SYLLABUS AND INFORMATION ABOUT THE TEST

GENERAL INFORMATION: The test is designed to measure the candidate's ability to think systematically, to use the verbal and mathematical skills and to assess his/her aptitude for admission into MBA/MCA programme. The Test emphasizes accuracy. Therefore, the candidate is required to go through the instructions carefully. This is an objective type test and the questions are of multiple choice. Out of the given options, the candidate has to choose the correct answer. If the Candidate gives more than one answer to any question, such answers will be ignored while awarding marks.

PATTERN OF THE TEST: The test consists of 200 questions of one mark each in the following topics.

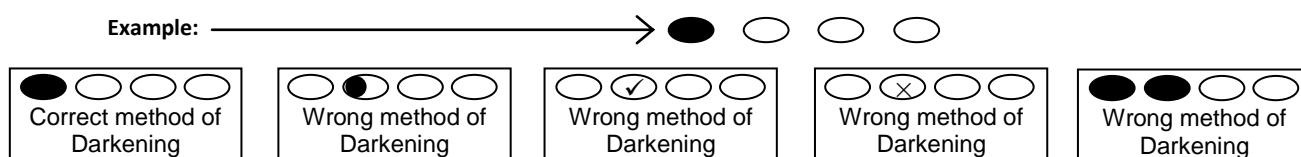|	No. of Questions	
Section-A: Analytical Ability		
(i) Data Sufficiency	20	**Duration of**
(ii) Problem Solving	55	**The Test :**
Section-B: Mathematical Ability		
(i) Arithmetical Ability	35	**2 1/2 Hours**
(ii) Algebraical and Geometrical Ability	30	
(iii) Statistical Ability	10	
		(150 minutes)
Section-C: Communication Ability		
(i) Vocabulary	10	
(ii) Business and Computer Terminology	10	
(iii) Functional Grammar	15	
(iv) Reading Comprehension	15	
Total	**200**	

I. IMPORTANT INSTRUCTIONS TO CANDIDATES:

1. Candidates are directed to carry the following into the examination hall
    (a) Ball Point Pen (Blue or Black);

    Besides the items listed above, the candidate should not bring any other material including the instructions booklet, Papers, Cell Phones, etc., into the examination hall. Any candidate found in possession of any forbidden material, will be sent out of the examination hall.

2. Candidates must remain seated in their allotted places till the completion of the examination. In no case they will be allowed to leave the examination hall till the end of the examination. **Before leaving the examination hall, the candidates must return the OMR Answer Sheet and data card to the invigilator.**

3. Every candidate appearing for ICET – 2014 shall be provided with a specially designed Optical Mark Reader (OMR) answer sheet on which the candidate has to mark the answer and other relevant data. The method of marking the answers is illustrated in this section. Candidates are advised to go through the instructions given for marking the answers and other entries on the

Optical Mark Reader (OMR) answer sheet thoroughly and practice the same at their residence which should make it easy for them to answer in the examination hall.

4. The Optical Mark Reader (OMR) answer sheet should be handled carefully by the candidates. They are advised not to fold, wrinkle or tear the answer sheet under any circumstance. Further, the candidates are advised not to scribble or make any marks on the answer sheet except marking the answers and other relevant data at the appropriate place on the answer sheet. Any violation of these instructions will automatically lead to disqualification of the candidate.

5. Candidates shall note that they will not be given a second blank Optical Mark Reader (OMR) answer sheet under any circumstance. Hence they are advised to be careful while handling their answer sheet.

6. Candidates shall read carefully the instructions before starting to answer the questions.

7. The question paper booklet given to the candidate shall consist of 200 multiple choice type questions in three different sections with four responses given to each question, out of which only one response is correct for the given question. Candidates shall mark the correct answer in Optical Mark Reader (OMR) answer sheet by darkening the appropriate circle with **Ball Point Pen only (Blue/ Black).**

II. Instructions to fill up OMR answer sheet:

1. Follow the Instructions given on the OMR answer sheet. Fill up information and darken all the relevant circles on the OMR answer sheet carefully, otherwise your answer sheet will become invalid.

2. Use Ball Point Pen only (Blue/Black) for darkening the circles for information and answering on the answer sheet. Use Ball Point Pen wherever directed on the answer sheet to write information.

3. Please darken the most appropriate response chosen by you, only in the corresponding circle against the number corresponding to the question, you are attempting.

4. Please do not make any stray marks ELSEWHERE on the Answer Sheet, ELSE the Answer Sheet will become invalid.

Section-A: Analytical Ability: 75Q (75 Marks)

1. Data Sufficiency: 20Q (20 Marks)

A question is given followed by data in the form of two statements labeled as i and ii. If the data given in i alone is sufficient to answer the question then choice (1) is the correct answer. If the data given in ii alone is sufficient to answer the question then choice (2) is the correct answer. If both i and ii put together are sufficient to answer the question but neither statement alone is sufficient, then choice (3) is the correct answer. If both i and ii put together are not sufficient to answer the question and additional data is needed, then choice (4) is the correct answer.

2. Problem Solving   55Q (55 Marks)

a) Sequences and Series   25Q (25 Marks)

Analogies of numbers and alphabet, completion of blank spaces following the pattern in a:b::c:d relationship; odd thing out: missing number in a sequence or a series.

b) Data Analysis   10Q (10 Marks)

The data given in a Table, Graph, Bar diagram, Pie Chart, Venn Diagram or a Passage is to be analyzed and the questions pertaining to the data are to be answered.

c) Coding and Decoding Problems   10Q (10 Marks)

A code pattern of English Alphabet is given. A given word or a group of letters are to be coded or decoded based on the given code or codes.

d) Date, Time & Arrangement Problems 10Q (10 Marks)

Calendar problems, clock problems, blood relationships, arrivals, departures and schedules, seating arrangements, symbol and notation interpretation.

Section -B: Mathematical Ability   75Q (75 Marks)

I. Arithmetical Ability   35Q (35 Marks)

Laws of indices, ratio and proportion; surds; numbers and divisibility, *l.c.m.* and *g.c.d*; Rational numbers, Ordering.; Percentages; Profit and loss; Partnership, Pipes and cisterns, time, distance and work problems, areas and volumes, mensuration, modular arithmetic.

II. Algebraical and Geometrical Ability 30Q (30 Marks)

Statements, Truth tables, implication converse and inverse, Tautologies-Sets, Relations and functions, applications - Equation of a line in different forms.

Trigonometry - Trigonometric ratios, Trigonometric ratios of standard angles, (0°, 30°, 45°, 60°, 90°, 180°): Trigonometric identities: sample problems on heights and distances, Polynomials; Remainder theorem and consequences; Linear equations and expressions; Progressions, Binomial Theorem, Matrices, Notion of a limit and derivative; Plane geometry - lines, Triangles, Quadrilaterals, Circles, Coordinate geometry-distance between points.

III. Statistical Ability: 10Q (10 Marks)

Frequency distributions, Mean, Median, Mode, Standard Deviations, Correlation, simple problems on Probability.

Section-C: Communication Ability: 50Q (50 Marks)

Objectives of the Test

Candidates will be assessed on the ability to
1. identify vocabulary used in the day-to-day communication.
2. understand the functional use of grammar in day-to-day communication as well as in the business contexts.
3. identify the basic terminology and concepts in computer and business contexts (letters, reports, memoranda, agenda, minutes etc.).
4. understand written text and drawing inferences.

Part 1. Vocabulary	10Q (10M)
Part 2. Business and Computer terminology	10Q (10M)
Part 3. Functional Grammar	15Q (15M)
Part 4. Reading Comprehension (3 Passages)	15Q (15M)

MODEL QUESTION PAPER

SECTION A
Analytical Ability

(i) Date Sufficiency

In each of the questions numbered 1 and 2, the question is followed by data in the form of two statements labeled as i and

ii. You must decide whether the data given in the statements are sufficient to answer the questions. Using the data, make an appropriate choice form (1) to (4) as per the following guidelines.

(1) If the statement i alone is sufficient to answer the question;

(2) If the statement ii alone is sufficient to answer the question;

(3) If both the statements i and ii are sufficient to answer the question but neither statement alone is sufficient.

(4) If both the statements i and ii together and not sufficient to answer the question and additional data is required.

1. What is the value of the non-negative integer x?
(i) 2^x is odd   (ii) 3^x is odd

2. What is the length of the train?
(i) It crosses a pole in 8 seconds.
(ii) It crosses a bridge of length 100 m in 12 seconds.

(i)   **Problem solving**

a) Sequence and Series

Note: In each of the questions numbered 3 and 4, a sequence of numbers or letters that follow a definite pattern is given. Each question has a blank space. This has to be filled with the correct answer chosen from the given four options to complete the sequence without breaking the pattern.
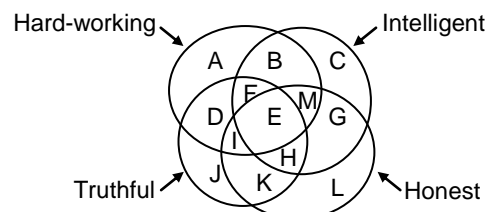
3. AZBY, CXDW ………………… GTHS
(1) EXUV   (2) EVFU   (3) EVRU   (4) EVSU

4. 9, 19, 40, ………………, 146
(1) 70   (2) 59   (3) 69   (4) 64

Note: In questions 5 and 6 pick the odd thing out

5. (1) 65   (2) 126   (3) 217   (4) 343

6. (1) BFH   (2) MQS (4) GJL (4) NRT

b) Data Analysis

Note: The following figure has four intersecting circles, each representing a group of persons having the quality written against it. Study the figure carefully and answer questions 7 and 8.

7. The region which represents people who are not honest but possess all other three qualities, as denoted by
(1) B   (2) F   (3) D   (4) M

8. The region which represents the people who are neither honest nor truthful but are intelligent and hard working, is denoted by
(1) A   (2) C   (3) D   (4) B

c) Coding and Decoding Problems:

In a code TANK is written as SZOL and FRIEND is written as EQHFOE. Find the process of coding and answer the question 9.

9. The code for ZENITH is
(1) YDMJUI   (2) ADMJUI   (3) YFMJUI   (4) ADMJUG

d) Date, Time & Arrangement Problems:

10. In a row of six persons, D and C are immediate neighbours of E. B is a neighbour of A only. A is the fourth from F. Who are on the two end points?
(1) F, B   (2) F, C   (3) B, D   (4) C, A

SECTION-B
Mathematical Ability

(i) Arithmetical Ability:

1. A wire of length 132 cm is bent to form a rectangle whose sides are in the ratio 7:4. The area (in square cms) of the rectangle is
(1) 4032   (2) 4230   (3) 100   (4) 3420

2. The ratio of the area of square of side 'a' to the area of an equilateral triangle of side 'a' is
(1) $4:\sqrt{3}$ (2) $2:\sqrt{3}$ (3) $\sqrt{3}:2$ (4) $\sqrt{3}:4$

3. If in a group of people, m persons can speak Telugu, n persons can speak Tamil and t persons can speak both Tamil and Telugu, then, the number of persons who can speak either Telugu or Tamil is
(1) m-n+1   (2) m-n-t   (3) m+n-1   (4) n-m+t

4. If a:b 1; 3 and b:c = 2:5, then, a:b:c =
(1) 1:3:5   (2) 1:6:5   (3) 2:6:15   (4) 6:2:15

(ii) Algebraical and Geometrical Ability

5. If one root of the equation $ax^2 + bx + c = 0$ is double the other root, then
(1) b2 = 9ac   (2) $2b^2 = 3abc$ (3) b = 2a   (4) $2b^2 = 9ac$

6. Equation of the line passing through the point (2, -3) and perpendicular to the line segment joining the points (1, 2) (-1, 5) is
(1) 2x-3y-13 = 0   (2) 2x-3y-9 = 0
(3) 2x-3y-11 = 0   (4) 2x-3y-7 = 0

7. If (0, 0), (2, 2) and (0, a) form a right angled isosceles triangle, then a =
(1) 4   (2) -4   (3) 3   (4) -3

(iii) Statistical Ability:

8. The mean deviation of the values 21, 23, 25, 28, 30, 32, 38, 39, 46, 48 from the mean is
(1) 7.6   (2) 6.7   (3) 7.8   (4) 8.7

9. Eight coins are tossed simultaneously. The probability of getting at least six heads is
(1) $\dfrac{39}{256}$ (2) $\dfrac{29}{256}$ (3) $\dfrac{31}{256}$ (4) $\dfrac{37}{256}$

10. If the standard deviation of $a_1, a_2, ..., a_n$ is s, then, the standard deviation of $a_1 + b, a_2 + b, ..., a_n + b$ is
(1) s + b   (2) s – b   (3) s   (4) sb

SECTION – C
Communication Ability

Part – 1 : Vocabulary

Choose the correct meaning for the word:

1. Alleviation
(1) Decoration   (2) Exaggeration   (3) Mitigation   (4) Aggravation

Fill in the blank choosing the correct word:

2. The old lady is an …………. Story-teller
(1) adept   (2) adopt   (3) adapt   (4) adrift

Part – 2 : Business and Computer Terminology

Choose the correct answer:

3. An Actuary is
(1) One who presents himself
(2) One who project himself
(3) One who works in a sanctuary
(4) One who makes calculations connected with insurance

Part – 3 : Functional Grammar

Choose the correct answer:

4. A : Would you mind lending your umbrella?
B : Yes, I do.
In this conversation
(1) B is willing to lend it to A   (2) B excuses himself
(3) B is hesitant   (4) B is annoyed by the request

5. "If wishes were horses, beggars would ride". This sentence
(1) speaks of an utter impossibility
(2) expresses a condition
(3) implies a difficult possibility
(4) states an absurdity

Fill in the blank with the appropriate phrase/verb/ preposition

6. We had a pleasant conversation …………… a cup of tea.
(1) with   (2) on   (3) over   (4) during

7. Some bottles are not suitable ……………. Recycling.
(1) for   (2) with   (3) to   (4) in

Part-4 : Reading Comprehension

Read the following passage and answer questions 8 to 10

The overwhelming vote given by the greater part of the public has so far been in favour of entertainment which passes the time easily, and satisfies that part of our imagination which depends on the more obvious kind of daydreams. You can argue that these daydreams are usually substitutes for our own inactivity, ineffectualness, and lack of power or influence, so that we make up for what we secretly regard as our deficiencies by watching the stimulating adventures of other people who are larger, stronger, more effective, or more beautiful than we are. The conventional stars act the roles of other people who are larger, stronger more effective, or more beautiful than we are. The conventional West, or in the jungles we will never visit (we would not dare to, most of us, if we could), or in the underworld of great cities where crime and violence may not pay in the end, but are very exciting to watch if your youth is being spent in the day-to-day routine of school or office, on the one hand, or in the kitchen and living - room of 39 Blank St, on the other.

Whether we admit it to ourselves or not, most of us are very conscious of deficiencies in our looks, our clothes, and the circumstances of our homes. But on the screen we can feast our eyes on people selected to appear because of their good looks, dressed in expensive and sometimes extravagantly showy clothes, and moving about most of the time in the plushy environment of wealth. What you cannot have yourself, at least you can continuously look at surrounding other people, and, who knows, one day you may have these things too, like the stars who have come up from nowhere but now earn large fortunes!

8. Why do we enjoy films in which there are larger-than-life characters?
   (1) We don't like films to be true to life
   (2) We like the big screen.
   (3) Art is not for art's sake
   (4) They enable us to compensate ourselves for our shortcomings.

9. Why do we enjoy films based on crime and violence?
   (1) Human beings admire criminals.
   (2) They provide for us with some relief from the boredom of routine life
   (3) Crime and violence have become part of our life.
   (4) All human beings are sadists.

10.   What aspect of human psychology the author does refer to in the second paragraph?
   (1) Human beings enjoy the very sight of qualities and luxuries they are deprived of.
   (2) Human psychology is very complex.
   (3) Human beings love being poor.
   (4) Human being admire themselves.