LITTLE FLOWER PUBLIC SCHOOL KOLLAMULA
ENTRANCE TEST 2018 – 19
CLASS - XI
SCIENCE STREAM

GENERAL INSTRUCTIONS:
i.   This question paper consists of 50 questions.
ii.   Each question is followed by four possible answers. You have to select the correct option and darken the appropriate bubble in the OMR sheet provided.
iii.   All questions are compulsory.
iv.   Each question carries 2 marks.
v.   BEWARE!!! ONE MARK WILL BE DEDUCTED FOR A WRONG ATTEMPT.
vi.   Do not write anything on the question paper and OMR sheet
vii.   Rough work may be done on the additional sheets provided.
viii.   Use only blue or black ball point pen.

ENGLISH

I.   Complete the dialogue choosing the correct option given below:

Interviewer   : It's amazing that you have played for more than twenty years and still going strong. (**1**) _____ continue playing?

Sachin   : Only God knows ,(**2**) _____ in this regard? Everything has an end and so will I.

Interviewer   : With 93 Centuries in test and One- day Cricket. I think (**3**) _____ and Don Bradman.

    1.   (a) How long will you   (b) When will you

          (c) How much will you   (d) What length will you

    2.   (a) when can I say   (b) what can I say

          (c) How can I say   (d) where can I say

    3.   (a) everything stands between you   (b) nothing stands between you

          (c) no one stands between you   (d) everyone stands between you

II.   Ram   :   You seem to be very much interested in films. (**4**) _____ the best actor in Bolywood and why?

      Mohan   :   It's difficult choice. Every great actor is unique. But (**5**) _____ Amitabh Bachchan in range and depth?

    4.   (a) Whose do you consider   (b) Who do you consider

          (c) Whom do you consider   (d) What do you consider

    5.   (a) How can match   (b) Who can match

          (c) What can match   (d) Whom can match

6. Evaluate the following

$$\frac{2\cos^2 60 + 3\sec^2 30 \cdot 2\tan^2 45}{\sin^2 30 + \cos^2 45}$$

(a) $\frac{4}{3}$ (b) $\frac{10}{8}$ (c) $\frac{10}{3}$ (d) $\frac{5}{3}$

7. Find the least number that is divisible by all natural numbers between 1 and 10

(a) 36,28,800   (b) 2520   (c) 2420   (d) 36800

8. The ratio of the height of a tower and the length of its shadow on the ground is $\sqrt{3}$: 1 What is the angle of elevation of the sun?

(a) 30^0 (b) 60^0 (c) 45^0 (d) 90^0

9. If zeroes of the polynomial $x^2 + 4x \ 2a$ are α and $\frac{2}{\alpha}$, then find the value of a

(a) 2   (b) 3   (c) 4   (d) 1

10. Find the 25th term of the A.P -5 , $\frac{-5}{2}$, 0 , $\frac{5}{2}$……………

(a) 55   (b) 65   (c) 60   (d) 50

11. Two circular beads of different sizes are joined together such that the distance between their centres is 14cm. The sum of their areas is 130π cm^2. Find the radius each bead

(a) 7cm   (b) 10cm   (c) 3cm   (d) 13cm

12. A cylinder , a cone and a hemisphere have same base and same height. Find the ratio of their volumes.

(a) 3 : 1 : 2   (b) 1 : 2 : 3   (c) 3 : 2 : 1   (d) 2 : 3 : 1

13. A cylindrical glass tube with radius 10cm has water up to a height of 9cm. A metal cube of 8cm edge is immersed completely. By how much the water level will rise in the glass tube

(a) 1.629 cm   (b) 1 : 829 cm   (c) 1 : 527 cm   (d) 1 : 926cm

14. If the perimeter of a semi circular protractor is 36cm, thus its diameter is

(a) 10cm   (b) 12cm   (c) 14cm   (d) 15cm

15. The total surface area of a cube is 216cm^2. Its volume is

(a) 216cm^3 (b) 144cm^3 (c) 196cm^3 (d) 212cm^3

PHYSICS

16. A watch maker's glass is

    (a) convex lens   (b) concave lens

    (c) plano convex lens   (d) Plano concave lens

17. The resistance $2\,\Omega$, $4\,\Omega$ and $8\,\Omega$ are connected in parallel. Their equivalent resistance is

    (a) 10Ω (b) $14\,\Omega$ (c) $8/7\,\Omega$ (d) between $2\,\Omega$ and $8\,\Omega$

18. The most important safety method used for protecting home appliances from short circuiting or overloading is

    (a) earthing   (b) use of fuse   (c) use of stabilizers   (d) use of electric meter

19. In a circuit current becomes one – fourth when the resistance is

    (a) removed   (b) doubled   (c) made four times   (d) halved

20. A person cannot see distinctly object kept beyond 2m. This object can be corrected by using a lens of power.

    (a) $+ 0.5D$ (b) $-0.5D$ (c) $+ 0.2D$ (d) $-0.2D$

21. A virtual, object and magnified image is formed by a convex lens of focal length 10cm. The distance of object from the lens is

    (a) 10cm   (b) 20cm   (c) 5cm   (d) 30cm

22. An electric kettle consumes 1KW of electric power when operated at 220V. a fuse wire of what rating must he used for it?

    (a) 1A   (b) 2A   (c) 4A   (d) 5A

23. What is the maximum resistance which can he made using five resistors each of ($1/5$) Ω

    (a) ($1/5$) Ω (b) $10\,\Omega$ (c) $5\,\Omega$ (d) $1\,\Omega$

24. An object is held at 40cm from a concave lens of focal length 60cm. The distance of the image from the lens is

    (a) -40cm   (b) -60cm   (c) 24cm   (d) -24cm

25. The linear magnification of a convex lens is -1 , when object in front of the lens is

    (a) at infinity   (b) at focus   (c) at $2F_1$ (d) between F_1 and $2F_1$

CHEMISTRY

26. The main criteria of modern periodic table is

    (a) valency (b) atomic number   (c) atomic radius   (d) atomic mass

27. In the periodic table 8th group elements are

    (a) alkali metals   (b) Halogens

    (c) coinage metals   (d) noble gases

28. What is bleaching powder?

    (a) $CaSO_4$ (b) $CaCl_2$ (c) $CuSO_4$ ½ H_2O (d) $CaOCl_2$

29. How many covalent bonds are present in C_2H_6

    (a) 7   (b) 8   (c) 9   (d) 6

30. Name the functional group present in denatured spirit

    (a) Acid   (b) Ketone   (c) aldehyde   (d) alcohol

31. Name the functional group present in ester

    (a) C   OH   (b) C   O   (c) C   OH   (d) C   C   C

32. Name the type of reaction takes place in the convertion of CH_4 to CCl_4

    (a) addition reaction   (b) substitution

    (c) oxidation   (d) combustion

33. Name the acid present in tomato

    (a) Formic acid   (b) Acetic acid   (c) Oxalic acid   (d) Carbonic acid

34. The general formula of Alkene is

    (a) CnH_{2n+2} (b) CnH_{2n} (c) CnH_{2n-2} (d) CnH_{2n+1}

35. What is the electronic configuration of Ca^+ ion

    (a) 2 , 8 , 8 , 2   (b) 2 , 8 , 8   (c) 2 , 8 , 8 , 1   (d) 2 , 8 , 8 , 3

BIOLOGY

36. The end product of anaerobic respiration in yeast cell is

    (a) CO_2 and H_2O (b) Lactic acid and H_2O

    (c) ATP and NADP   (d) Ethanol and CO_2

37. Cascuta is an example of

    (a) Parasite   (b)Saprophyte   (c) Holophyte   (d) Autotrophs

38. After fertilization in angiosperms the ovary develops in to:

    (a) seed   (b) fruit   (c) Endosperm   (d) zygote

39. Endocrime glands which have duel functions

    (a) Pancreas and pineal   (b) Thyroid and pituitary

    (c) Pancreas and ovary   (d) Testis and Adrenal

40. Contraceptive method used only by the female partner is

    (a) Surgical   (b) Barrier   (c) IUCDs   (d) Natural

41. Scientific name of the pea plant used by Mendel for his experiments

    (a) Soya beans   *(b) Pisum sativum*

    (c) Oryza sativa   *(d) Mangifera indica*

42. The 'Theory or Chemical Evolution of Life' was proposed by

    (a) JBS Haldane   (b) Darwin   (c) Lanmark   (d) Weisman

43. "Snow blindness" is the consequence of

    (a) Air pollution   (b) Green house effect   (c) Deforestation   (d) Ozone depletion

44. Basic filtration unit of a kidney is

    (a) Nephridia   (b) Flame cell

    (c) Malphigian body   (d) Nephron

45. First tropic level in an ecosystem consists of

    (a) Producers   (b) Consumers

    (c) Decomposers   (d) Abiotic factors

COMPUTER SCIENCE

1. Suppose you have bought all hardware components required for assembling a computer. After assembling the computer system, which will be the very first software to be installed.
   (a) Hardware Drivers   (b) Operating system
   (c) Anti Virus Software   (d) Word Processing Software

2. The keyboard shortcut for Copy is in Excel .
   (a) Ctrl+C   (b) Ctrl+A
   (c) Ctrl+V   (d) Ctrl+X

3. All formulae in Excel begin with the :
   (a) =   (b) +
   (c) %   (d)

4. Which of the following is not storage device:
   (a) Memory Card   (b) Pen Drive
   (c) CD-ROM   (d) Random Access Memory

5. At one place in a document Sidharth wants to type H_2O, but he is not able to get 2 at its proper place. Which option should she use for this purpose.
   (a) Bold   (b) Underline
   (c) Super Script   (d) Subscript

ENGLISH		MATHS		PHYSICS		CHE		BIO		Comp	
1	a	6	C	16	A	26	B	36	D	46	B
2	b	7	B	17	C	27	D	37	A	47	A
3	c	8	B	18	B	28	D	38	B	48	A
4	b	9	D	19	C	29	A	39	C	49	D
5	b	10	A	20	B	30	D	40	C	50	d
		11	C	21	C	31	B	41	B		
		12	A	22	D	32	B	42	A		
		13	A	23	D	33	C	43	D		
		14	c	24	D	34	C	44	D		
		15	a	25	C	35	b	45	a		