FEDERAL PUBLIC SERVICE COMMISSION

COMPETITIVE EXAMINATION - 2019

FOR RECRUITMENT TO POSTS IN BS-17

UNDER THE FEDERAL GOVERNMENT

(General Knowledge-I)

(General Science & Ability)

TIME ALLOWED: THREE HOURS PART-I(MCQS): MAXIMUM 30 MINUTES	PART-I (MCQS) MAXIMUM MARKS = 20 PART-II MAXIMUM MARKS = 80

NOTE: (i) Part-II is to be attempted on the separate **Answer Book.**
   (ii) Attempt **ONLY EIGHT** questions from **PART-II,** selecting **FIVE** questions from **SECTION-I** and **THREE** questions from **SECTION-II. ALL** questions carry **EQUAL** marks.
   (iii) All the parts (if any) of each Question must be attempted at one place instead of at different places.
   (iv) Candidate must write Q. No. in the Answer Book in accordance with Q. No. in the Q.Paper.
   (v) No Page/Space be left blank between the answers. All the blank pages of Answer Book must be crossed.
   (vi) Extra attempt of any question or any part of the attempted question will not be considered.

PART-II

SECTION-I

Q.2 (a) Deficiency of vitamins causes different human diseases some of which are given in the table below choose the correct type of vitamin from the box and write in front of each disease.
(5)

Vit. A	Vit. B1		Vit. C	Vit. D	Vit. E	Vit. K

Diseases caused duw to lack of vitaman	Name of the vitaman
1.Poor night vision	
2. Bleeding gums	
3. Rickets in children	
4. Beri-Beri	
5. Anaemia	

(b) People suffering from cardiovascular disease having high level of cholesterol in their blood, this often **(5)**

leads to build of fats on its internal arterial walls, suggests how this might be harmful to the heart

(c) Why the excessive use of chemical fertilizers should be avoided? **(5)**

(d) Why are Scientists worried about the increase of CO2 in atmosphere? **(5)**

Q.No.3

a) Differentiate between the renewable and non- renewable sources of energy giving example of Each one of them**.** **(5)**

b) Give a brief account of optic fibers. What is their importance in present day telecom system?

c) What is the most dangerous part of hurricane and how do cyclone affect humans? **(5)**

d) What is the difference between vaccines and Antibiotics? How do antibiotics and vaccines contribute to health? **(5)**

Q.No.4

a) What is the importance of forests in the economy of a country? **(5)**

b) Give a brief account of biotechnology. **(5)**

c) Do the mammals always lay eggs? If yes, where in the world do they live? Write the name some of them. **(5)**

d) How can the sun have such a strong gravitational field if its made of gases? **(5)**

Q.No.5

a) What does Ozone depletion mean and how can we protect the ozone layer? **(5)**

b) What are the different types of a network? Explain each briefly. **(5)**

c) Why an indiscriminate / causal use of antibiotic may prove dangerous? **(5)**

d) Why do atoms form bonds? Name three major types of chemical bonds. **(5)**

Q.No.6

a) Moiz was trying to sleep at one night but there was too much noise around him. His clock ticked every **(5)**
5 seconds; a tap was dipping every seventh seconds and a pet dog snored every 12th second. He noticed on his clock that all three things happened together on the stroke of midnight. Find after how may seconds are three things happened together **(5)**

b) One pipe can fill a pool 1.25 times as fast as second pipe. When both pipes are opened they can fill the Pool in five hours. How long it will take the fill the pool if only slower pipe is used.

c) The cost of hiring a car for 2 days in 2018 was Rs.264 which was 20% more than in 2013. What was the m cost of hiring a car in 2013? **(5)**

d) What do you understand by measure central tendency? State its types. **(5)**

Q.No.7

a) Moiz and Mair share a lottery win of Rs. 2000 in the ratio of 1:4. Moiz then share this part between himself, his wife and his son.in the ratio of 4:5:1. How much more his wife gets over hisson? **(5)**

b) A farmer keeps hens and rabbits on his farm. One day he counted the total of 70 heads and 196 legs. **(5)**
How many more hens than rabbits does he have?

c) What is polygon? Describe different types of regular polygon. **(5)**

d) In a certain code computer is written as FRUVQNPC. How will MEDICINE will be written in code language? **(5)**

Q.No.8

a) Seven Piano Students T U V W X Y & Z are given a recital and their instructor is deciding the order in which they will perform, each student will play exactly one piece, a piano solo. In deciding the order of performance the instructor must observer following restrictions.

   (i) X cannot play first or second

      W cannot have played until X has played

      Neither T nor Y can play Seventh

  Either Y & Z must play immediately after W

  V must play immediately after, or immediately U Played

   (ii) If V play first, which one of the following must be true T plays sixth

      X plays third

      Z plays seventh

      T plays after immediately after YW Plays
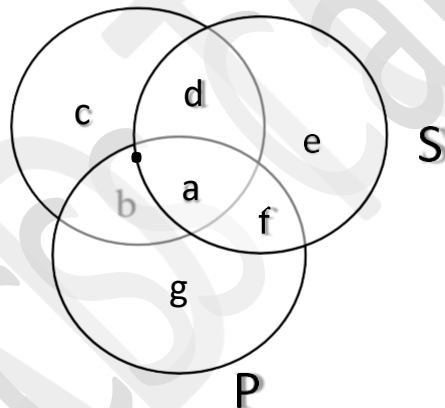
      immediately After X

b) U = [Whole number from 10 to 24] A = [Even Number]

   B = [Number divisible by 5]

   Write down the number elements of A∩B **(5)**

c) in the following diagram A represent American, S represent scientist and P represents politicians

   (i)   American those are politicians but not scientists will be.

   (ii)   Scientists which are politicisms but not Americans will be

d) Each packet of washing powder carries a token and 4 token can be exchanged for free packet, How many free packets will I receive if I buy sixty four packets? **(5)**