

JUNE 2015 PAPER 1 NTA UGC NET SOLVED PAPER

1. Which of the following represents one billion characters?

- (A) Terabyte
- (B) Kilobyte
- (C) Megabyte
- (D) Gigabyte

Answer: D

2. The factors which are most important in determining the impact of anthropogenic activities on environment are:

- (A) Population, forest cover and land available per person
- (B) Population, affluence per person, land available per person
- (C) Population, affluence per person and the technology used for exploiting resources
- (D) Atmospheric conditions, population and forest cover

Answer: C

3. Which one of the following represents the binary equivalent of the decimal number 25?

- (A) 11011
- (B) 10101
- (C) 01101
- (D) 11001

Answer: D

4. The University Grants Commission was established with which of the following aims?

- (a) Promotion of research and development in higher education
- (b) Identifying and sustaining institutions of potential learning
- (c) Capacity building of teachers
- (d) Providing, autonomy to each and every higher educational institution in India

Select the correct Answer from the codes given below:

- (A) (a), (b) and (d)
- (B) (a), (b), (c) and (d)
- (C) (a), (b) and (c)
- (D) (b), (c) and (d)

Answer: C

5. The session of the parliament is summoned by:

- (A) The Speaker of the Lok Sabha and the Chairman of the Rajya Sabha
- (B) The President
- (C) The Prime Minister
- (D) The Speaker of the Lok Sabha

Answer: B

6. India's contribution to total global carbon dioxide emissions is about:

- (A) ~15%
- (B) ~3%
- (C) ~6%
- (D) ~10%

Answer: C

7. In which of the countries per capita use of water is maximum?

- (A) India
- (B) USA
- (C) European Union
- (D) China

Answer: C

8. Encoding or scrambling data for transmission across a network is known as:

- (A) Decryption
- (B) Protection
- (C) Detection
- (D) Encryption

Answer: D

9. Civil Service Day is celebrated in India on:

- (A) 7th July
- (B) 21st April
- (C) 24th April
- (D) 21st June

Answer: B

10. The South Asia University is situated in the city of:

- (A) Kathmandu
- (B) Colombo
- (C) Dhaka
- (D) New Delhi

Answer: D

11. Which is an instant messenger that is used for chatting?

- (A) Google Talk
- (B) AltaVista
- (C) MAC
- (D) Microsoft Office

Answer: A

12. The Gross Enrolment Ratio (GER) in institutions of higher education in India at present (2015) is about:

- (A) 23 percent
- (B) 8 percent
- (C) 12 percent
- (D) 19 percent

Answer: A

13. Two earthquakes A and B happen to be of magnitude 5 and 6 respectively on Richter Scale. The ratio of the energies released E_B/E_A will be approximately:

- (A) ~64
- (B) ~8
- (C) ~16
- (D) ~32

Answer: D

14. Which of the following is not an output device?

- (A) Keyboard
- (B) Printer
- (C) Speaker
- (D) Monitor

Answer: A

15. Which of the following is not open source software?

- (A) Apache HTTP server
- (B) Internet explorer
- (C) Fedora Linux
- (D) Open office

Answer: B

16. In the recently launched Air Quality Index in India, which of the following pollutants is not included?

- (A) Chlorofluorocarbons
- (B) Carbon monoxide
- (C) Fine particulate matter
- (D) Ozone

Answer: A

17. The total number of central universities in India in April 2015 was:

- (A) 43
- (B) 08
- (C) 14
- (D) 27

Answer: Marks given to all

18. Which of the following combinations represent renewable natural resources?

- (A) Oil, forests and tides
- (B) Fertile soil, fresh water and natural gas
- (C) Clean air, phosphates and biological diversity
- (D) Fishes, fertile soil and fresh water

Answer: D

19. Which of the following factors does not impact teaching?

- (A) Learning through experience
- (B) Teacher's knowledge
- (C) Class room activities that encourage learning
- (D) Socio-economic background of teachers and students

Answer: D

20. Which of the following steps are required to design a questionnaire?

- (a) Writing primary and secondary aims of the study.
- (b) Review of the current literature.
- (c) Prepare a draft of questionnaire.
- (d) Revision of the draft.

Select the correct Answer from the codes given below:

- (A) (a), (b), (c) and (d)
- (B) (a), (b) and (c)
- (C) (a), (c) and (d)
- (D) (b), (c) and (d)

Answer: A

21. Which of the following is the highest level of cognitive ability?

- (A) Evaluating
- (B) Knowing
- (C) Understanding
- (D) Analysing

Answer: A

22. Achievement tests are commonly used for the purpose of:

- (A) Assessing the amount of learning after teaching
- (B) Making selections for a specific job
- (C) Selecting candidates for a course
- (D) Identifying strengths and weaknesses of learners

Answer: A

23. The conclusions/findings of which type of research cannot be generalized to other situations?

- (A) Causal Comparative Research

- (B) Historical Research
- (C) Descriptive Research
- (D) Experimental Research

Answer: B

24. Techniques used by a teacher to teach include:

- (a) Lecture
- (b) Interactive lecture
- (c) Group work
- (d) Self study

Select the correct Answer from the codes given below:

- (A) (a), (b) and (d)
- (B) (a), (b) and (c)
- (C) (a), (b), (c) and (d)
- (D) (b), (c) and (d)

Answer: B

25. A good thesis writing should involve:

- (a) reduction of punctuation and grammatical errors to a minimum.
- (b) careful checking of references.
- (c) consistency in the way the thesis is written.
- (d) a clear and well written abstract.

Select the correct Answer from the codes given below:

- (A) (b), (c) and (d)
- (B) (a), (b), (c) and (d)
- (C) (a), (b) and (c)
- (D) (a), (b) and (d)

Answer: B

26. Which of the following statements regarding the meaning of research are correct?

- (a) Research refers to a series of systematic activity or activities undertaken to find out the solution of a problem.
- (b) It is a systematic, logical and an unbiased process wherein verification of hypothesis, data analysis, interpretation and formation of principles can be done.
- (c) It is an intellectual enquiry or quest towards truth.
- (d) It leads to enhancement of knowledge.

Select the correct Answer from the codes given below:

- (A) (a), (b), (c) and (d)
- (B) (a), (b) and (c)
- (C) (b), (c) and (d)
- (D) (a), (c) and (d)

Answer: A

27. Jean Piaget gave a theory of cognitive development of humans on the basis of his:

- (A) Evaluation Research
- (B) Fundamental Research
- (C) Applied Research
- (D) Action Research

Answer: B

28. “Male and female students perform equally well in a numerical aptitude test.” This statement indicates a:

- (A) statistical hypothesis
- (B) research hypothesis
- (C) null hypothesis
- (D) directional hypothesis

Answer: C

29. Which of the following statements about teaching aids are correct?

- (a) They help in retaining concepts for longer duration.
- (b) They help students learn better.
- (c) They make teaching learning process interesting.
- (d) They enhance rote learning.

Select the correct Answer from the codes given below:

- (A) (a), (b) and (d)
- (B) (a), (b), (c) and (d)
- (C) (a), (b) and (c)
- (D) (b), (c) and (d)

Answer: C

30. A good teacher is one who:

- (A) inspires students to learn
- (B) gives useful information
- (C) explains concepts and principles
- (D) gives Printed notes to students

Answer: A

Read the following passage carefully and Answer questions 31 to 36.

Story telling is not in our genes. Neither it is an evolutionary history. It is the essence of what makes us Human.

Human beings progress by telling stories. One event can result in a great variety of stories being told about it. Sometimes those stories differ greatly. Which stories are picked up and repeated and which ones are dropped and forgotten often determines how we progress. Our history, knowledge and understanding are all the collections of the few stories that survive. This includes the stories that we tell each other about the future. And how the future will turn out depends partly, possibly largely, on which stories we collectively choose to believe.

Some stories are designed to spread fear and concern. This is because some story-tellers feel that there is a need to raise some tensions. Some stories are frightening, they are like totemic warnings: “Fail to act now and we are all doomed.” Then there are stories that indicate that all will be fine so long as we leave everything upto a few especially able adults. Currently, this trend is being led by those who call themselves “rational optimists”. They tend to claim that it is human nature to compete and to succeed and also to profit at the expense of others. The rational optimists however, do not realize how humanity has progressed overtime through amiable social networks and how large groups work in less selfishness and in the process accommodate rich and poor, high and low alike. This aspect in story-telling is considered by the ‘Practical Possibles’, who sit between those who say all is fine and cheerful and be individualistic in your approach to a successful future, and those who ordain pessimism and fear that we are doomed.

What the future holds for us is which stories we hold on to and how we act on them.

Answer the following questions:

31. Rational optimists:

- (a) Look for opportunities.
- (b) Are sensible and cheerful.
- (c) Are selfishly driven.

Identify the correct Answer from the codes given below:

- (A) (b) and (c) only
- (B) (a), (b) and (c)
- (C) (a) only
- (D) (a) and (b) only

Answer: B

32. Humans become less selfish when:

- (A) they work in solitude
- (B) they work in large groups
- (C) they listen to frightening stories
- (D) they listen to cheerful stories

Answer: B

33. 'Practical Possibles' are the ones who:

- (A) are cheerful and carefree
- (B) follow Midway Path
- (C) are doom-mongers
- (D) are self-centred

Answer: B

34. Story telling is:

- (A) the essence of what makes us human
- (B) an art
- (C) a science
- (D) in our genes

Answer: A

35. Our knowledge is a collection of:

- (A) some important stories
- (B) all stories that we have heard during our life-time
- (C) some stories that we remember
- (D) a few stories that survive

Answer: D

36. How the future will turn out to be, depends upon the stories?

- (A) Designed to make prophecy
- (B) We collectively choose to believe in
- (C) Which are repeatedly narrated
- (D) Designed to spread fear and tension

Answer: B

37. At present a person is 4 times older than his son and is 3 years older than his wife. After 3 years the age of the son will be 15 years. The age of the person's wife after 5 years will be:

- (A) 50
- (B) 42
- (C) 48
- (D) 45

Answer: A

38. Among the following statements two are contradictory to each other. Select the correct code that represents them:

Statements:

- (a) All poets are philosophers.
- (b) Some poets are philosophers.
- (c) Some poets are not philosophers.
- (d) No philosopher is a poet.

Codes:

- (A) (b) and (c)
- (B) (a) and (b)
- (C) (a) and (d)
- (D) (a) and (c)

Answer: D

39. In an examination 10,000 students appeared. The result revealed the number of students who have:

passed in all five subjects = 5583

passed in three subjects only = 1400

passed in two subjects only = 1200

passed in one subject only 735

failed in English only = 75

failed in Physics only = 145

failed in Chemistry only = 140

failed in Mathematics only = 200

failed in Bio-science only = 157

The number of students passed in at least four subjects is:

(A) 7900

(B) 6300

(C) 6900

(D) 7300

Answer: B

40. Which of the following is not a principle of effective communication?

(A) Strategic use of grapevine

(B) Persuasive and convincing dialogue

(C) Participation of the audience

(D) One-way transfer of information

Answer: D

41. In communication, the language is:

(A) The non-verbal code

(B) The verbal code

(C) Intrapersonal

(D) The symbolic code

Answer: B

42. When the purpose of a definition is to explain the use or to eliminate ambiguity the definition is called:

- (A) Persuasive
- (B) Stipulative
- (C) Theoretical
- (D) Lexical

Answer: D

43. A deductive argument is invalid if:

- (A) Its premises and conclusions are all true
- (B) Its premises and conclusions are all false
- (C) Its premises are true but its conclusion is false
- (D) Its premises are false but its conclusion is true

Answer: C

44. Which of the following are the characteristic features of communication?

- (a) Communication involves exchange of ideas, facts and opinions.
- (b) Communication involves both information and understanding.
- (c) Communication is a continuous process.
- (d) Communication is a circular process.

Select the correct Answer from the codes given below:

- (A) (a), (b), (c) and (d)
- (B) (a), (b) and (c)
- (C) (a), (b) and (d)
- (D) (b), (c) and (d)

Answer: A

45. Which of the codes given below contains only the correct statements? Select the code:

Statements:

- (a) Venn diagram represents the arguments graphically.

- (b) Venn diagram can enhance our understanding.
- (c) Venn diagram may be called valid or invalid.
- (d) Venn diagram is clear method of notation.

Codes:

- (A) (a), (c) and (d)
- (B) (a), (b) and (c)
- (C) (a), (b) and (d)
- (D) (b), (c) and (d)

Answer: C

46. The next term in the series is:

2, 5, 9, 19, 37, ?

- (A) 80
- (B) 73
- (C) 75
- (D) 78

Answer: C

47. Inductive reasoning is grounded on:

- (A) Harmony of nature
- (B) Integrity of nature
- (C) Unity of nature
- (D) Uniformity of nature

Answer: D

48. If we want to seek new knowledge of facts about the world, we must rely on reason of the type:

- (A) Physiological
- (B) Inductive

- (C) Deductive
- (D) Demonstrative

Answer: B

49. Effectiveness of communication can be traced from which of the following?

- (a) Attitude surveys
- (b) Performance records
- (c) Students attendance
- (d) Selection of communication channel

Select the correct Answer from the codes given below:

- (A) (a), (b) and (d)
- (B) (a), (b), (c) and (d)
- (C) (a), (b) and (c)
- (D) (b), (c) and (d)

Answer: C

50. One day Prakash left home and walked 10 km towards south, turned right and walked 5 km, turned right and walked 10 km and turned left and walked 10 km. How many km will he have to walk to reach his home straight?

- (A) 30
- (B) 10
- (C) 20
- (D) 15

Answer: D

51. A girl introduced a boy as the son of the daughter of the father of her uncle. The boy is related to the girl as:

- (A) Son
- (B) Brother

- (C) Uncle
- (D) Nephew

Answer: B

52. In certain code MATHURA is coded as JXQEROX. The code of HOTELS will be:

- (A) ELIPQB
- (B) LEQIBP
- (C) ELQBIP
- (D) LEBIQP

Answer: C

53. The term 'grapevine' is also known as:

- (A) Horizontal communication
- (B) Downward communication
- (C) Informal communication
- (D) Upward communication

Answer: C

54. Assertion (A): Formal communication tends to be fast and flexible.

Reason (R): Formal communication is a systematic and orderly flow of information.

- (A) (A) is false but, (R) is correct
- (B) Both (A) and (R) are correct and (R) is correct explanation of (A)
- (C) Both (A) and (R) are correct, but (R) is not correct explanation of (A)
- (D) (A) is correct but, (R) is false

Answer: A

Question numbers 55 to 60 are based on the tabulated data given below:

A company has 20 employees with their age (in years) and salary (in thousand rupees per month) mentioned against each of them:

S.No	Age (in years)	Salary (in thousand rupees per month)	S.No	Age (in years)	Salary (in thousand rupees per month)
1.	44	35	11.	33	30
2.	32	20	12.	31	35
3.	54	45	13.	30	35
4.	42	35	14.	37	40
5.	31	20	15.	44	45
6.	53	60	16.	36	35
7.	42	50	17.	34	35
8.	51	55	18.	49	50
9.	34	25	19.	43	45
10.	41	30	20.	45	50

55. What is the average salary (in thousand per month) in the age group 40-50 years?

- (A) 36.5
- (B) 35
- (C) 42.5
- (D) 40.5

Answer: C

56. What is the fraction of employees getting salary less than the average salary of all the employees?

- (A) 47%
- (B) 45%
- (C) 50%
- (D) 55%

Answer: D

57. What is the frequency (%) in the class interval of 30-35 years?

- (A) 35%
- (B) 20%

(C) 25%

(D) 30%

Answer: A

58. What is the fraction (%) of employees getting salary $\geq 40,000$ per month?

(A) 32%

(B) 45%

(C) 50%

(D) 35%

Answer: B

59. What is the average age of the employees?

(A) 45.3 years

(B) 40.3 years

(C) 38.6 years

(D) 47.2 years

Answer: B

60. Classify the data of age of each employee in class interval of 5 years. Which class interval of 5 years has the maximum average salary?

(A) 50-55 years

(B) 35-40 years

(C) 40-45 years

(D) 45-50 years

Answer: A