

B.Tech. DEGREE EXAMINATION, DECEMBER 2023
Sixth Semester

18PDH201T – EMPLOYABILITY SKILLS AND PRACTICES
(For the candidates admitted during the academic year 2020-2021 & 2021-2022)

Time: Two Hours

Max. Marks: 100

Name of the Candidate :

Register Number :

--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Signature of the Candidate :

INSTRUCTIONS TO THE CANDIDATE

1. The Question Booklet contains 80 Questions.
2. **ANSWER ALL** the questions. **This paper contains TWO parts.**
3. **CALCULATORS OR ANY OTHER MATHEMATICAL DEVICES ARE NOT ALLOWED.**
4. Write your **NAME**, **REGISTER NUMBER** and put your **SIGNATURE** in the places specified on the first page of this Question Booklet.
5. Do not open this Question Booklet until the Hall Superintendent signals the commencement of the examination.
6. Check whether the Answer Sheet and the Question Booklet are in good condition. If not, before writing anything on the Answer Sheet, ask for the replacement of the Question Booklet / Answer Sheet.
7. Write and shade your **REGISTER NUMBER**, in the specified place in the **OMR** coding sheet.
8. Write and shade the question paper version code in the specified place in the **OMR** coding sheet.
9. Answer should be shaded with **BLUE or BLACK BALL PEN** in the Coding Sheet.
10. All instructions given in the **OMR** coding sheet should be strictly followed.
11. Use Answer Sheet carefully. No spare Answer Sheet will be given.
12. The answer should be given only in the Answer Sheet.
13. The last few pages of the Question Booklet are blank, except for the words 'Rough Work'. You can use them for any rough calculations.

PART – A (50 Marks)

Instructions:

Question No. 1 to 10 carries 2 marks each

Question No. 11 to 40 carries 1 mark each

1. Find the digit in the unit's place 4565^{46} .
(A) 5 (B) 6
(C) 8 (D) 7
2. Find the value of $1^2 + 2^2 + 3^2 + \dots + 10^2$.
(A) 515 (B) 385
(C) 785 (D) 475
3. The value of $\log_2 (\log_5 625)$ is
(A) 4 (B) 2
(C) 6 (D) 8
4. A man took a loan from a bank at the rate of 12% p.a. simple interest. After 3 years he has to pay Rs 5400 interest only for the period. The principal amount borrowed by him.
(A) 8000 (B) 10000
(C) 15000 (D) 20000
5. What day of the week was on 5th March 2007?
(A) Sunday (B) Monday
(C) Friday (D) Tuesday
6. Find the angle between the hour hand and minute hand of a clock when the time is 05:30.
(A) 20° (B) 15°
(C) 17° (D) 25°
7. A person earns Rs.1200 per day and spends Rs.800. Find the ratio of his savings to expenditure.
(A) 1:4 (B) 3:2
(C) 3:4 (D) 1:2
8. An amount of Rs.100 is being divided among two persons in the ratio $1/10 : 1/15$. How much money does each get?
(A) 70,30 (B) 60,40
(C) 20,80 (D) 10,90
9. What number must be added to 1031 so that it will be divisible by 5?
(A) 5 (B) 6
(C) 8 (D) 4
10. What percentage of 500 is 250?
(A) 15% (B) 25%
(C) 50% (D) 75%

11. A person was receiving a salary of Rs.20000. Find his new salary after an increase of 20%.
 (A) 25000 (B) 26600
 (C) 24000 (D) 34000
12. A person sold an article for Rs.1100 at a profit of 10%. Find the cost price.
 (A) 500 (B) 1100
 (C) 1000 (D) 990
13. A person bought an old TV for Rs. 4700 and spends Rs. 800 on its repairs. If he sells the TV for Rs. 5800, what is his gain?
 (A) 500 (B) 100
 (C) 300 (D) 490
14. The present age of A and B is in the ratio 3:4. If A's age is 15 years, then find the present age of B?
 (A) 50 (B) 10
 (C) 30 (D) 20
15. A father is twice as old as his daughter. Sum of their ages is 60. Find the present age of father?
 (A) 40 (B) 32
 (C) 33 (D) 42
16. A car travels from a place A to B in 7 hours. It covers half the distance at 30 kmph and the remaining distance at 40 kmph, what is the total distance between A and B?
 (A) 120 (B) 250
 (C) 240 (D) 150
17. Rishi walks at $\frac{4}{5}$ of his normal speed and takes 60 minutes more than the usual time. What will be the new time taken by him?
 (A) 220 (B) 250
 (C) 300 (D) 260
18. Two cards are drawn together from a pack of 52 cards. The probability that one is spade and one is a heart is:
 (A) $\frac{13}{102}$ (B) $\frac{3}{20}$
 (C) $\frac{1}{15}$ (D) $\frac{4}{23}$
19. Two dice are thrown together. What is the probability that the sum of the numbers on the two faces is divisible by 4 or 6?
 (A) $\frac{13}{14}$ (B) $\frac{5}{3}$
 (C) $\frac{7}{19}$ (D) $\frac{7}{18}$
20. In triangle ABC, sides AB and AC are congruent. If the measure of angle C is 36° , what is the measure of angle A?
 (A) 120° (B) 150°
 (C) 108° (D) 100°

21. The measures of the angles of a triangle are in the ratio 2: 3: 5. What is the measure of the smallest angle?
 (A) 12° (B) 15°
 (C) 36° (D) 50°
22. If a vertical stick 12 m long casts a shadow 8 m long on the ground and at the same time a tower casts a shadow 40 m long on the ground, then the height of the tower is
 (A) 40m (B) 50m
 (C) 75m (D) 60m
23. Which of the following sets of numbers could be the lengths of the sides of a triangle?
 (A) 8, 14, 18 (B) 6, 16, 24
 (C) 6, 15, 7 (D) 2, 3, 5
24. Set A consists of 6 elements and Set B consists of 9 elements then what is the largest possible number of elements in its intersection?
 (A) 6 (B) 9
 (C) 15 (D) 3
25. In a class of 150 students, 40 passed in Maths, 90 passed in English and 30 failed in both the subjects. How many students passed in at least one of the subjects?
 (A) 110 (B) 90
 (C) 150 (D) 120
26. In a certain code, PAPER is written as QPARE. How is TABLE written in that code?
 (A) UBALE (B) UBCMF
 (C) UZAKD (D) UBAEL
27. Pointing to an old man, Ram said, "His son is my son's uncle." How is Ram related to the man?
 (A) Brother (B) Son
 (C) Father (D) Cousin
28. What are the missing numbers in this series, 15, 20, 24, 15, 28, 32 15, __, __, 15?
 (A) 37, 41 (B) 36, 40
 (C) 38, 42 (D) 40, 44
29. RQP, ONM, __, IHG, FED, find the missing letters.
 (A) CDE (B) LKI
 (C) LKJ (D) BAC
30. If sky is called sea, sea is called water, water is called air, air is called cloud and cloud is called river, then what do we drink when thirsty?
 (A) Sky (B) Air
 (C) Water (D) Sea

Direction for Q.No. 31 to 35:

Each question is followed by two Statements I and II. Indicate your responses based on the following directives:

- (A) If the question can be answered using one of the statements alone, but cannot be answered using the other statement.
- (B) If the question can be answered using either statement alone.
- (C) If the questions can be answered using I and II together but not using I (or) II alone
- (D) If the question cannot be answered even using I and II together.

31. What is the value of X, if X and Y are two distinct integers and their product is 30?

- I. X is an odd integer
- II. $X > Y$

32. Is m divisible by 6?

- I. m is divisible by 3
- II. m is divisible by 4

33. What day is the fourteenth of a given month?

- I. The last day of the month is a Wednesday.
- II. The third Saturday of the month was seventeenth.

34. On which of the week definitely was Ram's birthday?

- I: Ram celebrated his birthday after Monday but before Saturday.
- II: Ram's friends met Ram on his birthday before Wednesday.

35. John is writing out an arithmetic sequence. How many terms does he need to write out before he writes a term greater than or equal to 1,000?

- I: The fourth term is 50.
- II: The twentieth term is 418.

Direction for Q.No. 36 to 40:

Read the following information carefully and answer the questions given below:

- (A) There is a family of six persons — L, M, N, O, P and Q. They are professor, businessman, chartered accountant, bank manager, engineer and medical representative, not in that order.
- (B) There are two married couples in the family.
- (C) O, the bank manager, is married to the lady professor.
- (D) Q, the medical representative, is the son of M and brother of P.
- (E) N, the chartered accountant, is the daughter-in-law of L
- (F) The businessman is married to the chartered accountant.
- (G) P is an unmarried engineer.
- (H) L is the grandmother of Q.

36. How is P related to Q?

- (A) Brother
- (B) Sister
- (C) Cousin
- (D) Either brother or sister

37. Which of the following is the profession of M?
(A) Professor (B) Chartered Accountant
(C) Businessman (D) Medical representative
38. Which of the following is the profession of L?
(A) Professor (B) Chartered Accountant
(C) Businessman (D) Engineer
39. Which of the following is one of the couples?
(A) QO (B) OM
(C) PL (D) None of these
40. How is O related to Q?
(A) Father (B) Grandfather
(C) Uncle (D) Brother

PART – B (50 Marks)

Instructions:

Question No. 41 to 50 carries 2 marks each

Question No. 51 to 80 carries 1 mark each

Read the argument and answer the questions that follow.

41. The average life expectancy for the United States population as a whole is 73.9 years, but children born in Hawaii will live an average of 77 years, and those born in Louisiana, 71.7 years. If a newly wed couple from Louisiana were to begin their family in Hawaii, therefore, their children would be expected to live longer than would be the case if the family remained in Louisiana.
Which of the following, if true, would most seriously weaken the conclusion drawn in the passage?
- (A) Insurance company statisticians do not believe that moving to Hawaii will significantly lengthen the average Louisianan's life
(B) The governor of Louisiana has falsely alleged that statistics for his state are inaccurate
(C) The longevity ascribed to Hawaii's current population is attributable mostly to genetically determined factors
(D) Thirty percent of all Louisianans can expect to live longer than 77 years
42. Toughened hiring standards have not been the primary cause of the present staffing shortage in public schools. The shortage of teachers is primarily caused by the fact that in recent years teachers have not experienced any improvements in working conditions and their salaries have not kept pace with salaries in other professions.
Which of the following, if true, would most support the claims above?
- (A) Many teachers already in the profession would not have been hired under the new hiring standards
(B) Today more teachers are entering the profession with a higher educational level than in the past
(C) Some teachers have cited higher standards for hiring as a reason for the current staffing shortage

(D) Many teachers have cited low pay and lack of professional freedom as reasons for their leaving the profession

43. Recent research has indicated that married people are not only happier than unmarried people, but also healthier. This study has been widely reported by the media, with most commentators concluding that being married is good for one's health and attitude.

The conclusion of the media commentators depends on which of the following assumptions?

- (A) The longer people are married, the happier and healthier they become
- (B) Married couples who had a large, extravagant wedding are happier than those who had a small, simple ceremony
- (C) Married people cannot get depressed
- (D) Single people with depression or health problems are just as likely to get married as are other single people

44. A greater number of sports magazine subscriptions are sold in Town A than are sold in Town B. Therefore, the citizens of Town A are better informed about international sporting competitions than are the citizens of Town B.

Each of the following, if true, weakens the conclusion above EXCEPT:

- (A) Town A has a larger population than Town B
- (B) The average price of a magazine subscription in Town A is lower than the average price in Town B
- (C) The average citizen of Town B spends more time watching cable sports coverage of international sports than does the average citizen of Town A
- (D) A weekly magazine devoted entirely to high school football is published in Town A

45. Where high school football is considered the most popular sport.

As a result of implementing an experimental farming system that combined aggressive new fertilization, deep irrigation, and speculative pesticides, the yield on crops at a farm in central California grew consistently and considerably over the past six years. However, yields this year unexpectedly plummeted, causing the farm's owners considerable financial difficulties.

Which of the following statements, if true, best explains the unexpected drop in yield?

- (A) As a result of a serious and recent economic recession, the market for the products the farm produced shrank in size during the past year
- (B) Other farms that began using the experimental system at about the same time also reported an unexpected plummet in yields this year
- (C) The central California region where the farm in question is located experienced a drought 9 years ago, 3 years ago, and this past year
- (D) Significant and sustained increases in agricultural productivity eventually lead to an exhaustion of important nutrients in land

In each of the followings, choose the best way of writing the sentence for the underlined part of the sentence.

46. Sheela told her teacher to explain the chapter once again.

- (A) ordered her teacher
- (B) invited her teacher
- (C) asked her teacher
- (D) said to her teacher

47. Any real estate professional will tell you that the value of a parcel of land is most directly affected by the extent of its development and how close it is to a major business center.
 (A) the extent of its development (B) whether it has been developed extensively
 (C) how extensively it has developed (D) how extensively it has been developed
48. During the summer of 2002, the Outer Banks suffered a massive toad infestation, discouraging many vacationers from visiting the area.
 (A) suffered a massive toad infestation, discouraging (B) suffered from a massive toad infestation and discouraged
 (C) suffered a massive infestation of toads, which discouraged (D) was suffering a massive infestation of toads and discouraging
49. The activism of state citizens, who have demanded safer road conditions as well as stiffer penalties for intoxicated drivers, have lead to a significant decrease in the number of traffic accidents.
 (A) having leading to a significant decrease in the number (B) have lead to significant decreases in the number
 (C) has lead to a significant decrease in the number (D) has significantly decreasing the number
50. Registered brokerage firms have been required to record details of all computerized program trades made in the past year so that government agencies will be able to decide whether they should be banned.
 (A) have being able to decide whether they should be banned (B) should be able to decide whether they should be banned
 (C) should be able to decide whether they can be banned (D) will be able to decide whether program trades should be banned

Choose the synonym of the underlined word.

51. Some hotels charge exorbitant rates for phone calls.
 (A) acceptable (B) reasonable
 (C) reliable (D) excessive
52. Being a member of this club, he has certain privileges.
 (A) virtues (B) facilities
 (C) gains (D) rights
53. The government imposed onerous taxes on imports.
 (A) Gratuitous (B) Burdensome
 (C) Facile (D) Relieving
54. Zeus was a legendary character from Greek mythology.
 (A) Infamous (B) Renowned
 (C) Obscure (D) Recondite
55. I do meditate whenever I am in solitude.
 (A) Togetherness (B) Loneliness
 (C) Hatred (D) Company

Choose the antonym of the underlined word.

56. Mohan gave a furios speech on bribery.
(A) Wrathful (B) Cheerful
(C) Frenzied (D) Angry
57. The society does not like anyone to be rebellious.
(A) Gentle (B) Antagonist
(C) Quarrelsome (D) Bloodthirsty
58. Today's students are given many enervating tasks.
(A) Untiring (B) Easy
(C) Sapping (D) Difficult
59. If you suspect a gas leak, do not turn on an electric light.
(A) Trust (B) Reckon
(C) Surmise (D) Mistrust
60. Ruben is well known for coming up with impractical solutions.
(A) Easy (B) Alternate
(C) Possible (D) Practical

Choose the sentence that best completes the sentence semantically/grammatically.

61. The new owners of the house changed the interior ____ completely.
(A) Design (B) Game
(C) Petals (D) Ring
62. Though my colleagues were in favor of ending our research, I wanted to _____ it.
(A) Abandon (B) Delay
(C) Investigate (D) Continue
63. In order to maintain good health one should eat a _____ diet.
(A) Spicy (B) Rich
(C) Balanced (D) Salty
64. He could not have written this letter if he _____ heard the news.
(A) Had not (B) Would have
(C) Shall had (D) Will have
65. Their intention _____ suspicious.
(A) Were (B) Are
(C) Was (D) Look

Identify the part of the sentence that contains an error, if there is no error, Choose "No error" option.

66. She (A)/ replied that (B)/ she feel better. (C)/ No error (D).
67. She is (A)/more prettier than her (B)/friend Sheela (C)/No error (D)

68. She regards (A) negotiating prices with customers (B) as her special preserve. (C) No error. (D).
69. She reluctantly said that /(A) if nobody else was doing it /(B) she will do it. /(C) No error.(D).
70. Sheela has scored a first class (A) / in her final exams, (B) / isn't it ? (C) / No error (D).

Choose the pair that has the similar relationship with that of the question pair.

71. Tree: Sapling
 (A) Mountain: Rock (B) Horse: Donkey
 (C) Mammoth: Giant (D) Hut: Mansion
72. Laboratory: Germs
 (A) School: Students (B) Playground: Games
 (C) Library: Books (D) Observatory: Planets
73. Visitor: Welcome
 (A) Beggar: Hungry (B) Worship: God
 (C) Criminal: Prosecute (D) Warrior: Conquer

Rearrange the following sentences to form a coherent paragraph.

74. P. He was bone-weary and soul-weary, and found himself muttering, - Either I can't manage. this place, or it's unmanageable.
 Q. To his horror, he realized that he had become the victim of an amorphous, unwitting, unconscious conspiracy to immerse him in routine work that had no significance.
 R. It was one of those nights in the office when the office clock was moving towards four in the morning and Bennis was still not through with the incredible mass of paper stacked before him.
 S. He reached for his calendar and ran his eyes down each hour, half-hour, and quarter-hour, to see where his time had gone that day, the day before, the month before.
 (A) PQRS (B) RPQS
 (C) QSRP (D) SRQP
75. P. The likelihood of an accident is determined by how carefully the motorist drives and how carefully the pedestrian crosses the street.
 Q. An accident involving a motorist and a pedestrian is such a case.
 R. Each must decide how much care to exercise without knowing how careful the other is.
 S. The simplest strategic problem arises when two individuals interact with each other, and each must decide what to do without knowing what the other is doing.
 (A) PQRS (B) PSRQ
 (C) SQRP (D) SQPR

Read the passage and answer the questions that follow.

Government aid is urgently needed to help cities build all kinds of waste-treating facilities. Above all, man should strive to contain natural decay by "recycling" or "re-using" as much waste as possible. Magnetic extractors in incinerators could do an excellent service by using materials that disappear fast. The perfect container is the edible ice-cream cone.

To cut air pollution, a Japanese process can be used to convert ash into cinder blocks. Recovering waste at the source is almost always cheaper than clearing it later. Take Sulphur, for example, which is in short supply round the world. Wasted sulphur dioxide belched from smokestacks could be trapped in the stack and converted to sulphuric acid or even fertilizer.

We can be sure that just as technology has polluted the land, it can also depollute it. The real question is whether enough people want to take action. The trouble with modern man is that he tends to be bored by the news that pesticides are threatening remote penguins or pelicans. The false assumption that nature exists only to serve man is the root of an ecological crisis – a crisis that ranges from the lowly litter-bug to the madness of nuclear proliferation. At this hour, man's only choice is to live in harmony with nature, not conquer it.

76. The best way man can solve pollution is to _____.
(A) make very long-lasting containers for goods (B) burn as much waste as possible
(C) re-use as much waste as possible (D) dump wastes into the sea
77. An edible ice-cream cone is the perfect container because _____.
(A) it has a pleasant taste (B) it can be completely used
(C) it can be used again and again (D) of its cone shape
78. It is usually cheaper to _____.
(A) recover waste at source (B) recover waste after the product has been used
(C) reduce incineration (D) use mechanical devices for conserving waste
79. A suitable title for the passage would be:
(A) Waste Treatment (B) Air Pollution
(C) Depollution (D) In Harmony with Nature
80. The writer of the article could be _____.
(A) a journalist (B) an environmentalist
(C) a technologist (D) a biologist

* * * * *

WORK SHEET