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MICA Admissions Test (MICAT) for PGPCM (2008-2010)

Name : _____

MICA Form No. : _____

Centre : _____ **Date :** _____ **2008**

Signature of the Invigilator **Signature of the candidate**

Instructions :

This test booklet is divided into five sections- **A, B, C, D & E.** Each section contains different types of questions. **Please, read the instructions carefully, before you start responding to questions in any section.**

Section A ,B, C & D contain multiple choice questions. **You are being given a separate answer sheet to mark your answers for section A through D. You have to blacken your answer by using HB pencil.** If you have to change your answer, then erase your present answer completely and blacken you new answer choice.

Section E contains four questions. You have to write your answer in the space provided below each question. Use ballpoint pen or any other type of ink-pen to write your answers

Each section has been allotted a time-limit as given below. It is advised that you complete the section within the time limit. However, if you are able to finish all the questions in a section before time, you may proceed to the next section.

Section A - 10 minutes
Section B - 10 minutes
Section C - 25 minutes
Section D - 15 minutes
Section E - 30 minutes

THE TOTAL DURATION OF THE TEST IS ONE HOUR THIRTY MINUTES ONLY.
ALL QUESTIONS ARE COMPULSORY

SECTION - A (10 minutes)

There are thirty problems in this section. Each problem consists of four clues and against that set of four clues, five alternatives are given. These alternatives are associated with either one or more than one clues in some manner. Amongst all these five alternatives, there is only one alternative that is associated with all of the four clues in some manner. This alternative is the right answer. Your task is to mark the right answer from among the alternatives given.

For example in the sample problem, alternative A "mind" is related to all the four clues as follows: (i) mind blowing (ii) mindset (iii) out of mind and (iv) mind and brain are used interchangeably. In that case, you have to encircle the alternative (B).

	Clues		Alternatives
	(i) Blowing	(A)	Rind
	(ii) Set	(B)	Mind
	(iii) Out	(C)	Wind
	(iv) Brain	(D)	Get
		(E)	Sight

	Clues		Alternatives
1.	(i) Temperate	(A)	Warm
	(ii) Cool	(B)	Wave
	(iii) Tepid	(C)	Grassland
	(iv) Sun	(D)	Care
		(E)	Moon
2.	(i) Sheet	(A)	Metal
	(ii) Coat	(B)	Sheep
	(iii) Ban	(C)	Blanket
	(iv) Cover	(D)	Electric
		(E)	Soldier
3.	(i) Stem	(A)	Leaf
	(ii) Boot	(B)	Lid
	(iii) Nose	(C)	Trunk
	(iv) Case	(D)	Tiger
		(E)	Shoe
4.	(i) Wheat	(A)	Rice
	(ii) Flood	(B)	Card
	(iii) Lemon	(C)	Field
	(iv) Cash	(D)	Hit
		(E)	Cricket

	Clues	Alternatives
5.	(i) Walk	(A) Win
	(ii) Score	(B) Run
	(iii) Muscle	(C) Finish
	(iv) Sun	(D) Pain
		(E) Gases
6.	(i) Over	(A) Break
	(ii) Promise	(B) Green
	(iii) Blue	(C) Moon
	(iv) Rock	(D) Vow
		(E) Finished
7.	(i) Come	(A) Leave
	(ii) Absence	(B) Presence
	(iii) Deny	(C) Participate
	(iv) Stay	(D) Allow
		(E) Disappear
8.	(i) Abstract	(A) Finance
	(ii) Integrity	(B) Honesty
	(iii) Policy	(C) Concrete
	(iv) Deceit	(D) Truthful
		(E) Lie
9.	(i) Instruct	(A) Away
	(ii) Responsibility	(B) Move
	(iii) Take	(C) Danger
	(iv) Towards	(D) Give
		(E) Charge
10.	(i) End	(A) Chimney
	(ii) Exhauast	(B) Start
	(iii) Bag	(C) Thing
	(iv) Pipe	(D) Fag
		(E) Fire
11.	(i) Potential	(A) Latent
	(ii) Container	(B) Promise
	(iii) Report	(C) Ship
	(iv) Seal	(D) Can
		(E) Ocean

	Clues	Alternatives
12.	(i) Draft	(A) Treaty
	(ii) Rely	(B) Army
	(iii) Border	(C) Bank
	(iv) Local	(D) News
		(E) Force
13.	(i) Eyes	(A) Money
	(ii) Free	(B) Distance
	(iii) Hair	(C) Secret
	(iv) Safe	(D) Air
		(E) Lock
14.	(i) Curve	(A) Balloon
	(ii) Sail	(B) Wind
	(iii) Gas	(C) Glory
	(iv) Fall	(D) Boat
		(E) Raid
15.	(i) Satin	(A) Rose
	(ii) On feet	(B) Incense
	(iii) Rebellion	(C) Perfume
	(iv) Fragrance	(D) Revolution
		(E) Invention
16.	(i) Fee	(A) Help
	(ii) Salute	(B) Tax
	(iii) Unbalance	(C) Tip
	(iv) Advice	(D) Tank
		(E) Bend
17.	(i) Lamb	(A) Vegetable
	(ii) Look	(B) Sea
	(iii) Knife	(C) Kill
	(iv) Go	(D) Sheep
		(E) Run
18.	(i) Polish	(A) Salvation
	(ii) Sin	(B) Apple
	(iii) Pie	(C) Chart
	(iv) Eye	(D) Potato
		(E) Shoe

	Clues	Alternatives
19.	(i) Cash	(A) Soft
	(ii) Hard	(B) Word
	(iii) Type	(C) Water
	(iv) Person	(D) Flow
		(E) Kind
20.	(i) Cloth	(A) Merchant
	(ii) Window	(B) Blind
	(iii) Eye	(C) Woman
	(iv) Man	(D) Surgeon
		(E) Open
21.	(i) Dress	(A) Wedding
	(ii) Cow	(B) Tie
	(iii) Marriage	(C) Shed
	(iv) Responsibility	(D) Calf
		(E) Ceremony
22.	(i) Measure	(A) Mile
	(ii) Standard	(B) Front
	(iii) Car	(C) Oil
	(iv) Enclosure	(D) Engine
		(E) Yard
23.	(i) Case	(A) Toe
	(ii) Nail	(B) Word
	(iii) Life	(C) Show
	(iv) Document	(D) File
		(E) Court
24.	(i) Out	(A) Shell
	(ii) Eye	(B) Drop
	(iii) Cloth	(C) Seat
	(iv) Dish	(D) Merchant
		(E) Wash
25.	(i) Eye	(A) Cone
	(ii) Shape	(B) Pop
	(iii) Corn	(C) Pupil
	(iv) Funnel	(D) Oil
		(E) Ball

	Clues		Alternatives
26.	(i) Knowledge	(A)	News
	(ii) Print	(B)	Book
	(iii) Seat	(C)	Politics
	(iv) Crime	(D)	Wisdom
		(E)	Ink
27.	(i) Pillow	(A)	Fight
	(ii) Hospital	(B)	Case
	(iii) Present	(C)	Logic
	(iv) Evidence	(D)	Support
		(E)	Gift
28.	(i) Bird	(A)	Imagination
	(ii) Steps	(B)	Eggs
	(iii) Air	(C)	Follow
	(iv) Fantasy	(D)	Flight
		(E)	Oxygen
29.	(i) Hair	(A)	Crop
	(ii) Problem	(B)	Fall
	(iii) Water	(C)	White
	(iv) Storage	(D)	Space
		(E)	Solution
30.	(i) Ocean	(A)	Current
	(ii) Body	(B)	Temperature
	(iii) Back	(C)	Sack
	(iv) Sand	(D)	Sea
		(E)	Palm

SECTION – B (10 minutes)

All of us deal with different situations, in our daily life, in our own ways. The objective of this section is to know how you deal with your life. There are two options in each item, (a) and (b). Your task is to choose the option which is more descriptive of you and mark in the OMR sheet.

For example, if (a) is more descriptive of you then mark (a) and if (b) is more descriptive of you then mark (b). There is no right or wrong answer.

Please keep in mind the following:

1. *Choose the item on the basis of* ***how well it describes your behaviour****.*
2. ***Do not choose an*** *item indicating about yourself* ***as you would like to be*** *or as* ***others want you to be****.*
3. *Please choose the option truthfully after* ***careful reading but do not*** *take too much time on a particular item.*

SNo		Statements
1.	(A)	I systematically follow a schedule of self-improvement.
	(B)	I find that self-improvement is difficult to work at regularly.
2.	(A)	I plan to seek out new friendships and to develop my capabilities for being a good friend.
	(B)	I hope to have new friendships and develop my capabilities for being a good friend but I generally would not work regularly at it.
3.	(A)	I am not in favour of planning but I do like new tasks, new people and new experiences when I encounter them.
	(B)	I enjoy new tasks, new people and new experiences so I plan my life to give myself these things.
4.	(A)	I generally prefer to live my life as I go ahead.
	(B)	I usually think ahead and organize my thoughts and ideas about future situations.

5. (A) In new situations, I look for the kind of personal relationships that I want.

(B) In new situations, I usually let other people indicate the kind of personal relationships they would want to have with me.

6. (A) I look for all possibilities that will help me improve my career goals.

(B) I put forth efforts to improve my career goals , but do not go much out of my way

7. (A) I generally do not give much thought in planning my life in terms of what I can handle.

(B) I generally organize my life in terms of what I think I can handle.

8. (A) I search for information which could help me in assessing people.

(B) I do not think one should assess people as all individuals have unique talents.

9. (A) I generally approach work and other tasks so that I can get them done without becoming worried or upset in the process.

(B) In my work and other tasks, I get them done but in the process, I tend to get so involved that I often get worried and upset.

10. (A) When I am unable to solve a problem, I accept help if others offer it , but I don't really look for it.

(B) When I am unable to solve a problem, I seek out others who can help me.

11. (A) I generally take help of events and people to direct the course of my life.

(B) I generally follow my own course as a person.

12. (A) If I am in charge of a project, I find it easier to do my part than to get things done from other people but I manage.

(B) If I am in charge of a project, I generally manage to get things done from other people in the way I want.

13. (A) I master new tasks when they are assigned to me, but I don't really go out of my way to seek new tasks.

(B) I tend to look for new tasks and enjoy the challenge of mastering them.

14. (A) I value my independence; however, I often prefer to go along with others.

(B) It is important to me to keep my independence, even when I am with others.

15. (A) I usually make a real effort in maintaining close friendships.

(B) I like close friendships but I usually do not put extra effort in making them work.

16. (A) When I do something really difficult, I generally do not feel its worth all the effort although I get satisfaction when I complete it..

(B) I think its fun to do really difficult things, and I put in effort even though I may not get as much satisfaction after completing them.

17. (A) As long as my life is going along alright it doesn't really matter much whether or not I am taking all my life decisions.

(B) I get a sense of real satisfaction when I take my own decisions about my life.

18. (A) When I have displeased myself or others, I think its up to me to try to straighten things out.

(B) When I have displeased myself or others, I don't think it matters who straightens things out.

19. (A) When I take on a job or an assignment, it doesn't really matter a great deal whether I carry it through my way or someone else's.

(B) When I take on a job or an assignment, I like to carry through it in my way.

20. (A) In my relations with friends, I find that I can give and receive comfortably.

(B) I enjoy my friendships, but sometimes giving and taking is a strain.

21. (A) When I have personal problems, I sometimes get upset before I reach a decision.

(B) When I have personal problems, I usually work them out without getting very upset.

22. (A) When I have to part with friends, because I am going to move or making a change in my life, I hate to leave my old friends but can usually enjoy finding new friends.

(B) When I have to part with friends, because I am going to move or making a change in my life, I usually get very upset over leaving my old friends and anxious when I think of making new friends

23. (A) When I don't do as well as I expect at something , I usually turn to some other job, without getting too upset

(B) When I don't do as well as I expect at something, my disappointments make it somewhat difficult to pick up something else to do.

24. (A) Life's victory and defeats offer me a time to reevaluate myself, but looking at myself tends to sadden me.

(B) Life's victory and defeats offer me a time to reevaluate myself, and I tend to take a look at myself fairly calmly.

25. (A) I often tell friends that I will do something, but then I get anxious that I will not be able to carry it through as well as I should.

(B) I often tell friends that I will do something, and I usually carry through on it without worrying much.

26. (A) Thinking about the work that I have to do helps me to get it done without feeling upset.

(B) I have to be careful not to think about the work that I have to do or I will get worried and not get as much done.

SECTION – C (25 minutes)

DIRECTIONS for questions 1 to 5: In each of the following sentences, parts of the sentences have been left blank. Beneath each sentence four different ways of completing the sentence are indicated. From among the given choices choose the best alternative.

1. Ethics is closer to wisdom than to reason, closer to _____ what is good than to correctly _____ particular situations.

(A) dissimilating... assimilating

(B) distinguishing... absorbing

(C) disorganizing... appreciating

(D) understanding... adjudicating

2. There are strong indications that within the loose _____ of sciences dealing with knowledge and cognition – the cognitive sciences – the conviction is slowly growing that this picture is upside down and that a radical paradigm shift is _____.

(A) unity... imperative

(B) federation... imminent

(C) organicity... important

(D) community... indicative

3. Obviously it is not _____ true, but it seems a clear indication that guilt (not revenge) was the fuel of Orson Welles's psyche, although it is certainly possible that guilt bred a degree of _____.

(A) literally ... resentment

(B) positively... therapy

(C) inherently... anguish

(D) genetically... agility

4. Merely acting in a film was clearly regarded by Orson Welles and his team as a dire _____: how could he, who had done every job on a movie, simply take _____ from some lesser mortal?

(A) statement... information

(B) injury... indication

(C) demotion... direction

(D) insinuation... injection

5. The _____ of half-completed thoughts, which come sometimes as we are falling asleep, also cannot be _____.

(A) aspiration... isolated

(B) anomaly... computed

(C) objection... fractioned

(D) annoyance... multiplied

DIRECTIONS for question 6 to 10: For each of the highlighted words below, a contextual usage is provided. Pick the word from the alternatives given that is most appropriate in the given context.

6. **Think:** Just as the popular imagination envisions, the computer thinks by means of dispassionate, logical calculation.

(A) operates

(B) intuits

(C) objectifies

(D) rationalizes

7. **Marriage**: Plato's characterization of creation as a marriage of reason and necessity applies to all human technology.

(A) contract

(B) union

(C) communion

(D) communism

8. **Rigorous:** No philosopher has yet produced a rigorous proof for or against the existence of God that could satisfy more than a fraction of his colleagues.

(A) defensible

(B) negative

(C) intuitive

(D) indirect

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9. **Material:** The steam locomotive symbolized linear progress in an age that knew no material limits, when men and women had only to push ahead with larger, faster, more powerful machines.

(A) tenuous

(B) tenable

(C) tenacious

(D) tangible

10. **Tradition:** In a culture as thoroughly and complexly oral as Greek culture, the alphabet could take root only by allying itself, at first, with the oral tradition.

(A) texts

(B) gossip

(C) practices

(D) code

DIRECTIONS for questions 11 to 15: In the questions below a sentence is given followed by four different ways of phrasing the same sentence. Choose the most grammatically and semantically correct alternative.

11. Medieval culture perhaps remained closer to the ancient world in its attitude toward language than in its attitude toward space, time or history.

(A) Medieval culture has remained close to the ancients in its theory of language

(B) Medieval culture has stayed closer to the ancient world in its attitude to time and history

(C) Medieval culture has remained loyal to modernity in its theory of knowledge

(D) Medieval culture has stayed close to the ancient as a theory of memory

12. At the very heart of the power relationship, and constantly provoking it, are the recalcitrance of the will and the intransigence of freedom.

(A) The power relationship is based on a dialectics of will and technology

(B) The power relationship has a heart whose soul is freedom

(C) The power relationship is based on a dialectic of will and freedom

(D) The power relationship is based on a contradiction of will and freedom

13. Upwards continuity means that a person who wishes to govern the state well must first learn how to govern himself.

(A) Upward continuity means that a person who seeks to govern must comprehend the responsibility of the state

(B) Upward continuity means that a person who seeks to govern must be cybernetic to violence

(C) Upward continuity means that a person who seeks to govern must be sovereign

(D) Upward continuity means that a person who seeks to govern must know self-governance

14. A Turing machine is a game in which no room is left for player initiative.

(A) A Turing machine is a structured game with no agency

(B) A Turing machine is a zero-sum game

(C) A Turing machine is a meaningless game

(D) A Turing machine is a predictable game with no surprise

15. The technologists of the twentieth century share the goals of their predecessors: to make the world of nature serve the material needs and desires of mankind.

(A) The technologists of the twentieth century were unlike their predecessors in their materialism

(B) The technologists of the twentieth century were like their ancestors in making nature serve man's material needs

(C) The technologists of the twentieth century were like their predecessors in being nature lovers

(D) The technologists of the twentieth century were ignorant of their predecessors need

DIRECTIONS for questions 16 to 20: Each of the following questions has a paragraph from which the last sentence has been deleted. From the given options, choose the one that completes the paragraph in the most appropriate way.

16. In the 1980s, Alan Kay declared that, "technology is anything that wasn't around when you were born." In other words, what is perceived as technology to adults is often ubiquitous if not invisible to youth. In telling this story, Mary's mother was perplexed by the technology choices made by her daughter. Yet, most likely, Mary saw her steps in a practical way: research, test out, get feedback, purchase. Her choices were to maximize her options, make a choice that would be socially accepted, and purchase the dress at the cheapest price.

(A) Her steps were about decisions and technology and how to make them

(B) Her steps were not about maximizing technology, but about using it to optimize what she did care about.

(C) Her steps were about choices in technology and how to instrumentalize them

(D) Her steps were about decisions on how to make choices for the future

17. What is truth? A mobile army of metaphors, metonyms, and anthropomorphisms—in short, a sum of human relations which have been enhanced, transposed, and embellished poetically and rhetorically, and which after long use seem firm, canonical, and obligatory to a people: truths are illusions about which one has forgotten that this is what they are; metaphors which are worn out and without sensuous power; coins which have lost their pictures and now matter only as metal, no longer as coins.

(A) Truth is a cliché which hides old truths with new power

(B) Truth is a difficult metaphor

(C) Truth is a sensuous language

(D) Truth is a text that needs to be unraveled

18. We must lose our sense of remoteness and severity in setting out on this exploration of ideal commonwealths, as some of the fine minds of the past have pictured them. Our ideals are not something that we can set apart from the main facts of our existence, as our grandmothers sometimes set the cold, bleak, and usually moldy parlor apart from the living rooms of the house: on the contrary, the things we dream of tend consciously or unconsciously to work themselves out in the pattern of our daily lives. Our utopias are just as human and warm and jolly as the world out of which they are born. Looking out from the top of a high tenement, over the housetops of Manhattan, I can see a pale tower with its golden pinnacle gleaming through the soft morning haze; and for a moment all the harsh and ugly lines in the landscape have disappeared.

(A) The old still is continuous with the new

(B) Utopias are too unreal for real life

(C) Utopias are things to avoid in real life

(D) So in looking at our utopias, we need not abandon the real world in order to enter these realizable worlds; for it is out of the first that the second are always coming.

19. It is a crisis of mind. It's a case of wake up or die. We have the whole nightmare-history of political revolutions against bloody regimes; replacing them by still more bloody regimes, to teach us that *that* is not the way out. The only way out is a spiritual, intellectual, and emotional revolution in which we learn to experience as biological facts, first-hand, the interlooping connections between person to person, organism and environment, action and consequence – when we are able to talk a language that includes the context in each thought.

(A) The crisis of language is the crisis of meaning

(B) Our present language is too formal

(C) Our present language excludes context

(D) The crisis of language still has not been understood

20. For example, I ask my four-year-old stepson to hold his glass of milk with two hands; he does not follow my instructions, and he spills the milk. I call his attention to the fact that he did not follow my instructions. When he responds with, "I didn't follow the rules!" I know he and I are not communicating at the same logical level. My experience was that I wanted to discuss a specific incident in which he didn't follow my instructions and he spilled his milk as a result. His experience was that he seemed to be struggling with an abstract concept of "rules."

(A) Children find it difficult to follow instructions

(B) Children find psychologists very difficult

(C) Children find instructors difficult to follow

(D) Ideally, children's experience helps them learn to make those distinctions.

DIRECTIONS for questions 21 to 25: The passage given below is followed by a set of five questions. Choose the most appropriate answer to each question

In some remote corner of the universe, poured out and glittering in innumerable solar systems, there once was a star on which clever animals invented knowledge. That was the highest and most mendacious minute of "world history"—yet only a minute. After nature had drawn a few breaths the star grew cold, and the clever animals had to die.

One might invent such a fable and still not have illustrated sufficiently how wretched, how shadowy and flighty, how aimless and arbitrary, the human intellect appears in nature. There have been eternities when it did not exist; and when it is done for again, nothing will have happened. For this intellect has no further mission that would lead beyond human life. It is human, rather, and only its owner and producer gives it such importance, as if the world pivoted around it. But if we could communicate with the mosquito, then we would learn that he floats through the air with the same self-importance, feeling within itself the flying center of the world.

It is strange that this should be the effect of the intellect, for after all it was given only as an aid to the most unfortunate, most delicate, most evanescent beings in order to hold them for a minute in existence, from which otherwise, without this gift, they would have every reason to flee as quickly as Lessing's son. [In a famous letter to Johann Joachim Eschenburg (December 31, 1778), Lessing relates the death of his infant son, who "understood the world so well that he left it at the first opportunity."]

The intellect, as a means for the preservation of the individual, unfolds its chief powers in simulation; for this is the means by which the weaker, less robust individuals preserve themselves, since they are denied the chance of waging the struggle for existence with horns or the fangs of beasts of prey. In man this art of simulation reaches its peak. They are deeply immersed in illusions and dream images; their eye glides only over the surface of things and sees "forms"; their feeling nowhere lead into truth, but contents itself with the reception of stimuli, playing, as it were, a game of blindman's buff on the backs

of things. Moreover, man permits himself to be lied to at night, his life long, when he dreams, and his moral sense never even tries to prevent this—although men have been said to have overcome snoring by sheer will power.

What, indeed, does man know of himself! Can he even once perceive himself completely, laid out as if in an illuminated glass case? Does not nature keep much the most from him, even about his body, to spellbind and confine him in a proud, deceptive consciousness, far from the coils of the intestines, the quick current of the blood stream, and the involved tremors of the fibers? She threw away the key; and woe to the calamitous curiosity which might peer just once through a crack in the chamber of consciousness and look down, and sense that man rests upon the merciless, the greedy, the insatiable, the murderous, in the indifference of his ignorance—hanging in dreams, as it were, upon the back of a tiger. In view of this, whence in all the world comes the urge for truth?

Insofar as the individual wants to preserve himself against other individuals, in a natural state of affairs he employs the intellect mostly for simulation alone. But because man, out of need and boredom, wants to exist socially, herd-fashion, he requires a peace pact and he endeavors to banish at least the very crudest bellum omni contra omnes (war of all against all) from his world. This peace pact brings with it something that looks like the first step toward the attainment of this enigmatic urge for truth. For now that is fixed which henceforth shall be "truth"; that is, a regularly valid and obligatory designation of things is invented, and this linguistic legislation also furnishes the first laws of truth: for it is here that the contrast between truth and lie first originates. The liar uses the valid designations, the words, to make the unreal appear as real; he says, for example, "I am rich," when the word "poor" would be the correct designation of his situation. He abuses the fixed conventions by arbitrary changes or even by reversals of the names. When he does this in a self-serving way damaging to others, then society will no longer trust him but exclude him. Thereby men do not flee from being deceived as much as from being damaged by deception: what they hate at this stage is basically not the deception but the bad, hostile consequences of certain kinds of deceptions.

21. The human intellect obtains its power

(A) because it is evolutionarily desirable

(B) because it is arbitrary and inventive

(C) because of the importance given to it by men

(D) for none of the above reasons

22. The intellect acts by simulation so that

(A) it can help man to see the lessons of the past

(B) it exemplifies itself as virtual reality

(C) it can create new forms of knowledge

(D) one can avoid the war of all against all

23. Man lies to himself, deceives himself

(A) when he argues falsely

(B) when he dreams at night

(C) when he moralizes

(D) when he talks to himself

24. The liar violated the truth by

(A) distorting fixed conventions

(B) by not sticking to facts

(C) being poetic in his conversation

(D) by thinking he can deceive other easily

25. Lessing's on left the world

(A) because he disliked his father

(B) because he was ignorant of it

(C) because he knew it well

(D) because he was like his father

SECTION – D (15 minutes)

Using the following information answer questions 1- 4.

8 friends, 'A', 'B', 'C', 'D', 'E', 'F', 'G' and 'H' go to see a movie. They get seats B5 to B12, of which B5 is an aisle seat. 'B', 'F' and 'G' don't want the aisle seat. E sits two seats away from 'F', but next to 'D'; 'C' sits to the right of 'H', but to the left of 'B'. 'D', 'G' and 'A' sit together such that 'A' is between 'D' and 'G'. 'F' and 'B' don't want to sit together.

1. Who is sitting on the aisle seat?

(A) H

(B) E

(C) D

(D) B

2. Who is sitting between 'H' and 'C'?

(A) A

(B) G

(C) B

(D) F

3. Which two are not sitting together?

(A) F and C

(B) B and D

(C) E and D

(D) A and G

4. Which two are occupying the 2 middle seats?

(A) E and D

(B) C and B

(C) B and E

(D) F and C

5. A monkey climbing a coconut tree - 35 feet tall, climbs 3 feet in each jump, but slips 1.5 feet back. When the monkey rests for 1 minute, it can jump 4 feet high. If the monkey rests for 5 minutes in all, in how many jumps will it reach the tree top?

(A) 24 jumps

(B) 19 jumps

(C) 20 jumps

(D) 25 jumps

Using the following data answer questions 6 - 8.

A man swimming downstream covers a distance of 5 km in one hour. He is overtaken by a boat, which is also moving downstream. As the man continues to swim he can see the boat for 6 minutes and up to a distance of 400 meters.

6. What is the distance covered by the boat in one hour?

(A) 12 km

(B) 15 km

(C) 10 km

(D) 9 km

7. Had the man spotted the boat at a distance of 400 meters, moving upstream towards him; calculate the speed of the stream, if the boat crosses him in 3 minutes.

(A) 12 km/hr

(B) 15 km/hr

(C) 10 km/hr

(D) 3 km/hr

8. What is the actual speed of the boat and the man?

(A) Boat – 5 km/hour; Man – 9 km/hour

(B) Boat – 8 km/hour; Man – 12 km/hour

(C) Boat – 6 km/hour; Man – 2 km/hour

(D) Boat – 3 km/hour; Man – 6 km/hour

9. A railway half ticket costs half the full fare and the reservation charge is the same on half ticket as on full ticket. One reserved half ticket from Mumbai to Pune costs Rs.216/- and one full and one half reserved first class tickets cost Rs.327/-. What is the basic first class full fare and what is the reservation charge?

(A) Rs.105 and Rs.6

(B) Rs.216 and Rs.6/12

(C) Rs.210 and Rs.12

(D) Rs.210 and 6

10. There are 14 yes or no questions. How many ways can these be answered?

(A) 8192

(B) 16384

(C) 28

(D) 4096

11. Roshni wins twice as often as she loses. What is the probability that in the next 5 racing competitions there will be four wins?

(A) $5(2/3)^4$

(B) $5(1/3)^4$

(C) $(2/3)^4(-1/3)$

(D) $5\left[(2/3)^4\right](1/3)$

12. The payment for one maid for a year is Rs.6000/- plus a gift. The maid leaves after 9 months and received Rs.4200/- and the gift. What is price of the gift?

(A) Rs.1200/-

(B) Rs.300/-

(C) Rs.800/-

(D) Rs.1000/-

13. The angle of elevation of the top of a hoarding 60 meters high, from two points on the level ground on its opposite sides are 45 degrees and 60 degrees. What is the distance between the two points?

(A) 94.64 m

(B) 60 m

(C) 34.64 m

(D) 105 m

14. Among the total two parties, 'X' and 'Y' that contested for election, Party 'X' secured 20% of the total votes more than Party 'Y'. If Party 'Y' got 1,20,000 votes, by how many votes did it lose the election?

(A) 24,000

(B) 60,000

(C) 3,00,000

(D) 1,80,000

15. The denominator of a fraction is greater than its numerator by 10. If 6 is added to both of its numerator and denominator it becomes 3/4. Determine the fraction.

(A) 25/36

(B) 24/34

(C) 2/3

(D) 11/8

16. Five years ago John was three times as old as Kay. Three years from now, John will be only twice as old as Kay will be. Find the present age of each person.

(A) John is 29 and Kay is 13

(B) John is 36 and Kay is 16

(C) John is 28 and Kay is 12

(D) John is 30 and Kay is 14

Using the following information answer questions 17 – 21.

Assuming hardness of iron to be 100, the relative hardness of different metals is as given below:

Zinc 18; Aluminum 36; Copper 84; Chromium 170; Platinum 75800

17. To make an alloy 100 times as hard as copper, how many units of iron needs to be added to platinum?

(A) 900
(B) 0.900
(C) 9.00
(D) 90.00

of 1:2:3 shall be harder than iron by _____ many times?

(A) 1
(B) 2.3
(C) 3.3
(D) 1.3

19. An alloy of three units of zinc, aluminum and copper each would be equal in hardness to how many times that of iron?

(A) 1
(B) 2
(C) 3
(D) 4

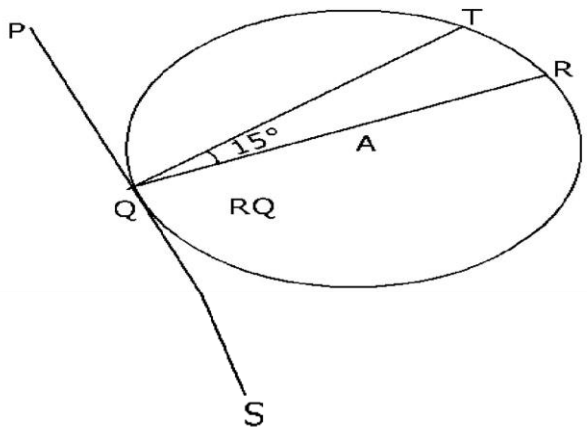
20. An alloy of aluminum and copper in a proportion of 5:20 would be harder than iron by how many times?

(A) 7
(B) 9
(C) 11
(D) 13

21. How many units of zinc added to 12 units of chromium would equal the hardness of 120 times of aluminum?

(A) 12.6
(B) 126
(C) 261
(D) 621

22. With a tangent PS to a circle with center at A and diameter QR, what is the measure of $\angle TQS$?



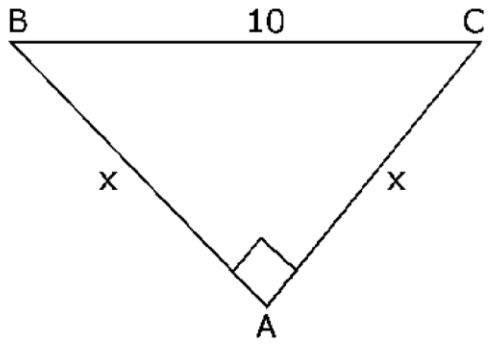
(A) 105°

(B) 125°

(C) 135°

(D) 95°

23. Find out the value of x in the triangle below:



(A) 5

(B) $5\sqrt{2}$

(C) $10\sqrt{3}$

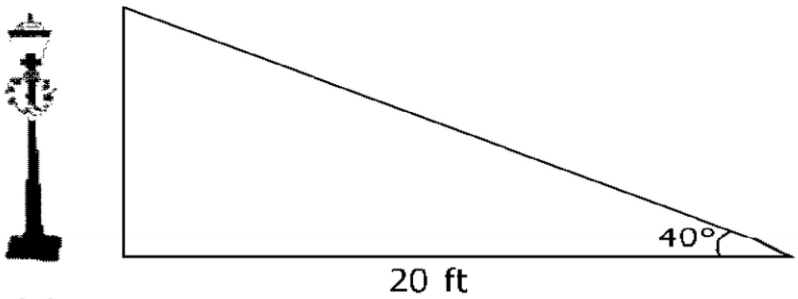
(D) $2\sqrt{5}$

24. What is the appropriate height of street lamp?

$\sin 40° \approx 0.64$

$\cos 40° \approx 0.77$

$\tan 40° \approx 0.84$



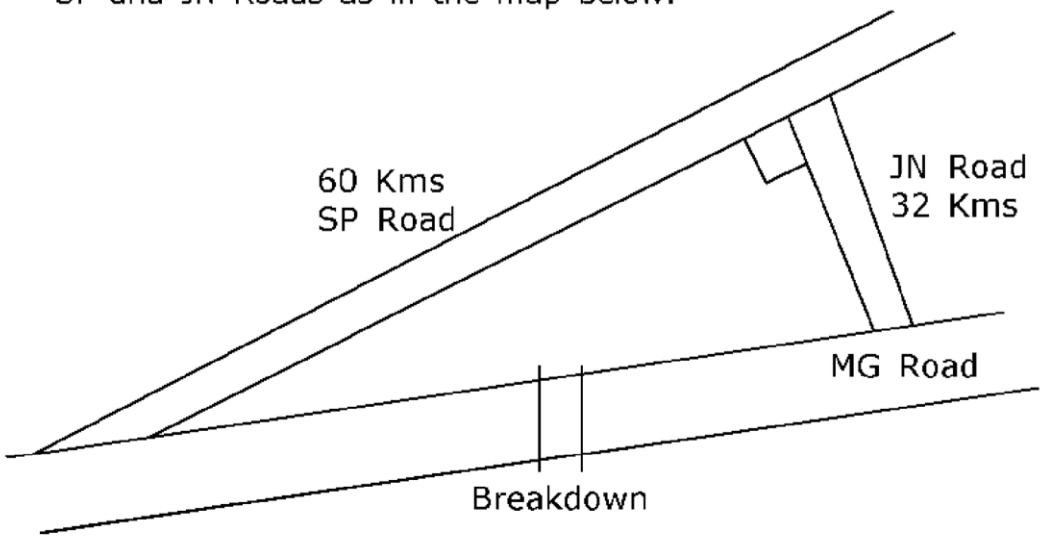
(A) 12.8

(B) 15.4

(C) 16.8

(D) 23.8

25. Due to a breakdown along MG Road, the traffic is routed through SP and JN Roads as in the map below:



How many extra kilometers will a car travel on the new route?

(A) 24

(B) 68

(C) 160

(D) 180

Name : _____ MICA Form No. : | | | | | |

SECTION – E (30 minutes)

1. Debate: Pick one side or the other.

Nano car will add to the pollution and congestion in the cities. Do you agree or disagree. Please choose one and give your reasons for it.

2. Description:

Think of any **fact**: Poverty exists. Capture it by describing it. Also carefully record the circumstances of its capture.

3. Analytical framework:

Imagine a problem. What machine would you design to solve it? Describe the features and functions you would give it. Why

4. Problem Solving:

Developing societies should not worry about climate change. It is a responsibility of advanced industrial countries

5. Please write Précis for the following write up.

Précis Writing

Thomas Kuhn's academic life started in physics. He then switched to history of science, and as his career developed he moved over to philosophy of science, although retaining a strong interest in the history of physics. In 1943, he graduated from Harvard *summa cum laude*. Thereafter he spent the remainder of the war years in research related to radar at Harvard and then in Europe. He gained his master's degree in physics in 1946, and his doctorate in 1949, also in physics (concerning an application of quantum mechanics to solid state physics). At this time, and until 1956, Kuhn taught a class in science for undergraduates in the humanities, as part of the General Education in Science curriculum, developed by James B. Conant, the President of Harvard. This course was centred around historical case studies, and this was Kuhn's first opportunity to study historical scientific texts in detail. His initial bewilderment on reading the scientific work of Aristotle was a formative experience, followed as it was by a more or less sudden ability to understand Aristotle properly, undistorted by knowledge of subsequent science.

This led Kuhn to concentrate on history of science and in due course he was appointed to an assistant professorship in general education and the history of science. During this period his work focussed on eighteenth century matter theory and the early history of thermodynamics. Kuhn then turned to the history of astronomy, and in 1957 he published his first book, *The Copernican Revolution*.

In 1961 Kuhn became a full professor at the University of California at Berkeley, having moved there in 1956 to take up a post in history of science, but in the philosophy department, which enabled him to develop his interest in the philosophy of science. At Berkeley Kuhn's colleagues included Stanley Cavell, who introduced Kuhn to the works of Wittgenstein,

and Paul Feyerabend. Shortly thereafter, in 1962, Kuhn published his *The Structure of Scientific Revolutions* in the series "International Encyclopedia of Unified Science", edited by Otto Neurath and Rudolf Carnap. The central idea of this extraordinarily influential—and controversial—book is that the development of science is driven, in normal periods of science, by adherence to what Kuhn called a 'paradigm'. The function of a paradigm is to supply puzzles for scientists to solve and to provide the tools for their solution. A crisis in science arises when confidence is lost in the ability of the paradigm to solve particularly worrying puzzles called 'anomalies'. Crisis is followed by a scientific revolution if the existing paradigm is superseded by a rival. Kuhn claimed that science guided by one paradigm would be 'incommensurable' with science developed under a different paradigm, by which is meant that there is no common measure of the different scientific theories. This thesis of incommensurability, developed at the same time by Feyerabend, rules out certain kinds of comparison of the two theories and consequently rejects some traditional views of scientific development, such as the view that later science builds on the knowledge contained within earlier theories, or the view that later theories are closer approximations to the truth than earlier theories. Most of Kuhn's subsequent work in philosophy was spent in articulating and developing the ideas in *The Structure of Scientific Revolutions*, although some of these, such as the thesis of incommensurability, underwent transformation in the process.

Although *The Structure of Scientific Revolutions* did in due course create the interest among philosophers that Kuhn had intended (and also before long among a much wider audience, making it one of the most widely read academic books of the century), it nonetheless inspired a hostile reception. Since the following of rules (of logic, of scientific method, etc.) was regarded as the *sine qua non* of rationality, Kuhn's claim that scientists do not employ rules in reaching their decisions appeared tantamount to the claim that science is irrational. This was highlighted by his rejection of the distinction between discovery

and justification (denying that we can distinguish between the psychological process of thinking up an idea and the logical process of justifying its claim to truth) and his emphasis on incommensurability (the claim that certain kinds of comparison between theories is impossible). The negative response among philosophers was exacerbated by an important naturalistic tendency in *The Structure of Scientific Revolutions* that was then unfamiliar. A particularly significant instance of this was Kuhn's insistence on the importance of the history of science for philosophy of science. The opening sentence of the book reads: "History, if viewed as a repository for more than anecdote or chronology, could produce a decisive transformation in the image on science by which we are now possessed" (1962/1970, 1). Also significant and unfamiliar was Kuhn's appeal to psychological literature and examples (such as linking theory-change with the changing appearance of a Gestalt image).

In 1964 Kuhn left Berkeley to take up the position of M. Taylor Pyne Professor of Philosophy and History of Science at Princeton University. In the following year an important event took place which helped promote Kuhn's profile among philosophers. An International Colloquium in the Philosophy of Science was held at Bedford College, London, which was intended to include a debate between Kuhn, Paul Feyerabend, and Imre Lakatos. As it was, Feyerabend and Lakatos did not attend and the papers delivered focussed on Kuhn's work. Furthermore a discussion between Kuhn and Sir Karl Popper in which their viewpoints were compared and contrasted helped illuminate the significance of Kuhn's approach. These papers, along with contributions from Feyerabend and Lakatos, were published several years later, in *Criticism and the Growth of Knowledge*, edited by Lakatos and Alan Musgrave (1970). In the same year the second edition of *The Structure of Scientific Revolutions* was published, including an important postscript in which Kuhn clarified his notion of paradigm and for the first time explicitly gave his work an anti-realist element by denying the coherence of the idea that theories could be regarded as more or less close to the truth.

A collection of Kuhn's essays in the philosophy and history of science was published in 1977, with the title *The Essential Tension* taken from one of Kuhn's earliest essays in which he emphasizes the importance of tradition in science. The following year saw the publication of his second historical monograph *Black-Body Theory and the Quantum Discontinuity*, concerning the early history of quantum mechanics. In 1983 he was named Laurence S. Rockefeller Professor of Philosophy at MIT. Kuhn continued throughout the 1980s and 1990s to work on a variety of topics in both history and philosophy of science, including the development of the concept of incommensurability, and at the time of his death in 1996 he was working on a second philosophical monograph dealing with, among other matters, an evolutionary conception of scientific change and concept acquisition in developmental psychology.(1136)

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Q. No.	Maximum Marks	Marks Obtained
1		
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Total		