49. How many times during this 3-month period the share price dropped in the graph?
(A) 6 (B) 17 (C) 15 (D) 10

Q50. If you purchased 100 shares on 31/8/2005 and sold them on 10/10/2005 what will be your gains?
(A) Rs. 7700 (B) Rs. 8800 (C) Rs. 9900 (D) Rs. 6600

Directions : For question No. 51 to 54
Each question consists of a statement and/or a question followed by two statement I & II. Identify an option which provides sufficient data to answer the given question.
(A) If the data is Statement I is sufficient and II is not required.
(B) If the data in Statement II is sufficient and I is not required.
(C) If the data in both Statements is necessary.
(D) If the data in both Statements is not sufficient to answer the question.

Q51. The total of the present ages of A, B, C and D is 96 years. What is B's present age?
I. The average age of A, B and D is 20 years.
II. The average age of C and D is 25 years.

Q52. Deepak's marks in Hindi are 15 more than the average marks obtained by him in Hindi, Economics, Sociology and Philosophy. What are his marks in Philosophy?
I. The total marks obtained by him in Hindi and Philosophy together is 12.
II. The difference between the marks obtained by him in Sociology and Economics is 120.

Q53. What was the cost price of the suitcase purchased by Richard?
I. Richard got 20% concession on the labeled price

II. Richard sold the suitcase for Rs. 2000/- with 25% profit on the labeled price.

Q54. B alone can complete a work in 12 days. How many days will A, B and C together takes to complete the work?
I. A and B together can complete the work in 3 days.
II. B and C together can complete the work in 6 days.

Directions : For question No. 55 to 60
Study the following two tables of data on Agriculture Import & Export on India during 1998-2001 and answer the following questions.

India's Export of Principal Agricultural Products							
	Products	1998-1999	% of Agri Export	1999-2000	% of Agri Export	2000-2001	% of Agri Export
1.	Tea	538	8.9	412	7.3	433	7.2
2.	Coffee	411	6.8	331	5.9	259	4.3
3.	Cereals	1495	24.8	724	12.9	744	12.4
4.	Tobacco	181	3	233	4.2	191	3.2
5.	Spices	388	6.4	408	7.3	354	5.9
6.	Cashew	387	6.4	567	10.1	411	6.8
7.	Sesame and Niger Seeds	78	1.3	86		131	2.2
8.	Guargum Meal	173	2.9	188	1.5	132	2.2
9.	Oil Meals	462	7.7	378	3.4	448	7.5
10.	Fruits & Vegetables	184	3	209	6.7	248	4.1
11.	Processed Fruit & Vegetables	69	1.1	86	3.7	122	2
12.	Meat & Meat Preparations	187	3.1	189	1.5	322	5.4
13.	Marine Products	1038	17.2	1183	3.4	1394	23.2
14.	Others	446	7.4	614	21.1	815	13.6
	Agri Exports	6037	100	5608	11	6004	100
	% of Agri to Total Exports	18.2		15.2	100	13.5	
	Total Exports	33218		36822		44560	

India's Export of Principal Agricultural Products							
	Products	1998-1999	% of Agri Import	1999-2000	% of Agri Import	2000-2001	% of Agri Import
1.	Cereal	288	9.9	222	7.8	19	1
2.	Pulses	169	5.8	82	2.9	109	5.9
3.	Milk & Cream	3	0.1	25	0.9	2	0.1
4.	Cashew Nuts	230	7.9	276	9.7	211	11.3
5.	Nuts & Fruits	159	5.5	136	4.8	175	9.4
6.	Sugar	264	9	256	9	7	0.4
7.	Oil Seeds	2	0.1	4	0.1	2	0.1
8.	Veg. Oils	1804	61.8	1857	65	1334	71.8
	Total Agri Exports	2919	100	2858	100	1858	100
	% of Agri to Total Imports	6.9		5.8		3.7	
	Total Country Imports	42389		49671		50536	

Q55. Which was the single largest contributor to the total Agri-exports in 2000-1? If the total Agri exports were valued at US $6 billion, what is its contribution in dollar terms?
(A) Careal, US $1.49 billion
(B) Marine Product, US $ 1.27 billion
(C) Marine Product, US $ 1.39 billion
(D) Cereal, US $ 1.03 billion

Q56. Which product has shown strong growth in exports during the 3-year period?
(A) Meat & Meat Preparations
(B) Fruits & Vegetables
(C) Processed fruits & vegetables
(D) None

Q57. Which was the dominant import commodity in 2000-2001 after the vegetable oil?
(A) Pulses (B) Cereals
(C) Cashew Nuts (D) Nuts & fruits

Q58. From the import data about Sugar & cereals it can be said that
(A) India has raised its domestic production of these commodities.
(B) India's demand for these commodities has gone down.
(C) India's gap in production and requirement of these commodities has gone down.
(D) India's population consuming these commodities has gone down.

Q59. In some circles concerns were expressed that liberalization of imports, resulting from lifting of quantitative restrictions on agri products, would lead to surge of agri imports affecting the Indian farmers. What does the data depict?
(A) The concerns were justified because India continued to import agri commodities.
(B) The conerns were not justified because the value of agri imports in aggregate terms has come down during the period.
(C) The concerns were justified because vegetable oil & pulses formed a major component of the imports.
(D) The concerns were not justified because the total exports in aggregate terms were higher than the total imports in aggregate terms.

Q60. Over the period under study both percentages of the total agri-exports to the total exports and that of the total agri imports to the total imports show a downward trend. This indicates that
(A) India should not get into export of agri products and concentrate on other sectors.
(B) India should find ways and means of increasing imports.
(C) India should restrict its imports & exports only to a limited number of commodities & products.
(D) India should work on strategies to enhance exports and reduce imports.

ANALYTICAL & LOGICAL REASONING

Q61. Nalini, her brother, her daughter and her son are tennis players and are playing game of doubles. Their positions on the court are as follows:
Nalinis' brother is directly across the net from her daughter.
Her son is diagonally across the net from the worst player's sibling.
The best player and the worst players are on the same side of the net.

Who is the best player?
(A) Nalini (B) Nalini's brother
(C) Nalini's daughter (D) None of these

Q62. In certain code language 'PROMOTION' is written as 'QSP89'. How will you write 'DEMOTION'?
(A) DE98 (B) EF98 (C) EF89 (D) EG89

Q63. Study this matrix

6	2	5	1
3	1	4	7
4	1	9	5
3	1	2	4

In this game there are two players. The first player can split the matrix vertically into two equal halves and choose one half for further play. The next move on this half is by the other player who will be split it only horizontally and choose one half for further play. The game will continue in this manner. At the end, the last number left is the first player's gain.

If you start the game, retain the right half and, again right half after your opponent's move, then how should your opponent play to minimize your gain?
(A) Retain, upper, retain lower
(B) Retain upper, retain upper
(C) Retain lower, retain upper
(D) Retain lower, retain lower

Q64. What is the next letter in the series?
U, A, R, H, E, U
(A) S (B) T (C) O (D) M

Q65. Sonal, a mathematician, defines a number as 'connected by 6' if it is divisible by 6, or if the sum of its digits is 6, or it 6 is one of the digits of the number. Other numbers are all 'not connected with 6'. As per this definition, the number of integers, from 1 to 60 (both inclusive) which are not connected with 6 is
(A) 18 (B) 43 (C) 22 (D) 42

Q66. Leena, Nitin, Arun & Mohan crossed a lake in a canoe that could hold only two persons. The Canoe held two persons on each of three forward trips across the lake and one person on each of two return trips. Leena was unable to paddle when someone else was in the canoe with her. Nitin was unable to paddle when anyone else except Arun was in the canoe with him. Each person paddle continuously for at least one trip. Who paddled twice?
(A) Leena (B) Nitin (C) Mohna (D) Arun

Q67. A, B, C, D, E, F and G are the members of a family consisting of 4 adults and 3 children, two of whom, F and G are girls, A and D are brothers and A is doctor. E is an engineer married to one of the brothers and has two children. B is married to D and G is their child. Who is C?
(A) G's father (B) F's father
(C) E's daughter (D) A's son

Q68. If every alternative letter of English Alphabet from B onwards (including B) is written in lower case (small letters) and the remaining letters are capitalized, then: How will be the first month of the second half of the year be written?
(A) AuGuSt (B) JuLy
(C) jUly (D) AugUSt

Q69. Following grid represents the sum of two words. Each letter in the word represents a different digit and no letter represents zero. What word 725613 will represent?

	N	O	S	I	E	R
+	A	S	T	R	A	L
SUM	7	2	5	6	1	3

(A) LETINS (B) INLETS (C) SETINS (D) None of the above

Q70. An enterprising businessman earns an income of Rs. 1 on the first day of his business. On every subsequent day, he earns an income which is just double of that made on the previous day. On the 10th day of business, his income is:
(A) Rs. 2^9 (B) Rs. 2^{10} (C) Rs. 10^2 (D) Rs. 10

Q71. One night three naughty boys stole a basketful of apples from the garden, hid the loot and went to sleep. Before retiring they did some quick counting and found that the fruits were less than a hundred in number. During the night one boy awoke, counted the apples and found that he could divide the appeal into three equal parts if he first took one for himself.

He then took one apple, ate it up and took 1/3 of the rest, hid them separately and went back to sleep. Shortly thereafter another boy awoke, counted the apple and he again found that if he took one for himself the loot could be divided in to three equal parts. He ate up one apple, bagged 1/3 of the remainder, hid them separately and when back to sleep. The third boy also awoke after some time, did the same and went back to sleep. In the morning when all woke up, and counted apples, they found that the remaining apples again totaled I more than could be divided into three equal parts. How many apples did the boys steel?
(A) 67 (B) 79 (C) 85 (D) None of the above

Directions for questions no. 72 & 73 : Choose from these four diagrams the one that best illustrates the relationship among three given classes.

FIGURE

Q72. Chilli, Salt, Vegetables

Q73. Students of Law, Students of Science, Men

Directions for question 74 to 78 :
Study the following example and answer the questions.
An electronic device rearrange numbers step-by-step in a particular order according to a set of rules. The device stops when the final results is obtained. In this case the device stops at Step V.

Input:	85	16	36	04	19	97	63	09
Step I	97	85	16	36	04	19	63	09
Step II	97	85	63	16	36	04	19	09
Step III	97	85	63	36	16	04	19	09
Step IV	97	85	63	36	19	16	04	09
Step V	97	85	63	36	19	16	09	04

Q74. Which of the following will be Step III for the input below?

Input:	09	25	16	30	32	18	17	06
(A)	32	09	25	16	30	18	17	06
(B)	32	30	09	25	16	19	17	06
(C)	32	30	09	25	16	18	17	06
(D)	32	30	25	09	16	18	17	06

Q75. What is the last step for the input below?
Input : 16 09 25 27 06 05

(A) Step II (B) Step III
(C) Step IV (D) None of the above

Q76. What is the output of Step V for the input below?

Input:	25	08	35	11	88	67	23
(A)	88	67	35	25	23	11	08
(B)	88	67	35	25	23	08	11
(C)	08	11	23	25	67	67	88
(D)	None of the above						

Q77. Which one of the following would be last step for the input below?
Input : 03 31 43 22 11 09
(A) Step II (B) Step III
(C) Step IV (D) None of the above

Q78. If the output of Step IV is as given below, what was the input?

Step IV:	92	86	71	69	15	19	06	63	58
(A)	86	92	69	71	15	19	06	63	58
(B)	15	86	19	92	69	69	63	58	71

(C)	15	19	06	63	86	86	92	69	71
(D)	None of the above								

Directions for Q. 79 to 80 : Read the following information carefully and then answer the questions given below

P # Q means P is the father of Q
P + Q means P is the mother of Q
P – Q means P is the brother of Q
P * Q means P is the sister of Q

Q79. If A + B # C – D, then A is D's
(A) Sister (B) Grandfather
(C) Grandmother (D) Father

Q80. Which of the following shows that A is the aunt of E?
(A) A – B + C # D * E
(B) A * B # C * D - E
(C) A # B * C + D - E
(D) A + B – C * D # E

GENERAL ENGLISH

Directions for questions 81-87 : Read the following passage and answer the 7 questions following the same.

As the climate in the Middle East changed beginning around 7000 B.C.E., conditions emerged that were conductive to a more complex and advanced from of civilization in both Egypt and Mesopotamia. The process began when the swampy valleys of the Nile in Egypt and of the Tigris and Euphrates Rivers in Mesopotamia became driver, producing riverine lands that were both habitable and fertile, and attracting settlers armed with the newly developed techniques of agriculture. This migration was further encouraged by the gradual transformation of the once-hospitable grasslands of these regions into deserts. Human population became increasingly concentrated into pockets of settlement scattered along the banks of the great rivers.

These rivers profoundly shaped the way of life along their banks. In Mesopotamia, the management of water in conditions of upredictable drought, flood and storm became the central economic and social challenge. Villagers began early to build simple earthworks, dikes, canals, and ditches of drought during the dry season (usually the spring) and flooding at harvest time.

Such efforts required a degree of cooperation among large numbers of people that had not previously existed. The individual village, containing only a dozen or so houses and families, was economically vulnerable; but when several villages, probably under the direction of a council of elders, learned to share their human resources in the building of a coordinated network of water-control systems, the safety, stability, and prosperity of all improved. In this new cooperation, the seeds of the great Mesopotamian civilizations were being shown.

Technological and mathematical invention, too, were stimulated by life along rivers. Such devices as the noria (a primitive waterwheel) and the Archimedean screw (a device for raising water from the low riverbanks to the high ground where it was needed), two forerunners of many more varied and complex machines, were first developed here for use in irrigation systems. Similarly, the earliest methods of measurement and computation and the first developments in geometry were stimulated by the need to keep track of land holding and boundaries in fields that were periodically inundated.

The rivers served as high roads of the earliest commerce. Traders used boats made of bundles of rushes to transport grains, fruits, nuts, fibers, and textiles from one village to another, transforming the rivers into the central spines of nascent commercial kingdoms. Trade expanded surprisingly widely; we have evidence suggesting that, even before the establishment of the first Egyptian dynasty, goods were being exchanged between villagers in Egypt and other as far away as Iran.

Similar developments were occurring at much the same time along the great river valleys in other parts of the world – for example, along the Indus in India and the Hwang Ho in China. The history of early civilization has been shaped to a remarkable degree by the relation of humans and rivers.

Q81. This passage basically explains
(A) the similarities and differences among several ancient societies
(B) the influence of river settlements on the growth of early civilizations
(C) how climatic changes led to the founding of the earliest recorded cities
(D) the development of primitive technologies in the ancient Middle East.

Q82. According to the passage, the increasing aridity of formally fertile grasslands in Egypt and Mesopotamia caused the settlement patterns in those regions to become.
(A) Less nomadic (B) less stable
(C) more concentrated (D) more sparse

Q83. The passage implies that the earliest geometry was practiced primarily by
(A) farm workers (B) land owners
(C) traders and merchants (D) mechanical artisans

Q84. The passage indicates that the social effects of the unpredictability of water supplies in Mesopotamia was
(A) to encourage cooperation in the creation of water management systems
(B) to drive farmers to settle in fertile grasslands far from the uncontrollable rivers
(C) to cause warfare over water rights among rival villages
(D) None of the above

Q85. The passage refers to the earliest trade routes in the Middle East
(A) between various centrally ruled commercial kingdoms
(B) between linked villages in Egypt with others in Iran
(C) between connected villages that were scattred along the banks of the same river
(D) between the inhabitants of small villages and the dynastic kings who ruled them.

Q86. The passage implies that the emergence of complex civilizations in the Middle East was dependent upon the previous development of
(A) a system of centralized government
(B) symbolic systems for writing and mathematical computation
(C) a method of storing and transferring wealth
(D) basic techniques of agriculture

Q87. By referring to emerging civilizations in India & China the author wants to emphasize the
(A) relatively advanced position enjoyed by the Middle East in comparison to other region
(B) rapidly with which social system developed in the Middle East spread to other places
(C) crucial role played by rivers in the development of human cultures around the world
(D) importance of water transportation in the growth of early trade

Directions for Questions 88-89 : Choose the alternative closest in meaning to the given word.

Q88. Askance :
(A) side glance (B) quizzical expression
(C) request (D) curious look

Q89. Virtuoso :
(A) skilled performer (B) amateur
(C) good person (D) professional

Directions for Questions 90-92 : Each question below consists of a related pair of words or phrases, followed by four pairs of words or phrases labeled a through d. Select the pair that best expresses the relationship similar to that expressed in the original pair.

Q90. Nuance : Subtle
(A) Pun : Sarcastic (B) Fib : Honest
(C) Inquiry : Discreet (D) Hint : Indirect

Q91. Arena : Conflict

(A) Mirage : Reality (B) Forum : Discussion
(C) Asylum : Pursuit (D) Utopia : Place

Q92. Hierarchy : Ranked
(A) Equation : Solved (B) Critique : Biased
(C) Chronology : Sequential (D) Infinity : Fixed

Directions for Questions 93-96 : Read the following passage and answer the next 4 questions.

Come with me to Kiebera : the largest shantydown in sub-Saharan Africa. More than 500,000 people live in this vast illegal section of Nairobi, in mud huts on mud streets, with no fresh water or sanitation. Walk down Kiebera's sodden pathways and you'll see a great deal of hunger, poverty and disease. But you'll see a great deal of hunger, poverty, and disease. But you'll also find health clinics, beauty salons, grocery stores, bars, restaurants, tailors, clothiers, churches, and schools. In the midst of squalor and open sewage, business is booming.

Indeed, Kiebera's underground economy is so vibrant that it has produced its own squatter millionaire, someone I have known for years. From his start a generation ago selling cigarettes and biscuits from the window of his hut, this Kenyan (he asked to remain unnamed) has assembled an empire that includes pharmacies, groceries, bars, beverage-distribution outlets, transportation and manufacturing firms, and even real estate.

Families flock to Kiebera for the same reason country folk have always migrated to the city – in search of opportunity. In the city they find work but not a place to live. So they build illegally on land they don't own. There are a billion squatters in the world today, almost one in six people on the planet. And their numbers are on the rise. Current projections are that by 2030 there will be two billion squatters, and by 2050, three billion, better than one in three people on the planet.

In itself, it is nothing to worry about, for squatting has long had a positive role in urban development. Many urban neighbourhoods in Europe and North America began as squatter outposts. London and Pairs boasted huge swaths of mud-and-stick homes, even during the glory years of the British and French monarchies. Squatters were a significant force in most U.S.cities too. It would no doubt surprise residents paying millions for co-op apartments on Manhattens' Upper East and West Sides to know that squatters occupied much of the turf under their buildings until the start of the 20th century. ..... *from an article by Robert Neuwirth*

Q93. The author argues that Kiebera becoming the shantytown is not unusual because
(A) Kiebera has many poor people who have come to earn but have no land to live on.
(B) Researches have predicted that squatters will continue to grow in numbers.
(C) Squatting has long had a positive role in urban development.
(D) All of the above.

Q94. The prosperity of Kierbera's underground economy is described by the author through
(A) The description of Kiebera
(B) The description of his friends business
(C) The comparison with co-op apartments of Manhatten
(D) The history of London and Paris

Q95. The author puts forward the thesis that
(A) Squatters will continue to rise in numbers in the coming years irrespective of whether they are from poor countries or not.
(B) There is nothing wrong in squatting on the land of a stranger
(C) London & Paris too are shantytowns
(D) Even today squatters live under the Manhatten's co-op apartments.

Q96. What is the most appropriate title for this passage?
(A) Kiebera-Squatters' Paradise of Nairobi
(B) Squatters of the World
(C) Squatters Cities
(D) Future of Squatters

Directions for questions 97-99 : Choose the correct alternative to complete the meaning of the given sentence

Q97. The _____ managed to deceive the entire village
(A) renegade (B) sycophant
(C) charlatan (D) actor

Q98. She ordered the taxi driver, 'Drive faster, _____?'
(A) won't you (B) will you
(C) you must (D) can't you

Q99. Her written statement failed to be consistent _____ what she had said earlier
(A) on (B) with
(C) in (D) to

Q100. Choose the antonym nearest in meaning to the word. Facetious :
(A) serious (B) uneasy
(C) pleasant (D) cross

Q101. Which one of the following alternatives is spelt correctly?
(A) extacy (B) ecstasy
(C) ecstacy (D) extasy

Q102. Choose the correct alternative that best explains the following idiom. Writing on the wall
(A) graffiti (B) obvious truth
(C) foreboding (D) prediction

Q103. Choose the correct set of alternatives to fill in the blanks. Although many of the members were _____ about the impending deal, others were _____ about the benefits it would bring
(A) euphoric ..... confident
(B) optimistic ..... dubious
(C) angry ..... skeptical
(D) confused ..... pleased

Q104. Select the lettered pair that best expresses a relationship similar to that expressed by the original pair.
BROOK : RIVER
(A) vein artery
(B) path highway
(C) yard alley
(D) penn paper

Q105. '*But for cancer I would not have give up smoking'*. 'But' in this sentence is
(A) an adverb (B) a preposition
(C) an adjective (D) a verb

Q106. *Here is my list oranges, garbage bags and a tooth brush.*
After the world 'list' identify which one of the following is required.
(A) colon (B) quotation marks
(C) semicolon (D) none of these

Q107. Identify the grammatical error in the sentence below by choosing one of the alternatives.
My main reason for learning pharmacy was that my brother was one.
(A) dangling modifer (B) faulty parallelism
(C) faulty reference by pronoun
(D) the sentence is correct

Q108. For the following pair of sentences choose the correct option
I. The team quickly took their positions on the field
II. The tam quickly took its position on the field

(A) the first sentence is wrong
(B) the second sentence is wrong
(C) both are correct
(D) both are wrong

Directions for questions 109-110 : *Choose erroneous underlined segment or option 'd' if no error.*

Q109. He carried <u>his clothes(A)</u> in a <u>black heavy(B)</u> <u>steel truck(C).</u> <u>(D)</u>

Q110. <u>The corpse(A)</u> <u>had been dead(B)</u> <u>for five days(C.</u> <u>(D)</u>

Q111. Identify the odd one.
(A) Ashoka was one of the greatest kings.
(B) Ashoka was greater than many other kings.
(C) Ashoka was the greatest king.
(D) Very few kings were as great as Ashoka.

Q112. Identify the incorrect one
(A) The coach together with his team was praised.
(B) Many a boy is tempted to sing.
(C) The king with all his sons were imprisoned.
(D) Neither James nor his lawyers were there.

Q113. Identify the sentence that gives the same meaning as the following
He said, "Yes, I'll come and see you."
(A) He accepted that he will come and see me.
(B) He said that he will come and see me.
(C) He agreed that he will come and see me.
(D) He said that he would come and see me.

Directions for Questions 114-117 : Choose one option to fill in the blanks in the following sentences.
(A) a (B) an (C) the (D) none

Q114. I had met him _____ year ago.

Q115. Can you see _____ moon?

Q116. He is _____ honourable man.

Q117. _____ people with little patience rarely succeed.

Q118. Choose the correct arrangement of the following jumbled sentences of a paragraph to make it coherent.
The first sentence is :
Barely a year had elapsed before the Pritzker clan began to squabble.
L. Under the plan he has until 2011 to distribute the assets among the heirs.
M. The family was no longer conhesive whole, they wrote, and therefore the business needed the kind of transparency a public corporation might have.
N. A year later the family agreed on a governing structure for the Pritzker Organization, requiring Tom to open the books, hold annual meetings of family shareholders and issue regular financial reports.
O. In summer 2000, Tom's two brothers and a handful of his cousins sent a letter asking him to restructure the holdings.

(A) NMOL (B) MLON (C) OMNL (D) ONML

Q119. "*Time to bust some myths about the EPF Organization, India's only social security fund manager for non-government workers, though what follows is not published on a regular basis. Active membership is just about 5 percent, and only 17 percent of the members*

account for 84 percent of the balances. That's only Rs. 20000/- each! Less than 7 percent have a deposit amount more than 5 lacs!"
Choose the statement closest to the idea expressed in this paragraph.
(A) EPF is an efficiently managed organization about which no one knows correctly.
(B) EPF is an inefficient organization.
(C) EPF Organisation takes care of future fund requirements of investors adequately.
(D) EPF Organisation does not have enough funds to take care of secure future.

Q120. "*Two recent World Bank studies on India's rapidly depleting water resources have caused quite a stire. More interesting is how water seems to have become the new focus area for Bank assistance : at $3.2 billion in 2005-2008 for a mere $700 million in 1999-04. Within water again, more money is going to rural water, large hydropower projects, and water resource management in poorer states.*"
Choose the statement that summarises the above paragraph test.
(A) India's water resources are depleting.
(B) The two World Bank studies on India have caused a stir.
(C) The world Bank assistance to India for developing water resources has increased more than 4 times for 2005-08 as compared to the prior period.
(D) Poorer states in India require water resource management projects such as rural water, large hydropower projects.

GENERAL AWARENESS

Q121. The International Date Line is located
(A) On the Equator (B) Along 0 degree Longitude
(C) Along 180 degree Longitude (D) At Greenwich in UK

Q122. The Roman Magsaysay award is named after the former President of?
(A) Thailand (B) Philippines
(C) Indonesia (D) None of these

Q123. What level of noise is considered permissible in human habitats?
(A) Upto 50 decibels (B) Less than 40 decibels
(C) Upto 30 decibels (D) Less than 20 decibels

Q124. The Indian city which has a natural harbour and is also one of the largest Indian ports is
(A) Mumbai (B) Calcutta – Haldia
(C) Cochin (D) Vishakhapatnam

Q125. If *saccharine*, an artifical sweetener which is 70 times sweeter than sugar, is kept in the open, which one of these insects will it attract first
(A) ants (B) bees
(C) house-flies (D) none of the above

Q126. When a Pepsi bottle is opened, the gas fizzes out because it obeys
(A) Hess' Law (B) Henry's Law
(C) Kohlarsh's Law (D) None of the above

Q127. Television signals from transmission towers are restricted to a limited area because
(A) the signals become weak with distance
(B) there is interference from other signals
(C) of the Earth's curvature
(D) the atmosphere absorbs the signals

Q128. "Straight from the Guts" is wrotten by
(A) Bills Gates (B) Narayan Murthy
(C) Jack Welch (D) Andy Grover

Q129. Internet is controlled by

(A) The U.S. of A. (B) The U.K.
(C) Switzerland (D) None of the above

Q130. Identify the incorrect statement
(A) A tsunami is a series of waves generated when water in a lake or the sea is rapidly displaced on a massive scale
(B) A tsunami is an after-effect of an earthquake on the seabed.
(C) A tsunami has smaller amplitude (wave height) offshore and a very long wavelength
(D) None of the above

Q131. The largest chunk of revenue for the Union government comes from
(A) Income Tax (B) Central Excise
(C) Corporation Tax (D) Customs Duty

Q132. India test-fired three medium range surface-to-air missiles in Oct-2005. Name the missile
(A) Trishul (B) Nag
(C) Dhanush (D) Akash

Q133. How many calories are there in one litre of water
(A) 1000 calories (B) 100 calories
(C) 1 calories (D) None

Q134. The city closest to the epicenter of the devastating earth-quake that hit Pakistan & India in October 2005 is
(A) Srinagar (B) Balakot
(C) Muzaffarabad (D) Islamabad

Q135. The CDMA mobile services from BSNL is
(A) Tarang (B) Cell One
(C) Idea (D) Orange

Q136. The highest ranking country for 2005-2006 in "Global Competitiveness Report" of the World Economic Forum is
(A) Finland (B) U.S.A.
(C) Singapore (D) U.K.

Q137. Which two independent nations does the 17th Parallel separate
(A) North and South Korea
(B) North and South Vietnam
(C) East and West Germany
(D) Mexico and Panama

Q138. In the "One by Six" rule of Income Tax, it is mandatory to file Income Tax Returns if you possess
(A) television (B) gold
(C) credit card (D) passport

Q139. The Kyoto Protocol pertains to
(A) banning the hunting of whales
(B) reducing greenhouse gas emissions
(C) securing the release of circus animals
(D) disallowing civilian airports for military use

Q140. The riots spreading across France in 2005 were caused by
(A) Al Qaeda
(B) French Nationalists
(C) Racial tensions among Paris' immigrants
(D) France's position in European Union

Q141. One of the UK's leading telecom company and sponsor of the England cricket team is

(A) British Telecom (B) Airtel
(C) A T & T (D) Vodafone

Q142. The price of any currency in the international market is determined by
(A) the World Bank
(B) the demand for goods and services provided by the country
(C) the amount of gold that country has in reserve
(D) the economic stability of that country

Q143. The "Whissle Blower Bill" was passed due to the pressure created by the murder of
(A) Madhumita Shukla (B) Satyadev Dubey
(C) Naina Sharma (D) None of these

Q144. The alleged corruption scam of UN's $64 billion in Iraq disclosed in Nov. 2005 is related to
(A) Iraq ware crimes (B) Iraqi WMD
(C) Saddam Hussein (D) Food-for-oil programme

Q145. The Reserve Bank of India Governor is
(A) Bimal Jain (B) Y.V.Reddy
(C) Deepal Parekh (D) Naresh Chandra

Q146. Which one is listed in the first place among the largest global corporations in 2005 by the Fortune magazine?
(A) Exxon mobile (B) Toyota motors
(C) General motors (D) Walmart

Q147. Recently VAT was introduced in India. Choose the correct statement
(A) VAT has replaced Sales Tax in all states on India.
(B) VAT is charged in place of Sales Tax only in some states of India.
(C) VAT is charged in addition to Sales Tax in all states of India.
(D) VAT is charged in addition to Sales Tax in some states of India.

Q148. Pararchute is a brand of
(A) Hindustan Lever (B) Proctor & Gamble
(C) Marico (D) Dabur

Q149. Tamiflu is
(A) A type of influenza originating in Tamil Nadu
(B) A contagious disease of animals
(C) A form of birdflu
(D) An effective medicine for birdflu

Q150. The Netherlands-based ABN-AMRO award a mega $2.2 B contract to five IT services majors, including IBM & Accenture. Which were the three Indian IT sector companies that made this major breakthrough and also shared the platform with their global counterparts?
(A) TCS, Infosys, Congnizant
(B) TCS, Infosys, Polaris
(C) TCS, Infosys, Patni
(D) TCS, Infosys, Wipro

ANSWER KEYS

1.	(b)	8.	(b)	15.	(c)	22.	(b)	29.	(a)
2.	(d)	9.	(a)	16.	(b)	23.	(c)	30.	(c)
3.	(b)	10.	(d)	17.	(b)	24.	(a)	31.	--
4.	(a)	11.	(b)	18.	(b)	25.	(b)	32.	(a)
5.	(b)	12.	(a)	19.	(c)	26.	(b)	33.	(a)
6.	(a)	13.	(a)	20.	(b)	27.	(c)	34.	(a)
7.	(c)	14.	(c)	21.	(d)	28.	(b)	35.	(b)

36.	(c)	59.	(b)	82.	(a)	105.	(a)	128.	--
37.	(c)	60.	(d)	83.	(b)	106.	(b)	129.	(d)
38.	(a)	61.	(b)	84.	(a)	107.	(c)	130.	(d)
39.	(c)	62.	(c)	85.	(b)	108.	(a)	131.	(b)
40.	(b)	63.	(b)	86.	(d)	109.	(b)	132.	(d)
41.	(c)	64.	--	87.	(c)	110.	(b)	133.	(d)
42.	(c)	65.	(b)	88.	(d)	111.	(c)	134.	(c)
43.	(b)	66.	(c)	89.	(a)	112.	(d)	135.	(a)
44.	(d)	67.	(d)	90.	(b)	113.	(d)	136.	(c)
45.	(a)	68.	(c)	91.	(b)	114.	(a)	137.	(b)
46.	(b)	69.	--	92.	(c)	115.	(c)	138.	(c)
47.	(c)	70.	(a)	93.	(d)	116.	(b)	139.	(b)
48.	(b)	71.	(b)	94.	(b)	117.	(d)	140.	(c)
49.	(b)	72.	(b)	95.	(a)	118.	(d)	141.	(d)
50.	(a)	73.	(b)	96.	(a)	119.	(b)	142.	(d)
51.	(d)	74.	(d)	97.	(b)	120.	(d)	143.	(b)
52.	(d)	75.	(a)	98.	(d)	121.	(c)	144.	(d)
53.	(c)	76.	(a)	99.	(b)	122.	(b)	145.	(b)
54.	(d)	77.	(d)	100.	(a)	123.	(a)	146.	(c)
55.	(c)	78.	(d)	101.	(b)	124.	(a)	147.	(b)
56.	(d)	79.	(c)	102.	(b)	125.	(c)	148.	(c)
57.	(c)	80.	(b)	103.	(a)	126.	--	149.	(d)
58.	(c)	81.	(b)	104.	(b)	127.	(c)	150.	–

SNAP 2005 Answer Keys

1. (b)
2. (d)
3. (b)
4. (a)
5. (b)
6. (a)
7. (c)
8. (b)
9. (a)
10. (d)
11. (b)
12. (a)
13. (a)
14. (c)
15. (c)
16. (b)
17. (b)
18. (b)
19. (c)
20. (b)
21. (d)
22. (b)
23. (c)
24. (a)
25. (b)
26. (b)
27. (c)
28. (b)
29. (a)
30. (c)
31. --
32. (a)
33. (a)
34. (a)
35. (b)
36. (c)
37. (c)
38. (a)
39. (c)
40. (b)
41. (c)
42. (c)
43. (b)
44. (d)
45. (a)
46. (b)
47. (c)
48. (b)
49. (b)
50. (a)
51. (d)
52. (d)
53. (c)
54. (d)
55. (c)
56. (d)
57. (c)
58. (c)
59. (b)
60. (d)
61. (b)
62. (c)
63. (b)
64. --
65. (b)
66. (c)
67. (d)
68. (c)
69. --
70. (a)
71. (b)
72. (b)
73. (b)
74. (d)
75. (a)
76. (a)
77. (d)
78. (d)
79. (c)
80. (b)
81. (b)
82. (a)
83. (b)
84. (a)
85. (b)
86. (d)
87. (c)
88. (d)
89. (a)
90. (b)
91. (b)
92. (c)
93. (d)
94. (b)
95. (a)
96. (a)
97. (b)
98. (d)
99. (b)
100. (a)
101. (b)
102. (b)
103. (a)
104. (b)
105. (a)
106. (b)
107. (c)
108. (a)
109. (b)
110. (b)
111. (c)
112. (d)
113. (d)
114. (a)
115. (c)
116. (b)
117. (d)
118. (d)
119. (b)
120. (d)
121. (c)
122. (b)
123. (a)
124. (a)
125. (c)
126. --
127. (c)
128. --
129. (d)
130. (d)
131. (b)
132. (d)
133. (d)
134. (c)
135. (a)
136. (c)
137. (b)
138. (c)
139. (b)
140. (c)
141. (d)
142. (d)
143. (b)
144. (d)
145. (b)
146. (c)
147. (b)
148. (c)
149. (d)