## Identifier based questions

Which of the following are keywords in Python?
(i) Break (ii) check (iii) range (iv) while

Find the invalid keyword name from the following:
(i) break (ii) as (iii) Import (iv) pass

Find the invalid identifier from the following
a) Subtotal b) assert c) temp_calc d) Name2

Find the invalid identifier from the following
a) MyName b) True c) 2ndName d) My_Name

Identify the invalid keyword in Python from the following:
(a) True (b) None (c) Import (d) return

Write the type of tokens from the following:
(i) If (ii) roll_no

Find the valid identifiers from the following:
Rate*Time, For, class, Row1

1) Write the type of tokens from the following:
(i) if
(ii) roll_no
(iii) "Str"
(iv) **
(v) :
2) Identify the valid relational operator in Python from the following.
(a) ?
(b) =>
(c) !=
(d) in
3) Which of the following are valid operators in Python:
(i) ** (ii) between (iii) like (iv) \| I
4) Identify the invalid logical operator in Python from the following.
a) and
b) or
c) not
d) Boolean
5) Identify the Invalid relational operator in Python from the following.
a) <=
b) >
c) $==$
d) <>
6) Which of the following are valid operator in Python:
(i) ${ }^{* /}$ (ii) is (iii) ^ (iv) like

## Operator Based Questions

1) Write the output of the following python expression: $\operatorname{print}((4>5)$ and $(2!=1)$ or $(4<9))$
2) Write the output of the following python statements:
(a) $\operatorname{print}(2+3 * 4 / / 2-4)$
(b) $\operatorname{print}(10 \% 3-10 / / 3)$
3) Evaluate the following expressions:
a) 16 ** $2+9 * 4 / / 5-15$
b) $4>9$ and $19>11$ or not $1>13$
4) What will be the value of the expression: $14+13 \% 15$
(i) 14
(ii) 27
(iii) 12
(iv) 0
5) Evaluate the following expressions:
a) $8 * 3+2 * * 3 / / 9-4$
b) $12>15$ and $8>12$ or not $19>4$
6) What is the value of the expression
$4+4.00,2 * * 4.0$
7) Evaluate the following expressions:
a) $2 * * 3 * * 2$
b) $7 / / 5+8 * 2 / 4-3$
8) Give the output given by the following code fragments:
a) $y=\operatorname{str}(123)$
print(y*3)
b) $5<10$ and $10<5$ or $3<18$ and not $8<18$
9) Evaluate the following expression.
a) $51+4-3 * * 3 / / 19-3$
b) $17<19$ or $30>18$ and not $19==0$
10) Evaluate the following expressions:
a) $8 / 4+4 * * 2 / / 5 \% 2-8$
b) $10>=5$ and $7<12$ or not $13==3$
11) Evaluate following expressions:
a) $18 \% 4 * * 3 / / 7+9$
b) $2>5$ or $5==5$ and not $12<=9$
12) Evaluate the following expressions:
a) $12 *(3 \% 4) / / 2+6$
b) not $12>6$ and $7<17$ or not $12<4$

## Output Based Questions(string and loops)

(1) If the following code is executed, what will be the output of the following code?
name="ComputerSciencewithPython"
print(name[3:10])
(2) Find and write the output of the following Python code:
def Display(str):

```
    \(m=" "\)
```

for $i$ in range(0,len(str)):
if(str[i].isupper()):
$m=m+s t r[i] . l o w e r()$
elif str[i].islower():
$m=m+\operatorname{str}[i]$. upper ( $)$
else:
if $i \% 2==0$ :
$m=m+\operatorname{str}[i-1]$
else:
$m=m+" \#$ "
print(m)

Display('Fun@Python3.0')
3) Find and write the output of the following Python code:

```
def Convert(Old) :
    l=len (Old)
    New=""
    for i in range \((0,1)\) :
        if Old[i].isupper():
            New=New+Old[i].lower()
        elif Old[i].islower():
            New=New+Old[i].upper ()
        elif Old[i].isdigit():
            New=New+"*"
        else:
            New=New+"ㅇㅇㅇ"
    return New
Older="InDIa@2020"
Newer=Convert(Older)
print("New string is : ",Newer)
```

4) If the following code is executed, what will be the output of the following code?
name="India is my country"
print(name[10:3:-1])
5) How many times the word "India" will be printed by the following code snippet?
$S=$ "Python Rocks"
for ch in S[3:8]:
print("India")
6) Suppose a string $S$ is declared as $S=$ "Python", which of the following is incorrect?
a) $\operatorname{print}(\mathrm{S}[1])$
b) $\mathrm{S}[0]=$ "I"
c) $\operatorname{print}(\mathrm{S}[:-1])$
d) $\operatorname{print}(\operatorname{len}(\mathrm{S}))$
7) If the following code is executed, what will be the output of the following code? name="Corona Virus 2019"
print(name[2:12])
8) If the following code is executed, what will be the output of the following code? str="KendriyaVidyalayaSangathan"
print(str[8:16])
9) What is the output of the following code:
for $i$ in range( $-3,4,2$ ):

$$
\text { print( } i \text {, end = ' } \$ \text { ') }
$$

10) Find and write the output of the following Python code:
str="Computer Science"
str[-6:-3]
11) What is the correct Python code to display the last four characters of string 'Str' containing the text "Swachh Bharat Abhiyaan"?
(i) $\operatorname{Str}[4:] \quad$ (ii) $\operatorname{Str}[-4:] \quad$ (iii) $\operatorname{Str}[* 4:]$ (iv) $\operatorname{Str}[/ 4:]$
12) Write the output of the following code:

Text="@Shop2HomeDelivery"
$L=l e n(T e x t)$
$n=" "$
for $i$ in range( $0, L$ ):
if Text[i].isupper():
$n=n+$ Text $[i]$.lower()
elif Text[i].isalpha():
$n=n+$ Text $[i]$.upper()
else:

$$
n=n+{ }^{\prime} \# \#{ }^{\prime}
$$

print(n)
13) Given a string $S=$ "ComPUterSciEnce", write the output of print(S[3:10:2])
14) Find and write the output of the following Python code :

Str1="CBSEBOARD2020"

## Str2=""

I=0
while $\mathrm{I}<\operatorname{len}(\operatorname{Str} 1)$ :
if $\operatorname{Str} 1[I]>==" A "$ and $\operatorname{Str} 1[I]<=" R ":$
Str2=Str2+Str1[I+1]
elif $\operatorname{Str} 1[I]>==0$ " and $\operatorname{Str} 1[I]<==" 9 ":$
Str2 $=$ Str2+ $(\operatorname{Str} 1[I-1])$
else:
15) If the following code is executed, what will be the output of the following code? name="Computer_Science_with_Python"
print(name[-25:10])
16) What will be the output of following code snippet: msg = "Hello Friends"
msg [: : - 1]
a) Hello b) Hello Friend c) 'sdneirF olleH' d) Friend
17) Write the output of following python code

Text="Welcome Python"
L=len(Text)
ntext=""
for $i$ in range $(0, L)$ :
if Text[i].isupper():
ntext=ntext+Text[i].lower()
elif Text[i].isalpha():
ntext $=$ ntext + Text[i].upper()
else:
ntext=ntext+"!!"
print (ntext)
18) Find output of the following code?
progL="Python Java Visual Basic"
print(progL[-5:])
19) Find and write the output of the following Python code:

```
def Display(str):
    m=""
    for i in range(0,len(str)):
        if(str[i].isupper()):
            \(\mathrm{m}=\mathrm{m}+\mathrm{str}[\mathrm{i}]+{ }^{\prime}{ }^{\prime}\)
        elif \(\operatorname{str}[\mathrm{i}]\).islower():
            m=m+'@'
        elif \(\operatorname{str}[\mathrm{i}]=={ }^{\prime}\) ' :
            \(\mathrm{m}=\mathrm{m}+{ }^{\prime}{ }^{\prime}\)
    print(m)
Display('CracK it')
```

20) Find and write the output of the following Python code:
x = "abcdef"
i = "a"
while $i$ in $x$ :
print(i, end = " ")
21) Find and write the output of the following Python code:
$\mathrm{n}=45$
if ( $n>50$ ):
print(n-5)
else:
print $(\mathrm{n}+10)$
22) Find the output of the following:
>>>Name = "Python Examination"
>>>print (Name [: 8:-1])
23) Find and write the output of the following Python code:
def makenew(mystr):
newstr $="$ "
count $=0$
for i in mystr:
if count\%2!=0:
newstr = newstr+str(count)
else:
if i.islower():
newstr = newstr+i.upper()
else:
newstr $=$ newstr+i
count +=1
newstr $=$ newstr + mystr[:1]
print("The new string is :", newstr)
makenew("sTUdeNT")
24) Find and write the output of the following python code:
def fun(s):
$\mathrm{k}=\operatorname{len}(\mathrm{s})$
$\mathrm{m}=$ " "
for $i$ in range $(0, k)$ :
if(s[i].isupper()):
$\mathrm{m}=\mathrm{m}+\mathrm{s}[\mathrm{i}]$.lower()
elif $s[i]$.isalpha():
$\mathrm{m}=\mathrm{m}+\mathrm{s}[\mathrm{i}]$.upper()
else:
$\mathrm{m}=\mathrm{m}+\mathrm{bb}{ }^{\prime} \operatorname{print}(\mathrm{m})$
print(m)
fun('school2@com')

## List Based Questions

1) Given the lists $\mathrm{L}=[1,3,6,82,5,7,11,92]$, write the output of print( $\mathrm{L}[2: 5]$ )
2) Identify the valid declaration of $L$ :

$$
\mathrm{L}=\text { ['Mon', ‘23', 'hello', '60.5’] }
$$

a. dictionary
b. string
c.tuple
d. list
3) Write the output of the following python statements:

Array $=[8,5,3,2,1,1]$
print (Array[-1:-6:-1])
4) Identify the output of the following python statements if there is no error. Otherwise, identify the error(s):
Str1="Computer2020"
Str2=tuple (Str1[8:12])
Str3=list (Str2)
print(Str3,"\#",len(Str3))
5) Given the lists $\mathrm{L}=[1,3,6,82,5,7,11,92]$, write the output of $\operatorname{print}(\mathrm{L}[0: 7: 2])$
6) Find and write the output of the following python code:

Numbers $=[9,18,27,36]$
for Num in Numbers:
for N in range(1, Num\%8) :
print( N, "\#", end = " $\backslash \mathrm{n} "$ )
7) Predict the output of the following:
$a=[1,2,3,4,5]$
print(a[3:0:-1]
8) Suppose list1=[0.5* $x$ for $x$ in range $(0,4)]$ what will be the contents of list1 out of the following given options:
(i)
[0, 1,2,3]
(ii) $[0,1,2,3,4]$
(iii) $[0.0,0.5,1.0,1.5]$
(iv) $[0.0,0.5,1.0,1.5,2.0]$
9) Find the output of the following program:

L=["X",20,"Y",10,"Z",30]
$\mathrm{C}=0$
$\mathrm{S}={ }^{\prime}$ "
$\mathrm{I}=0$
for $X$ in range $(1,6,2)$ :
$\mathrm{C}=\mathrm{C}+\mathrm{X}$
$\mathrm{S}=\mathrm{S}+\mathrm{L}[\mathrm{X}-1]+$ '\#'
$\mathrm{I}=\mathrm{I}+\mathrm{L}[\mathrm{X}]$
print(C,I,S)
10) Given the lists $\mathrm{L}=[10,5,9,13,56,34,98]$, write the output of $\operatorname{print}(\mathrm{L}[-5:-1])$
11) A List is declared as
$\mathrm{T}=[56,87,69,99,74]$
What will be the value of $\max (\mathrm{T})$ ?
12) Given the list Lst $=[12,34,4,56,78,22,78,89]$, find the output of
13) Give the output of the following code:
$\mathrm{L}=[1,2,3,4,5,6,7]$
$\mathrm{B}=\mathrm{L}$
$\mathrm{B}[3: 5]=90,34$
print(L)
14) Suppose list1 $=[10 * x$ for $x$ in range $(10,50,5)]$; the output of list1 is:
15) Suppose L1=["xyz",[1,2,3],80,"RollNo"]

Consider the list L1 and write the output of: L1[1][2]
16) Consider a list, List $1=[100,200,300,100,400,500,100,200]$.

Write the output of the following statements:
(i) List1.pop(-2) (ii) List1.count(100)
17) If the following code is executed, what will be the output of the following code ? Lt=[1,"Computer",2,"Science",10,"PRE",30,"BOARD"] print(Lt[3:])
18) Given the lists $\mathrm{L}=[$ " H ", "T", "W", "P", "N"], write the output of print(L[3:4])
19) Write the output of following code
$\mathrm{t} 1=[10,12,43,39]$
print(t1*3)
20) Give Output:
colors=["violet", "indigo", "blue", "green", "yellow", "orange", "red"]
del colors[4]
colors.remove("blue")
colors.pop(3)
print(colors)
21) Identify the valid statement for list $L=[1,2, " \mathrm{a}]$ :
(i) L.remove("2")
(ii) L.del(2)
(iii) del L[2]
(iv) del L["a"]
22) A list is declared as

Lst $=[1,2,3,4,5,6,8]$
What will be the value of sum(Lst)?
23) Which statement is not correct
a) The statement $x=x+10$ is a valid statement
b) List slice is a list itself.
c) Lists are immutable while strings are mutable.
d) Lists and strings in pythons support two way indexing.
24) A list is declared as
$\mathrm{L}=[(2,5,6,9,8)]$
What will be the value of $\operatorname{print}(\mathrm{L}[0])$ ?
25) Find and write the output of the following Python code:
def mainu():
Moves=[11, 22, 33, 44]
Queen=Moves
Moves[2]+=22
L=len(Moves)
for i in range ( L ):
print("Now@", Queen[L-i-1], "\#", Moves [i])
mainu()
26) Assume that a List L is declared as $\mathrm{L}=[5,10,15,20,25]$, which of the following will produce output 25 ?
a) $\quad \operatorname{print}(L[1])$
b) $\operatorname{print}(L[-1])$
c) $\quad \operatorname{print}(L[2])$
d) $\operatorname{print}(L[-2])$
27) Identify the valid declaration of T : T = "('Computer', '23000', 'Mobile', '15000','Printer','10000')"
a. dictionary
b. string
c.tuple
d. list
28) Find and write the output of the following Python code:

Lst1 = ["20","50","30","40"]
CNT $=3$
Sum $=0$
for I in [7,5,4,6]:
T = Lst 1 [CNT]
Sum = float (T) +I
print (Sum)
CNT- $=1$
29) Given the list:

EmpName =["Jai","Suraj","Kajal","Mamta","Neeraj"].
Which of the following command is used to update the Employee Name from "Mamta" to "Sakshi".
(i) EmpName="sakshi" (ii) EmpName["Mamta"]="Sakshi"
(iii) EmpName[3]="Sakshi" (iv) EmpName[4]="Sakshi"
30) Find the output -
>>>A $=[17,24,15,30]$
>>>A.insert ( 2,33 )
>>>print ( $\mathrm{A}[-4]$ )

Find and write the output of the following Python code :
Values $=[10,20,30,40]$
for Val in Values:
for $I$ in range(1, Val\%9):
print (I,"*", end="")
31)

```
        print()
```

32) Find and write the output of the following python code :
```
for Name in [‘Jayes', 'Ramya', 'Taruna', ‘Suraj’]:
```

print(Name)
if Name[0]== ${ }^{\circ} \mathrm{T}$ ':
break
else :
print('Finished!')
print('Got it!')
33) Find and write the output of the following Python code :
$\mathrm{L} 1=[100,900,300,400,500]$
START = 1
SUM = 0
for C in range (START,4):
SUM = SUM + L1[C]
print(C,":",SUM)
SUM = SUM + L1[0]*10
print(SUM)
34)

Write the output of the following Python program code:

```
Data =['D','O',' ','I','t',' ','@',' ','1','2','3',' ','!']
for i in range(len(Data)-1):
    if (Data[i].isupper()):
        Data[i]=Data[i].lower()
    elif (Data[i].isspace()):
            Data[i]=Data[i+1]
print Data
```

35) Find and write the output of the following python code :

Val = [20,"A",40,"K",10,"H"]
Freq $=0$
Sum $=0$
Cat = ""
For I in range (1,6,2):
Freq = Freq + I
Sum $=$ Sum $+\operatorname{Val}[I-1]$
Cat $=\mathrm{Cat}+\mathrm{Val}[\mathrm{I}]+$ "*"
print(Freq,Sum,Cat)
36) Find and write the output of the following Python code :

Data = ["P",20,"R",10,"S",30]
Times $=0$
Alpha $="$
Add $=0$
for $C$ in range $(1,6,2)$ :
Times $=$ Times +C
Alpha = Alpha + Data[C-1]+"\$"
Add = Add + Data[C]
print(Times,Add,Alpha)

## Tuples Based Questions

1) Consider the tuple in python named DAYS=("SUN","MON","TUES").

Identify the invalid statement(s) from the given below statements:

1. $\mathrm{S}=\mathrm{DAYS}[1]$
2. print(DAYS[2])
3. DAYS[0]="WED"
4. LIST=list(DAYS)
2) Suppose a tuple T is declared as $\mathrm{T}=(10,12,43,39)$, which of the following is incorrect?
a) $\operatorname{print}(\mathrm{T}[1])$
b) $T[2]=-29$
c) $\operatorname{print}(\max (\mathrm{T}))$
d) $\operatorname{print}(\operatorname{len}(\mathrm{T}))$
3) A tuple is declared as
$\mathrm{T}=(2,5,6,9,8)$
What will be the value of sum(T)? \#30
4) What data type is the object below:

A=1,2,3,"Hellp",4.5
(i) list
(ii) Dictionary
(iii) Tuple
(iv) Array
5) Suppose a tuple T is declared as $\mathrm{T}=(10,20,30)$ and a list $\mathrm{L}=[" m o n "$ " "tue", "wed", "thu", "fri", "sat", "sun"], which of the following is incorrect?
a) $\min (L)$
b) $\mathrm{L}[2]=40$
c) $\mathrm{T}[3]=$ "thurs"
d) $\operatorname{print}(\min (\mathrm{T}))$
6) A tuple is declared as T = ("JAY", "HARSH", "SEEMA", "PRAKASH")
what will be the value of $\max (\mathrm{T})$
7) T is declared as following: $\mathrm{T}=(1,2),(1,2,4),(5,3)$

What will be the value of $\min (\mathrm{T})$ ?
8) Consider two Tuples T1 and T2.
$\mathrm{T} 1=(10,20,30,40)$ and $\mathrm{T} 2=(100,200,300)$
Write the output of the following statement:
>>>T1+T2\#(10,20,30,40,100,200,300)
9) Consider a tuple $\mathrm{T} 1=(1,2,3,4)$.

Select the option that will add a new element in tuple T1.
(i) $\mathrm{T} 1[4]=5$ (ii) $\mathrm{T} 1=\mathrm{T} 1+(5)$ (iii) $\mathrm{T} 1=\mathrm{T} 1+5$ (iv) $\mathbf{T} 1=\mathbf{T} 1+(5$, ,
10) A tuple $T$ is declared with the following values:

T=('a','b','I','II', [1,2,3],["Name","Class","Subject","Section"], 10,20)
What will be the output of
T=T[-6:-3]+T[-4:-2]\#( 'I','II', [1,2,3], [1,2,3],["Name","Class","Subject","Section"])
11) Suppose a tuple T is declared as $\mathrm{T}=(10,20,30,40)$, what will be the output of $\operatorname{print}\left(\mathrm{T}^{*} 2\right)$
12) A tuple is declared as $T=(20,5,16,29,83)$ What will be the problem with the code $T[1]=100$.
13) Identify the data type of $X$ :
$\mathrm{X}=\operatorname{tuple}($ list $(1,2,3,4,5)$ ) )
a) Dictionary (b) string (c) tuple (d) list

## Dictionary Based Questions

1) Declare a dictionary in python named QUAD having $\operatorname{Keys}(1,2,3,4)$ and Values("India","USA","Japan","Australia")
2) Write a statement in Python to declare a dictionary whose keys are 1, 2, 3 and values are Monday, Tuesday and Wednesday respectively.
3) What type of objects can be used as keys in dictionary?
4) Find the output of the following code :
def change(s):
d = \{"UPPER" : 0, "LOWER" : 0 \}
for c in s :
if c.isupper():
d["UPPER"] += 1
elif c.islower():
d["LOWER"] += 1
else:
pass
print("Upper case count :", d["UPPER"])
print("Lower case count :", d["LOWER"])
change("School Days are Happy")
5) Write the output of the following statements:

D $1=\{1: 10,2: 20,3: 30,4: 40,5: 50\}$
print(len(D1))
D1[2]=60
print(D1)
6) Identify the valid declaration of $T$ :

T = \{"Roll":123, "Name": "Hiya", "Class":12, "Subject" : "Computer Science"\}
a. dictionary
b. string
c. tuple
d. list
7) Write the ouput of following code:
d=\{'amit':19,'vishal':20\}
print(d.keys())
8) Which statement is correct for dictionary?
(i) A dictionary is a ordered set of key:value pair
(ii) each of the keys within a dictionary must be unique
(iii) each of the values in the dictionary must be unique
(iv) values in the dictionary are immutable
9) What will be output of following:
$\mathrm{d}=\{1$ : "SUM", 2 : "DIFF", 3 : "PROD" $\}$
for i in d :
print (i)
10) Which is the correct form of declaration of dictionary?
(i) Day=\{1:'monday',2:'tuesday',3:'wednesday'\}
(ii) Day=(1;'monday',2;'tuesday',3;'wednesday')
(iii) Day=[1:'monday',2:'tuesday',3:'wednesday']
(iv) Day=\{1'monday',2'tuesday',3'wednesday']
11) Identify the valid declaration of Month:

Month=\{1:'January',2:'February',3:'March',4:'April'\}
(i) List (ii) Dictionary (iii) Array (iv) Tuple
12) What will be the result of the following code?
d1 = \{"abc" : 5, "def" : 6, "ghi" : 7\}
print (d1[0])
(a) abc (b) 5 (c) \{"abc":5\} (d) Error
13) Which of the following statement create a dictionary?
a) $\mathrm{d}=\{ \}$
b) $d=\{" j o h n ": 40$, "peter": 45$\}$
c) d = (40:"john", 45 : "peter" $\}$
d) All of the mentioned above
14) Write a statement in Python to declare a dictionary of 3 items, whose keys are "Country name" and respective values are "their Capital".

## Error Finding Questions

1) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code:

$$
\begin{aligned}
& \mathrm{L}=[\text { 'a', 'b', 'c', 'd'] } \\
& \mathrm{D}=5 \\
& \text { For I in len(L): }
\end{aligned}
$$

$\mathrm{L}[\mathrm{i}]+=\mathrm{D}$
$\mathrm{D}=\mathrm{D}-1$
print(D,L)
2) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code:

$$
250=\text { Number }
$$

WHILE Number 1000:
if Number => 750:
print(Number)
Number $=$ Number +100
else print(Number*2)
Number $=$ Number +50
3) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
def Tot(Number) \#Method to find Total
Sum=0
for C in Range ( 1 , Number +1 ): Sum $+=\mathrm{C}$
RETURN Sum
print Tot[3] \#Function Calls
print Tot[6]
4) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
STRING=""WELCOME
NOTE = " "
for $S$ in range $(0,8)$ :
if STRING[S]= ' E ':
print(STRING(S))
Else:
print "NO"
5) Rewrite the following Python program after removing all the syntactical errors (if any), underlining each correction:
def checkval:
$\mathrm{x}=\operatorname{input}($ "Enter a number")
if $\mathrm{x} \% 2=0$ :
print (x, "is even")
elseif $\mathrm{x}<0$ :
print (x, "should be positive")
else;
print (x, "is odd")
6) Rewrite the following code in Python after removing all syntax error(s).

Underline each correction done in the code.
$\mathrm{a}=200$
$\mathrm{b}=33$
if $b>a$
Print("b is greater than a")
elseif $\mathrm{a}==\mathrm{b}$ :
print(a and b are equal)
else:
print("a is greater than b")
7) Rewrite the following code in Python after removing all syntax error(s).

Underline each correction done in the code.
$\mathrm{x}==310$
for $z$ in Range $(0, x)$
if $z / / 5==0$ :
print ( $z^{* * 5}$ )
else if $z \% 5==0$ : print $(z+300)$
8) Rewrite the following code in Python after removing all syntax error(s).

Underline each correction done in the code.
Value=30
for val in range(0,Value)
If $\mathrm{val} \% 4==0$ :
print (val*4)
Elseif val\%5==0:
print (val+3)
Else
print(val+10)
9) Rewrite the following code in Python after removing all syntax error(s).

Underline each correction done in the code.
$30=$ To
for K in range (0,To)
IF k\%4==0:
print ( $\mathrm{K}^{*} 4$ )
Else:
print $(\mathrm{K}+3)$
10) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
$Y=$ integer(input("Enter 1 or 10 "))
if $Y==10$
for $Y$ in range $(1,11)$ :
print( Y )
else:
for $m$ in range $(5,0,-1)$ :
print(thank you)
11) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
Value=30
for VAL in range(0,Value)
If val $\% 4==0$ :
print (VAL*4)
Elseif val\%5==0:
print (VAL+3)
else
print(VAL+10)
12) Rewrite the following code after removing the error(s). Underline each correction.
for name in [ 'Shruthi','Priya','Pradeep', 'Vaishnav'):
print name
if name[0] = 'P'
break
else:
print('Over")
print("Done")
13) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.

```
d1= dict[]
i=1
n=input("Enter the number of entries:")
while i<=n:
    a= input("Enter Name:")
    b=int("Enter age:")
    d1 (a)=b
    i=i+1
disp=d1. key[]
for i in disp:
    print(i, '\t', 'd1[i]')
```

14) Find errors in the following code and rewrite the correct code by underlining the corrections:
```
num=5
for i in [0,10]:
    if num=i:
        print(num*2)
    else
    print (num *3)
```

15) Rewrite the following code in python after removing all syntax errors. Underline each correction done in the code:
Def func(a):
for $i$ in $(0, a)$ :
if i\%2 =0:

$$
\mathrm{s}=\mathrm{s}+1
$$

else if $i \% 5=0$

$$
\mathrm{m}=\mathrm{m}+2
$$

else:

$$
\mathrm{n}=\mathrm{n}+\mathrm{i}
$$

print(s,m,n)
func(15)
16) Rewrite the following code in Python after removing all syntax error(s).

Underline each correction done in the code.
Num = int(input("Number:")
$\mathbf{s}=0$
for $i$ in range (1,Num,3)
$\mathrm{s}+=1$
if $\mathrm{i} \% 2=0$ :
print(i*2)
Else
print(i*3)
print (s)
17) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.

```
DEF execmain():
    x = int( input("Enter a number:"))
    if (abs(x)=x):
    print"You entered a positive number"
    else:
        x=*-1
    print("Number made positive :",x)
execmain()
```

18) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
```
Num = int(("Number:"))
```

Sum $=20$
for $i$ in range $(10, N u m, 3)$
Sum+=i
if i\% $2=0$ :
printi*2
else:
print i*3
print Sum
19) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.

```
x= int("Enter the Value of x:"))
for in range[0,21];
    if }\textrm{x}=\textrm{y
        print (x+y)
    else:
            Print (x-y)
```

20) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
DEF result_even( ):
$\mathrm{x}=$ input("Enter a number")
if ( $\mathrm{x} \% 2=0$ ) :
print ("You entered an even number")
else:
print("Number is odd")
even ()
21) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
for Name in [Ramesh, Suraj, Priya]
IF Name[0]=' $\mathrm{S}^{\prime}$ :
print (Name)
22) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
```
input('Enter a word',W)
if W = 'Hello'
    print('Ok')
    else:
    print('Not Ok')
```

23) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.

## STRING=""WELCOME

NOTE""
for $S$ in range $[0,8]$ :
print STRING(S)
print S+STRING
24) Rewrite the following code in Python after removing all syntax error(s). Underline each correction done in the code.
NUM1=1234
1=DAY1
for $C$ in range[1,4]:
NUM+C=NUM1
DAY1=DAY1 +2
print C
print NUM1:DAY1

## Python Library module question

1) Name the Python Library modules which need to be imported to invoke the following functions: (i) ceil() (ii) randrange()
2) Name the function which splits the string using a specified separator and returns a tuple with three arguments-substring before separator, separator and substring after separator.
3) Identify and write the name of the module to which the following functions belong:
(i) ceil() (ii) dump()
4) Which module is used for working with CSV files in Python?
5) Which of the following function is used to write data in binary mode?
a) writer () b) output () c) dump () d) send ()
6) Name the mathematical function / method that is used to return greatest common divisor of $x$ and $y$.
7) Name the function that checks alphabets in a given string.
8) Which Python function is used to iterate over a sequence of numbers by specifying a numeric end value within its parameters?
(i)len() (ii) substr() (iii) random() (iv) range()
9) Name the built-in mathematical function / method that is used to return square root of a number.
10) Name the built-in mathematical function / method that is used to return an absolute value of a number.
11) Name the Python Library modules which need to be imported to invoke the following functions: (i) $\sin ($ ) (ii) randint ()
12) Name the built-in String function / method which is used to "Convert the first character to upper case" of the specified String.
13) Name the built-in function / method that is used to return the length of the object.
14) store any kind of object in file and allows to store python objects with their structure..
15) Name the function/method required to
(i) check if a string contains only uppercase letters
(ii) gives the total length of the list.

## 16)

Name the Python Library modules which need to be imported to invoke the following functions:
(i) $\cos ()$
(ii) randint()
17) Name the Python Library module which need to be imported to invoke the following function: (i) $\log ()$ (ii) ceil
18) Name the function / method required for
i) Finding second occurrence of $m$ in "madam".
ii) get the position of an item in the list

## Random module question

1) What possible output(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the minimum values that can be assigned to each of the variables BEGIN and LAST.
import random
VALUES $=[10,20,30,40,50,60,70,80]$
BEGIN = random.randint $(1,3)$
$L A S T=$ random.randint $(2,4)$
for I in range (BEGIN, LAST+1):
print (VALUES[I], end = "-")
(i) 30-40-50- (ii) 10-20-30-40- (iii) 30-40-50-60- (iv) 30-40-50-60-70-
2) Study the following program and select the possible output(s) from options (i) to (iv) following it. Also, write the maximum and the minimum values that can be assigned to the variable i.
import random
pick $=$ random.randint( 0,3 )
color=['Red', 'Green', 'Blue', 'Orange']
for $i$ in color: for $j$ in range(1,pick):
print(i,end="")
print()

| (i) | Red |
| :--- | :--- |
| Green |  |
|  | Blue |
|  | Orange |
| (iii) | RedGreen |
|  | BlueBlue |
|  | OrangeOrange |

Green
Blue orange BlueB OrangeOrange
(ii) Red Green Green BlueOrange
(iv) RedRed

GreenGreen
BlueBlue OrangeOrange
3) Study the following program and select the possible output(s) from options (i) to (iv) following it. Also, write the maximum and the minimum values that can be assigned to the variable Y.
import random
$X=$ random.random()
$Y=$ random.randint $(0,4)$
print(int(X), ":", $Y+\operatorname{int}(X))$
(i) $0: 0$ (ii) $1: 16$ (iii) $2: 4$ (iv) $0: 3$
4) What possible outputs(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the minimum and maximum values that can be assigned to the variable End .
import random
Colours = ["VIOLET","INDIGO", "BLUE", "GREEN", "YELLOW", "ORANGE", "RED"]
End = randrange(2)+3
Begin $=$ randrange $($ End $)+1$
for $i$ in range(Begin,End):
print(Colours[i],end="\&")
(i) INDIGO\&BLUE\&GREEN\& (ii) VIOLET\&INDIGO\&BLUE\&
(iii) BLUE\&GREEN\&YELLOW\& (iv) GREEN\&YELLOW\&ORANGE\&
5) What possible outputs(s) are expected to be displayed on screen at the time of execution of the program from the following code. Select which option/s is/are correct
import random
print(random.randint $(15,25)$, end=' ')
$\operatorname{print}\left((100)+\right.$ random.randint $(15,25)$, end $={ }^{\prime}$ ')
$\operatorname{print}((100)$-random.randint $(15,25)$, end $=$ ' ')
print((100) *random.randint $(15,25)$ )
(i) 15122842500
(ii) 21120761500
(iii) 1051071051800
(iv) 1101051051900
6) What possible output(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the maximum values that can be assigned to each of the variables FROM and TO.
import random
Arr=[20,30,40,50,60,70]
$F R O M=$ random.randint(1,3)
$T O=$ random. randint $(2,4)$
for a in range(FROM, TO+1):
print(Arr[a]. end="\#")
(i) 10\#40\#70\# (ii) 30\#40\#50\#
(iii) 50\#60\#70\# (iv) 40\#50\#70\#
6) Consider the following code and find out the possible output(s) from the options given below. Also write the least and highest value that can be generated.
import random as $r$
$\operatorname{print}(10+r$ randint $(10,15)$, end $=' `$
$\operatorname{print}(10+r$ randint $(10,15)$, end $=' `$
$\operatorname{print}(10+r$ randint $(10,15)$, end $=' `$
$\operatorname{print}(10+r . r a n d i n t(10,15))$
i) 25252521 iii) 23222520
ii) 23272220 iv) 21252024
7) What possible outputs(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the maximum values that can be assigned to each of the variables Lower and Upper.
import random
$A R=[20,30,40,50,60,70] ;$
Lower $=$ random.randint(1,4)
Upper $=$ random.randint $(2,5)$
for $K$ in range(Lower, Upper +1 ):
print (AR[K],end="\#")
(i) 10\#40\#70\# (ii) 30\#40\#50\# (iii) 50\#60\#70\# (iv) 40\#50\#70\#
8) What possible outputs(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the maximum values that can be assigned to each of the variables BEG and END.
import random

```
HEIGHTS=[10,20,30,40,50]
BEG=random.randint (0,2)
END=random.randint (2,4)
```

for $X$ in range (BEG, END) : print (HEIGHTS [X], end="@")
(a) 30@ (b) 10@20@30@40@50@ (c) 20@30 (d) 40@30@
9) What are the possible outcome(s) executed from the following code? Also, specify the maximum and minimum values that can be assigned to variable Number.

```
S="CBSEONLINE"
Number=random.randint(0,3)
N=9
while S[N]!='L':
        print(S[N]+S[N]+'%',end=' ')
        Number=Number+1
        N=N-1
```

(a) $\mathrm{ES} \% \mathrm{NE} \% \mathrm{IO} \%$
(b) $\mathrm{LE} \% \mathrm{NO} \% \mathrm{ON} \%$
(c) $\mathrm{NS} \% \mathrm{IE} \% \mathrm{LO} \%$
(d) $\mathrm{EC} \% \mathrm{NB} \% \mathrm{IS} \%$
10) What are the possible outcome(s) executed from the following code ? Also specify the maximum and minimum values that can be assigned to variable N .
import random
SIDES=["EAST", "WEST", "NORTH", "SOUTH"]
$N=$ random.randint $(1,3)$
OUT=""
for I in range( $N, 1,-1$ ):
$O U T=O U T+S I D E S[I]$
print(OUT)
(i) SOUTHNORTH (ii) SOUTHNORTHWEST (iii) SOUTH (iv) EASTWESTNORTH
11) What possible outputs(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the maximum values that can be assigned to each of the variables first, second and third.
from random import randint
$L S T=[5,10,15,20,25,30,35,40,45,50,60,70]$
first $=$ randint $(3,8)$
second $=$ randint $(4,9)$
third $=\operatorname{randint}(6,11)$
print(LST[first], "\#", LST[second],"\#", LST[third],"\#")
(i) 20\#25\#25\#
(ii) 30\#40\#70\#
(iii) 15\#60\#70\#
(iv) 35\#40\#60\#
12) What possible outputs(s) are expected to be displayed on screen at the time of execution of the program from the following code? Also specify the maximum and minimum value that can be assigned to pos variable.
import random
languages=['Python', ‘Java', 'PHP', 'HTML', 'C++']
pos $=$ random.randint(1,4)
for $c$ in range( 0, pos +1 ):
print (languages[c],end="\$")
(i) Python\&Java\&PHP\&HTML\&C++\& (ii) Java\&PHP\&HTML\&C++\&
(iii) Python\&Java\&
(iv) Python\&Java\&PHP\&
13) What are the possible outcome(s) expected from the following python code? Also specify maximum and minimum value, which L can have.
$p=$ 'MY PROGRAM'
$i=0$
while $p[i]!=$ ' $R$ ':
$L=$ random.randint $(0,3)+5$
print(p[L],'-',
$i+=L$
i) $R-P-O-R-i i) P-O-R-Y-i i i) O-R-A-G-i v) A-G-R-M-$

# KENDRIYA VIDYALAYA LBSNAA MUSSOORIE HOLIDAY HOME WORK FOR SUMMER BREAK [15-05-2023 (MONDAY) TO 03-06-2023 (SATURDAY)] 

## CLASS: XII (ACCOUNTANCY)

From any reference book do the write the questions and make solutions one by one as per following:

1. 5 questions related provisions in the absence of partnership deed.
2. 2 questions related of interest of partner's capital (product method - calculation journal entries)
3. 3 questions related of interest of partner's capital (related to different provisions - calculation and journal entries.
4. $1-1$ questions each from different situations of interest on drawings. (calculation and journal entries; total 21 questions on this topic)
5. 5 questions related to guarantee of profit. (calculation and presentation of profit and loss appropriation account.
6. 8 questions of different situations related to past adjustment.
7. 6 Features of partnership and 10 elements of partnership deed.

## CLASS: XII (BUSINESS STUDIES)

## Explain the following:

1. Meaning, features of management and importance of
2. Levels of management and Functions of management
3. Functions of each level of management
4. Nature of management as Science, Art and Profession along with their features.
5. Co-ordination and its importance
6. Meaning and nature of principles of management
7. Principles of management given by Henry Fayol. (Meaning, benefits of each principle and consequence of each principle if not followed in the organization)
8. Principles of scientific management
9. Techniques of scientific management
10. Elements / Dimensions / Components of business environment
11. Meaning and process of planning function of management
12. Different types of plan.
13. Difference between
(a) Principle of unity of command and principle of unity of direction
(b) Single use plan and Standing plan
(c) Policy and Procedure
(d) Method and Procedure
(e) Strategy and Program
(f) Policy and rule

Subject teacher: Viswanath Jaiswal PGT-Commerce

## KENDRIYA VIDYALAYA, LBSNAA MUSSOORIE

## SUMMER BREAK

## Holiday Home Work Class-6th <br> Subject-Social Science

Note-Make a separate note book for this home work
Hand writing must be neat and clean.

## A- ASSIGNMENT WORK

1-Who was the first president of the India?
2-Who is the chief minister of the Uttarakhand?
3-How many districts in the Garhwal mandal?
4-Name the major continent of the earth?
5-What is the full form of F.I.R.?
6-How do inscription help us in the study of history?
9 -How did the early people get their food?
10-What were the main things by which tools were made up the early people?
11-What are the three components of a map?
12-What are the four cardinal directions?
13 -Which is the third nearest planet to the sun?
14-The movement of the earth around the sun is known as?
15-Name the major continents of the earth?
16 -Punch marked coins were made of?
17 -What is the main works of the Police?

## B- READING SKILL

1-To read chapter 'What, When, Where,How(History)
2-To read chapter 'Understanding Diversity'(Civics)

## C-THINKING SKILLS

1-What do you think about Indian culture?(Write 10 lines)
2-What do you thinking about diversity in India?
D-MAP SKILLS
Do practice of all Indian States and capitals with the location on political map?

## KENDRIYA VIDYALAYA MUSSOORIE

## SUMMER HOLIDAY HOMEWORK 2023-24

Class: $8^{\text {th }} \mathrm{A} \quad$ Subject: Mathematics
A. Tick the correct option:

1. What should be added to $-5 / 4$ to get -1 ?
(I) $-1 / 4$ (II) $1 / 4$ (III) 1 (IV) $-3 / 4$
2. What should be subtracted from -5/4 to get -1?
(I) $-1 / 4$ (II) $1 / 4$ (III) 1 (IV) $-3 / 4$
3. Which of the following is the identity element?
(I) 1 (II) -1 (III) 0 (IV) None of these
4. Which of the following is the Multiplicative identity for rational numbers?
(I) 1 (II) -1 (III) 0 (IV) None of these
5. Which of the following is neither appositive nor a negative rational
number?
(I) 1 (II) 0 (III) Such a rational number does not exist
(IV) None of these
6. Which of the following lies between 0 and $\mathbf{- 1}$ ?
(I) 0 (II) -3 (III) $-2 / 3$ (IV) $4 / 3$
7. Which of the following is the reciprocal of a?
(I) -a (II) a (III) 1/a (IV) -1/a
8. Which of the following is the product of $7 / 8$ and $-4 / 21$ ?
(I) $-1 / 6$ (II) $1 / 12$ (III) $-16 / 63$ (IV) $-147 / 16$
9. Which of the following is the product of $(-7 / 8)$ and $4 / 21$ ?
(I) $-1 / 6$ (II) 12 (III) -63/16 (IV) -16/147
10.Represent the following rational numbers on the number line:
a) $1 / 4$
b) $5 / 4$
c) $-3 / 7$
d) $-11 / 5$
10. The solution of $2 x-3=7$ is:
(a) 2
(b) -2
(c) 5
(d) -5
11. Which of the following is not a linear equation.
(a) $2 x+5=1$
(b) $x-1=0$
(c) $y+1=0$
(d) $5 x+3$
12. The present age of Sahil's mother is three times the present age of Sahil. After 5 years their ages will add to 66 years. Find the present age of Sahil.
(a) 12
(b) 14
(c) 16
(d) 20
13. Find the solution of $2 x+3=7$
(a) 2
(b) -2
(c) 3
(d) None of these
14. Solve: $8 x=20+3 x$
(a) 4
(b) -4
(c) 2
(d) None of these
15. Solve: $\frac{2}{3}+x+1=\frac{7}{3}$
(a) 2
(b) -2
(c) 3
(d) None of these
16. Solve: $\frac{x}{4}+\frac{x}{6}=x-7$
(a) 12
(b) -12
(c) 3
(d) None of these
17. Find the solution of $\frac{3+x+5}{2+x+1}=\frac{1}{3}$
(a) 2
(b) -2
(c) 3
(d) None of these
B.Write and learn the all operational properties (closure,Commutative,etc.) of Rational Number.
C.Find 6 rational numbers between the following numbers:
b) 4 and 5
b) $6 / 7$ and $5 / 7$
c) $-3 / 5$ and $1 / 5$
D.Solve the following:
b) $1 / 7-3 / 14$
c) $3 / 6+4 / 5$
c) $14 / 25 \times 45 / 7$
d) $12 / 15 \div 5 / 2$
E. Write three rational numbers occurring between $1 / 3$ and 4/5 .
F. Multiply the negative of $2 / 3$ by the inverse of 9/7.
G. What should be added to $-16 / 3$ to make it $1 / 9$ ?
H. What should be subtracted from 5/8 to make it -1?
I. Write different properties of a rational number.
J. Represent 3/4 and 8/9 on a number line.
K. Find the greater of the two -12/5 and 4/9
L. Multiply the negative of 29/2 by its inverse.
M. Solve:
a. $2 y+9=4$
b. $\frac{x}{3}+\frac{5}{2}=\frac{-3}{2}$
c. $\frac{15}{4}-7 x=99$
d. $x-2=7$
e. $y+3=10$
f. $6=z+2$
g. $6 x=12$
h. $\frac{x}{5}=10$
i. $\frac{2 x}{3}=18$
j. $7 x-9=12$

Note- A. Do the homework in a separate notebook.
B. Complete chapter 1 and 2 in notebook.

## SUMMER HOLIDAYS H.W. SESSION 2023-24

## CLASS: XII-Biology

Write and learn L-2, L-3, L-4, L-5 Notes and Q/A
Prepare notes on:
i)Air Pollution and its Control
ii)Water Pollution and its Control
iii) Greenhouse Effect and Global Warming
iv)Ozone Depletion in the Stratosphere
v)Deforestation

Class: X-Science
Write and learn L 1, L-6 ,L-10 Q/A
Draw diagram of:
i)cross-section of leaf
ii)Open and Closed Stomatal pore
iii)Nutrition in Amoeba
iv)Human alimentary canal .

Prepare Notes on:
i) Ozone Layer and how it is getting depleted
ii)Nutrition

## Class:VIII-Science

L-1,L- 2, L-5 Q/A and important diagrams of L-2
Prepare notes on water pollution and air pollution
Draw chart of irrigation methods.
Prepare notes on Agricultural practices
Draw diagram of Solar System

CLASS VIII
HOLIDAYS HOME WORK FOR SUMMER VACATION
SUB : MATHS
Q1. EXPLAIN THE FOLLOWING PROPERTIES WITH THE HELP OF 10 EXAMPLES OF EACH.

- CLOSURE PROPERTY FOR RATIONAL NUMBER.
- COMMUTATIVE PROPERTY FOR RATIONAL NUMBER.
- ASSOCIATIVE PROPERTY FOR RATIONAL NUMBER.
- DISTRIBUTIVE PROPERTY OF MULTIPLICATION OVER ADDITION AND SUBTRACTION FOR RATIONAL NUMBER.

Q2. EXPLAIN THE CONCEPT OF RATIONAL NUMBER ON NUMBER LINE WITH THE HELP OF 10 EXAMPLES.

Q3. EXPLAIN DIFFERENT TYPES OF QUADRILATERAL AND THEIR PROPERTIES WITH THE HELP OF DIAGRAMS (DIAGRAMS WITH COLOURED PAPER).

Q4. EXPLAIN THE CONCEPT OF SOLUTION OF A LINEAR EQUATION IN ONE VARIABLE WITH THE HELP OF 20 EXAMPLES .(EXAMPLES MUST BE DIFFERENT FROM TEXT BOOK QUESTIONS).

Q5. SOLVE 10 STATEMENT PROBLEMS RELATED TO TOPIC "LINEAR EQUATIONS IN ONE VARIABLE" (EXAMPLES MUST BE DIFFERENT FROM TEXT BOOK QUESTIONS).

- GATHER INFORMATION ABOUT ONE HISTORICAL MONUMENT OF INDIA AND WRITE ABOUT IT IN 100 TO 150 WORDS SPECIFYING THE MATHS USED IN IT.
- USE SEPARATE NOTE BOOK FOR HOLIDAYS HOME WORK.
- DO HOLIDAYS HOMEWORK YOURSELF ONLY, BUT IF YOU FIND PROBLEM THEN ONLY TAKE THE HELP OF YOUR ELDERS.


## Kendriya Vidyalaya Mussoorie

Summer Vacation Homework 2023-2024
Class - IX Subject English

## 1.DESCRIPTIVE PARAGRAPH

i)You recently visited the Children's Park, a favourite place for all children, in your city. Write a description of the park in 100-150 words.
ii) One of your friends, Raman, is very gentle and polite to you. You regard him as your best friend. Describe him in 100-150 words.

## 2.STORY WRITING

Write a short story with the help of the cues given below. Give a suitable title to the story.
I) You encountered two strange people. They were different from normal human beings but they were quite interesting and exciting. As Amit/Manisha, using your ideas, write a story in about 150-200 words narrating your experience with them.
II)Going to Mumbai by train to attend marriage of a friend ..... got stuck in a traffic jam ..... reached the railway station late ..... boarded a wrong train ..... realised after two hours $\qquad$ now you ... ... ...
3.Revise and prepare question/ answer for your PT -2
4.Focus on Important characters and main points of the story.
$\qquad$ The End.

Learn and write the following :

- What is matter ?
- What are the characteristics of matter ?
- Differentiate between solids, liquid and gas .
- Define the following : Rigidity , density , fluidity
- Convert the following temperatures to the Celsius scale : $278 \mathrm{~K}, 500 \mathrm{~K}, 470 \mathrm{~K}, 20 \mathrm{~K}$
- Why does our palm feel cold when we put some acetone or petrol or perfume on it ?
- How does evaporation causes cooling?
- How does evaporation causes cooling ?
- Differentiate between homogenous and heterogeneous substances.
- What are the characteristics of solution, colloidal solution and suspension.
- Differentiate between mixtures and compounds .
- Differentiate between mixture and compounds.
- Define the following laws of chemical combination :
a) Law of conservation of mass
b) Law of Constant proportion
- Write the chemical formula of following compounds : a)Hydrogen chloride
c) Magnesium chloride ©Calcium hydroxide d)Carbon tetrachloride

ASSIGNMENT : Write name and symbol of elements mentioned in the table 3.1 in chapter 3(Atoms and molecules )on chart paper.

Class 9 Maths Holiday H．W
1．Revise All the work done in class．
2．Do Chap 1 \＆ 2 in H．W copy along with solved examples．
3．Learn and write tables from 2 to 20.
4．Draw 2－D figures and write their Perimeter and Area．
5．Draw 3－D figures and write their surface area and volume．

## OR

Learn \＆Practice any vedic method for mental calculations．
4．Do complete given activities ．
5．Do following worksheet in the pages of file to strengthen your understanding．

```
                MCO WORKSHEET-1 
1. Rational number }\frac{3}{40}\mathrm{ is equal to:
(a) 0.75 (b) 0.12 
\mathrm{ 2. A rational number between 3 and 4 is: }}\begin{array}{llll}{\mathrm{ (a) }\frac{3}{2}}&{\mathrm{ (b) }\frac{4}{3}}&{\mathrm{ (c) }\frac{7}{2}}&{\mathrm{ (d) }\frac{7}{4}}
3. A rational number between }\frac{3}{5}\mathrm{ and }\frac{4}{5}\mathrm{ is
    (a)\frac{7}{5}
4. A rational number between }\frac{1}{2}\mathrm{ and }\frac{3}{4}\mathrm{ is
    (a) \frac{2}{5}
\mathrm{ 5. Which one of the following is not a rational number:}}\begin{array}{llll}{\mathrm{ (a) }\sqrt{}{2}}&{\mathrm{ (b) )}}&{\mathrm{ (c) }\sqrt{}{4}}&{\mathrm{ (d) }\sqrt{}{-16}}
6. Which one of the following is an irrational number:
7. Decimal representation of }\frac{1}{5}\mathrm{ is
llll}\begin{array}{llll}{\mathrm{ (a) 0.2 (b) 0.5 }}&{\mathrm{ (c) 0.02 }}&{\mathrm{ (d) 0.002}}
8. }3\frac{3}{8}\mathrm{ in decimal form is:
    (a) 3.35 (b) 3.375
9. }\frac{5}{6}\mathrm{ in the decimal form is:
    (a) 0.8\overline{3}
10. Decimal representation of rational number }\frac{8}{27}\textrm{E
    \begin{array} { l l l l } { \text { (a) 0.⿳亠丷厂小⿱㇒日勺} } & { \text { (b) 0.296} } & { \text { (c) 0.296} } & { \text { (d) 0.296} } \end{array}
```

| MCQ WORKSHEET-II |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| CLASSIX: CHAPTER - 1 |  |  |  |  |
|  |  |  |  |  |
| 1. Which one of the following is a rational number: |  |  |  |  |
|  | $\begin{array}{ll}\text { (a) } \sqrt{3} & \text { (b) } \sqrt{2}\end{array}$ | (c) 0 | (d) $\sqrt{5}$ |  |
| 2. 0.6666 in $\frac{p}{q}$ form is: |  |  |  |  |
|  |  |  |  |  |
|  | $\begin{array}{ll}\text { (a) } \frac{6}{99} & \text { (b) } \frac{2}{3}\end{array}$ | (c) $\frac{3}{5}$ | (d) $\frac{1}{66}$ |  |
| 3. $4 \frac{1}{8}$ in decimal form is: |  |  |  |  |
|  | (a) 4.125 (b) 4.15 | (c) 4.15 | (d) $0 . \overline{415}$ |  |
| 4. The value of $(3+\sqrt{3})(3-\sqrt{3})$ is: |  |  |  |  |
|  | $\begin{array}{ll}\text { (a) } 0 & \text { (b) } 6\end{array}$ | (c) 9 | (d) 3 |  |
| 5. The value of $(\sqrt{5}+\sqrt{2})^{2}$ is: |  |  |  |  |
| $\begin{array}{llll}\text { (a) } 7+2 \sqrt{5} & \text { (b) } 1+5 \sqrt{2} & \text { (c) } 7+2 \sqrt{10} & \text { (d) } 7-2 \sqrt{10}\end{array}$ |  |  |  |  |
| 6. The value of $(\sqrt{5}+\sqrt{2})(\sqrt{5}-\sqrt{2})$ is: |  |  |  |  |
|  | $\begin{array}{ll}\text { (a) } 10 & \text { (b) } 7\end{array}$ | (c) 3 | (d) $\sqrt{3}$ |  |
| 7. The value of $(3+\sqrt{3})(2+\sqrt{2})$ is: |  |  |  |  |
| (a) $6+3 \sqrt{2}+2 \sqrt{3}+\sqrt{6}$ |  |  |  |  |
| (b) $3+3 \sqrt{2}+3 \sqrt{3}+6$ |  |  |  |  |
| (c) $6-3 \sqrt{2}-2 \sqrt{3}-\sqrt{6}$ |  |  |  |  |
| (d) $6-3 \sqrt{2}+2 \sqrt{3}-\sqrt{6}$ |  |  |  |  |
| 8. The value of $(\sqrt{11}+\sqrt{7})(\sqrt{11}-\sqrt{7})$ is: |  |  |  |  |
|  | (a) 4 (b) -4 | (c) 18 | (d) -18 |  |
| 9. The value of $(5+\sqrt{5})(5-\sqrt{5})$ is : |  |  |  |  |
| $\begin{array}{llll}\text { (a) } 0 & \text { (b) } 25 & \text { (c) } 20 & \text { (d) }-20\end{array}$ |  |  |  |  |
| 10. On rationalizing the denominator of $\frac{1}{\sqrt{7}}$, we get |  |  |  |  |
|  | $\begin{array}{ll} \text { (a) } 7 & \text { (b) } \frac{\sqrt{7}}{7} \end{array}$ | (c) $\frac{-\sqrt{7}}{7}$ | (d) $\sqrt{7}$ |  |

MCQ WORKSHEET-V $\frac{\text { CLASSIX: CHAPTER - } 1}{\text { NUMBER SYSTEM }}$

1. Which of the following is true?
E) Every rational number is an integer (b) Evy integer is ara number
2. For Positive real numbers a and $b$, which is not true?
$\begin{array}{ll}\text { (a) } \sqrt{a b}=\sqrt{a} \sqrt{b} & \text { (b) }(a+\sqrt{b})(a-\sqrt{b})=a^{2}-b\end{array}$
(c) $\sqrt{\frac{a}{b}}=\frac{\sqrt{a}}{\sqrt{b}} \quad$ (d) $(\sqrt{a}+\sqrt{b})(\sqrt{a}-\sqrt{b})=a+b$
3. Out of the following, the irrational number is
$\begin{array}{llll}\text { (a) } 1 \overline{5} & \text { (b) } 2.4 \overline{7} & \text { (c) } 1.2 \overline{7} & \text { (d) } \pi\end{array}$
4. To rationalize the denominator of $\frac{1}{\sqrt{a}+b}$,we multiply this by
$\begin{array}{llll}\text { (a) } \frac{1}{\sqrt{a}+b} & \text { (b) } \frac{1}{\sqrt{a}-b} & \text { (c) } \frac{\sqrt{a}+b}{\sqrt{a}+b} & \text { (d) } \frac{\sqrt{a}-b}{\sqrt{a}-b}\end{array}$
5. The number of rational numbers between $\sqrt{3}$ and $\sqrt{5}$ is
$\begin{array}{lll}\text { (a) One } & \text { (b) } 3 & \text { (c) none } \\ \text { (d) infinitely many }\end{array}$
6. If we add two irrational numbers, the resulting number $\begin{array}{lll}\text { (a) is always an irrational number } & \text { (b) is always a rational number }\end{array}$ c) may be a rational or an irration
7. The rationalizing factor of $7-2 \sqrt{3}$ is
$\begin{array}{llll}\text { (a) } 7-2 \sqrt{3} & \text { (b) } 7+2 \sqrt{3} & \text { (c) } 5+2 \sqrt{3} & \text { (d) } 4+2 \sqrt{3}\end{array}$
8. If $\frac{1}{7}=0 . \overline{142857}$, then $\frac{4}{7}$ equals
$\begin{array}{llll}\text { (a) } 0 . \overline{428571} & \text { (b) } 0 \overline{571428} & \text { (c) } 0 \overline{857142} & \text { (d) } 0 . \overline{285718}\end{array}$
9. The value of n for which $\sqrt{n}$ be a rational number is
$\begin{array}{llll}\text { (a) } 2 & \text { (b) } 4 & \text { (c) } 3 & \text { (d) } 5\end{array}$
10. $\frac{3 \sqrt{12}}{6 \sqrt{27}}$ equals
$\begin{array}{llll}\text { (a) } \frac{1}{2} & \text { (b) } \sqrt{2} & \text { (c) } \sqrt{3} & \text { (d) } \frac{1}{3}\end{array}$
11. $(3+\sqrt{3})(3-\sqrt{2})$ equals
$\begin{array}{llll}\text { (a) } 9-5 \sqrt{2}-\sqrt{6} & \text { (b) } 9-\sqrt{6} & \text { (c) } 3+\sqrt{2} & \text { (d) } 9-3 \sqrt{2}+3 \sqrt{3}-\sqrt{6}\end{array}$
Trepared by: M. S. KumarSwamy, TGT(Mahths) Page-9-

$$
\begin{aligned}
& \text { 12. The arrangement of } \sqrt{2}, \sqrt{5}, \sqrt{3} \text { in ascending order is } \\
& \begin{array}{llll}
\begin{array}{lll}
\text { (a) } \sqrt{2}, \sqrt{3}, \sqrt{5} & \text { (b) } \sqrt{2}, \sqrt{5}, \sqrt{3} & \text { (c) } \sqrt{5}, \sqrt{3}, \sqrt{2}
\end{array} & \text { (d) } \sqrt{3}, \sqrt{2}, \sqrt{5}
\end{array} \\
& \text { 13. If } \mathrm{m} \text { and } \mathrm{n} \text { are two natural numbers and } \mathrm{m}^{\mathrm{n}}=32 \text {, then } \mathrm{n}^{-=1} \text { is } \\
& \text { 14. If } \sqrt{10}=3.162 \text {, then the value of } \frac{1}{\sqrt{10}} \text { is } \\
& \begin{array}{llll}
\text { (a) } 0.3162 & \text { (b) } 3.162 & \text { (c) } 31.62 & \text { (d) } 316.2
\end{array} \\
& \begin{array}{l}
\text { 15. If }\left(\frac{3}{4}\right)^{0} \times\left(\frac{16}{9}\right)^{5}=\left(\frac{4}{3}\right)^{-22} \text {, then the value of } \mathrm{x} \text { is } \\
\begin{array}{llll}
\text { (a) } 2 & \text { (b) } 4 & \text { (c) }-2 & \text { (d) } 6
\end{array}
\end{array}
\end{aligned}
$$

http://www.art-and-archaeology.com/india/jaipur/jan1.html OR
Learn \& Practice any vedic method for calculation.

## KENDRIYA VIDYALAYA MUSSOORIE

HOLIDAY HOME WORK 2023-24 (summer vacation)
CLASS 9 th

1. Revision- PT-1 syllabus

History- Chapter 1, Geography- Chapter 1, Economics - Chapter 1,Political Science - Chapter 1.

* Revise five questions daily and write any two questions from them daily.
* Revise chapter wise map work also.
* Complete your note book properly.

2. PROJECT WORK :- 1

Make a project file on Disaster management.
(As per CBSE curriculum) Earthquake, Flood, Tsunami,etc.
PROJECT WORK :2
State Project notebook/ Scrap book / PPT on paired state karnatka State.
( Each student shall maintain state project- introduction, historical place indigenous games of the state and other important and interesting information about the state.

Summer Vacation Homework
Class 10 A English

## Q)Complete $A, B$ and $C$ in Project File

A.Write article on the following topics:
a)Importance of education
b)Digital learning-boon or bane
B. Write a letter to the editor of a national daily, expressing your opinion and views on the increased human dependence on technology. Right from a small child to an adult, or even an old man, everyone wants gadgets only-cell phone, l-pod, laptop, etc. This also has a negative effect on social relationships.
C. Fill in the blanks with a verb form that agrees with the subject.

1. Smoking cigarettes ............................. injurious to health. (is / are)
2. She $\qquad$ a living by writing stories. (makes / make)
3. Collecting stamps $\qquad$ his hobby. (is / are)
4. Neither Janet nor Maria $\qquad$ a car. (own / owns)
5. Either he or his parents $\qquad$ to pay the dues. (has / have)
6.The headmaster as well as the teachers $\qquad$ present at the meeting. (was / were)
6. He along with his friends $\qquad$ holidaying in Morocco. (is / are)
7. Two-thousand pounds $\qquad$ not a small sum. (is / are)
8. Mathematics $\qquad$ difficult for many students. (is / are)
9. Rohan and Sania $\qquad$ cousins. (is / are)
10. Neither ghee nor butter $\qquad$ with me. (agree / agrees)
11. I know a man who $\qquad$ old radios. (repair / repairs)
D.Write question-answers of the following lessons in HW notebook.
1.A letter to God
2.Nelson Mandela
3.A triumph of surgery.
..........The End $\qquad$

## CLASS X MATHS HOLIDAY HOME WORK

1. Revise all the work done in class.
2. Write a paragraph on the topic ' ADVANTAGES OF STUDYING MATHS' ( 200 words)
3. Learn tables from 11 to 20.
4. Write and learn square and square roots from 1 to 30 .
5. Write and learn cube and cube roots from 1 to 15 .
6. Study about any one famous Indian mathematicians and write about their contribution to Mathematics.
7. Solve the following worksheets.

## MATHS WORKSHEET

CLASS X

## CHAPTER: REAL NUMBERS

1. Find HCF and LCM of 625,1125 and 2125 using prime factorisation.
2. Find the HCF and LCM of 96 and 404 using prime factorisation.
3. The HCF of two numbers is 9 and their LCM is 2016 . If the one number is 54 , then find the other number.
4. If $p$ and $q$ are positive integers such that $p=a b^{2}$ and $q=a^{2} b$, where ' $a$ ' and ' $b$ ' are prime numbers, then find the LCM ( $p, q$ ).
5. Given that $\sqrt{ } 5$ is irrational, prove that $3-2 \sqrt{ } 5$ is irrational.
6. Find the ratio of LCM and HCF of the least composite and the least prime numbers.
7. Given that $\sqrt{ } 5$ is irrational, prove that $2+3 \sqrt{ } 5$ is irrational.
8. Prove that $\sqrt{ } 3$ is an irrational number.
9. Prove that $\sqrt{ } 5$ is an irrational number.
10. Show that the number $6^{n}$ never end with digit 0 for any natural number $n$.
11. Prove that $\sqrt{ } 3+\sqrt{ } 5$ is an irrational number

## MATHS WORKSHEET

## CLASS X

## CHAPTER: POLYNOMIALS

1. If $\alpha, \beta$ are the zeroes of the polynomial $P(x)=4 x^{2}+3 x+7$, then find the value of $\underline{1}+\underline{1}$
a $\beta$
2. If one zero of the quadratic polynomial $2 x^{2}+p x+4$ is 2 , find the other zero. Also, find the value of $p$.
3. Find a quadratic polynomial whose one zero is 5 and product of zeroes is 30 .
4. Find a quadratic polynomial whose zeroes are 3 and -5 .
5. Find a quadratic polynomial whose zeroes are $5+\sqrt{ } 2$ and $5-\sqrt{ } 2$.
6. If the product of the zeroes of the polynomial $a x^{2}-6 x-6$ is 4 , then find the value of a. Also find the sum of zeroes of the polynomial.
7. Find the zeroes of the quadratic polynomial $x^{2}-2 x-8$ and verify the relationship between the zeroes and the coefficients of the polynomial.
8. Find the zeroes of the quadratic polynomial $6 x^{2}-3-7 x$ and verify the relationship between the zeroes and the coefficients of the polynomial.
9. Find the zeroes of the quadratic polynomial $2 x^{2}-x-6$ and verify the relationship between the zeroes and the coefficients of the polynomial.

## MATHS WORKSHEET

## CLASS X

## CHAPTER: PAIR OF LINEAR EQUATIONS

1. Find the value of $k$ for which system of equation $2 x+3 y=5$ and $4 x+$ $\mathrm{ky}=10$ has infinite number of solutions.
2. Check the consistency of the pair of linear equations $2 x+3 y=5$ and $4 x$ $+6 y=10$.
3. Find the number of solutions of the pair of equations $x+2 y+5=0$ and $-3 x-6 y+1$
$=0$.
4. Given the linear equation $3 x+4 y-8=0$, write another linear equation in two variables such that the geometrical representation of the pair so formed is parallel lines.
5. Find whether the following pair of linear equations is consistent or in consistent: $3 x$
$+2 y=8$ and $6 x-4 y=9$.
6. The area of a rectangle gets reduced by 9 square units, if its length is reduced by units and breadth is increased by 3 units. If we increase the length by 3 units and the breadth by 2 units, the area increases by 67 square units. Find the dimensions of the rectangle.
7. Five years ago, Nuri was thrice as old as Sonu. Ten years later, Nuri will be twice as old as Sonu. How old are Nuri and Sonu?
8. A part of monthly hostel charges in a college is fixed and the remaining depends on the number of days one has taken food in the mess. When a student ' $A$ ' takes food for 22 days, he has to pay Rs. 1380 as hostel charges; whereas a student ' $B$ ', who takes food for 28 days, pays Rs. 1680 as hostel charges. Find the fixed charges and the cost of food per day.
9. Meena went to a bank to withdraw Rs 2,000. She asked the cashier to give her Rs. 50 and Rs. 100 notes only. Meena got 25 notes in all. How many notes of Rs. 50 and Rs. 100 she received?
10. The ratio of income of two persons is $9: 7$ and the ratio of their expenditure is $4: 3$, if each of them manage to save Rs. 2000/month.

Find their monthly incomes.
11.Do solved examples of A.P.

Solve previous years Board Papers of Chapters done in the class.

## KENDRIYA VIDYALAYA MUSSOORIE

HOLIDAY HOME WORK 2023-24 (summer vacation)
CLASS $10^{\text {TH }}$

1. Revision work for PT-1

History-Chapter 1, Geography- Chapter 1, Economics - Chapter 1,Political Science

- Chapter 1.

Revise five questions daily and write any two questions from them daily.
3. Revise chapter wise map work also.

Complete your note book properly.
2. PROJECT WORK :- 1

Every students has to prepare project on any one of the following topics:

1. Consumer Awareness
2. Social issues
3. Sustainable Development

## SUMMER BREAK

HOLIDAY ASSIGNMENT 2023-24
Class-12C
Subject-Political Science
Political Science Project-
Prepare a project according to CBSE guidelines.
Some suggested topics are:
A. (ASEAN).
B.SAARC
C.EU

General Instructions:

1. Project should be summed up in 10-12 pages.
2. Read and revise the chapters taught in the class. Note-Make a separate note book for holiday home work

Section A

1. What was the Soviet System?

2-Timeline of Disintegration of the Soviet Union?
3-What is the Consequences of Disintegration?
4. Timeline of European Integration?

## Section B

5. The rise of Chinese economy?
6.What do you mean by India-China Relations?

7-How many Principle Organ of United Nation? Describe it 8-Why International Organisations?

Section C
9-What is the timeline of Founding of the United Nations?
10-What is the reasons for Ethnic conflicts in India?
11-Mention two areas each of cooperation and disagreement between India and
Bangladesh?
12-List three challenges to democracy in Nepal?
13-The peace and prosperity of countries lay in the establishment and strengthening of regional economic organisations. Justify this statement.
14-Solve the question paper(Political science)of April-May Monthly examination 2023-24.

## Holiday Homework (Chemistry)

1. Study all the concepts from chapter $1,2 \& 3$.
2. Solve all intext and example questions from first two chapters.
3. From exercise- Chapter $1 \quad \mathrm{Q} 4,7,8,9,11,12,14,16,20,21,23,24 \& 25$.
4. Chapter 2 Q no. $4,6,8,12,20,21,23,27,32,35,40,41$.
5. Chapter-3 (All questions)

# KENDRIYA VIDYALAYA LBSNAA MUSSOORIE HOLIDAY HOMEWORK SUBJECT:- ECONOMICS 

## CLASS: XII

1. Prepare one Project for the session 2023-24.

2. Distinguish between final goods and intermediate goods.
3. Explain circular flow of income in a two sector economy .
4. Distinguish between stock and flow variables with examples.
5. Explain the functions of money.
6. What is meant by money supply? Define M1 measure of money supply.
7. How does the central bank control the credit with the help of 'Repo Rate'? Explain.
8. Explain the process of credit creation by commercial banks.
9. If planned savings fall short of planned investment in an economy, state it's likely impact on output and employment.
10. Explain the process of multiplier mechanism with the help of an example.
11. What is fiscal policy? How is it used to correct excess and deficient demand?
12. Distinguish between inflationary gap and deflationary gap. Show deflationary gap on a diagram.
13. What is the difference between fiscal policy and monetary policy? Explain in brief two methods of fiscal policy to control excess demand.
14. What do you understand by the concept of full employment? Does it refer to a situation of zero unemployment?

## CLASS 6 SESSION 2023-2024

SUMMER VACATION H.W
Q. 1 Write 3 stories on-

1) The thirsty crow
2) Greedy dog
3) Fox and the crow.
Q. 2 Write an application requesting your principal to grant you three days leave as you are sick .
Q.3. Write a letter to your friend inviting him on your birthday party.
Q.4. Write paragraph on
4) Importance of Homework.
5) Importance of Trees
6) My pet
7) The subject I like the most

## Kendriya Vidyalaya Mussoorie

CLASS 7TH 2023-2024
SUMMER VACATION H.W.
Q. 1 Application writing-

1) Write an application to the principal requesting him/her for fee concession.
2) Write an application to the principal requesting for an excursion.
Q. 2 Letter Writing-
3) Write a letter to your uncle thanking him for the birthday present.
4) Write a letter to your father asking him to send you money for buying books.
Q.3. Paragraph writing-
5) My pet 2) Pollution 3) Importance of education 4) Save water Save life.
Q.4.Notice Writing
6) You have a lost your notebooks. Write a notice for this giving necessary information.
2)Write a notice for organizing an Inter-house Group dance competition OR painting competition.

## 1 STORY WRITING

Complete the story by using the given outlines;
A farmer had five sons $\qquad$ were strong and $\qquad$ always quarrelled $\qquad$ the farmer wanted
$\qquad$
$\qquad$ wanted to live in peace $\qquad$ words of advice $\qquad$ not have much effect $\qquad$ called all his sons $\qquad$ bundle of sticks $\qquad$ break these sticks without separating ___ Each of the tried one by one $\qquad$ used their full strength $\qquad$ the old man separated the sticks They could break the sticks easily $\qquad$ farmer said $\qquad$ strong as long as it is tied up $\qquad$ will be weak if you are divided.

## 2 LETTER WRITING (Letter to the Editor)

Write a letter to the Editor regarding the problem of waterlogging in your area.
You are Raj / Rani of Dharma colony, Ramgarh.

## 3.DIARY ENTRY

You went to receive your uncle and aunt from the Bangalore railway station. Write a diary where you share your experience of the journey from home to the railway station.

4 Write an article on the topic:
The Purpose Of Education
Do reading practice daily, underline important words and learn spellings

गृह कार्य / HOME ASSIGNMENTS
विषय / Subject - Geography H. HW
दिनांक / Date $\qquad$ 11) $5 / 23$
$\rightarrow$ Identify atteast 15 megs from Primary activities.
$\rightarrow 5$ world Map and 5 India Map.
$\rightarrow$ Write a note on Hunting and Gathering.
$\rightarrow$ Define Primary Activities
$\rightarrow$ Note on Pastoralism.
$\rightarrow$ What is Commercial livestock, rearing?
$\rightarrow$ Differentiate between Primitive Subsistence agriculture and Intensive subsistence agriculture.
$\rightarrow$ Note on Plantation Agriculture.
$\rightarrow$ Note on Extensive Commercial Grain Cultivation.
गृह कार्य / HOME ASSIGNMENTS
बय / Subject
दिनांक / Date $\qquad$
$\rightarrow$ What is Mix farming and dairy farming. 9
$\rightarrow$ What is Mediterranean agriculture. ?
$\rightarrow$ What is Truck farming?
$\rightarrow$ What is cooperative and Collective farming?
$\rightarrow$ What is Mining ? Factors which affect mining.
$\rightarrow$ What are the methods of Mining?

## Kendriya Vidyalaya Mussoorie Summer Holiday Homework 2023-24 Class- VI A/B Subject-Maths

1). Write the Roman Numeral from 1 to 500 .
2). A Crore has $\qquad$ lakhs.
3). The successor of 999 is $\qquad$
4).Even number is divisible by $\qquad$
5). is the Smallest natural number .
6). Insert commas suitably \& write the number name of
i) 16573449
ii) $\mathbf{2 8 7 6 5 1 0 0 9}$ according to Indian system of numeration
7). write the first 5 multiples of " 8 ".
8). Find the sum by suitable arrangement.
i) $832+553+168+447$
ii) $3578 \times 123-3578 \times 23$
9). Write the numeral for "Ten Crore Sixty five lakhs Twenty One thousand Sixty Three".
10). Find the difference between the greatest and the least 6 -digit number.
11). Population of a town was $4,95,000$ in the year 2019. In the year 2020 it was to be decreased by 72,958 . What was the population of that town in 2020?
12). To stitch a shirt, 2 m 15 cm cloth is needed. Out of 40 m 50 cm cloth, how many shirts can be stitched and how much cloth will remain?
13).Raju had Rs.6980/- with him .He bought a fan for Rs.1900/and a music system for Rs.3080/-.Find the amount that is left with Raju.
14) i) Add: $24560+379+1467$
ii) Subtract 9457 from 16115
iii) Multiply 29840 by 26 iv) Divide 56646 by 27
15). Find the factors of : a) 45 b) 16 c) 8 d) 100
16). Insert commas Suitably \& write the number names according to International Number System
i) 45296510
ii) 965006467
iii) 11203688
17) Learn and write (two times) tables from 2 to 20.

## Kendriya Vidyalaya Mussoorie

## SUMMER VACATIONS HOMEWORK

## CLASS - IX ${ }^{\text {th }}$, SUBJECT - MATHS

Q.01- Solve the following and find 3 rational between
I) $1 / 3 \& 1 / 2$
II) $-2 \& 0$
Q.02- Write 2 rational numbers between $2 / 3$ \& 5/6
Q.03- Which of the following decimal have terminating
I) $7 / 20$
II) $2 / 13$
III) $23 / 7$
IV) $133 / 125$
Q.04- Express these in the form of $p / q$
I) 0.6 (Bar 6)
II) 0.27 (Bar 27)
III) 3.7 (Bar 7)
Q.05- Identify that following are rational or irrational
I) $\sqrt{121}(\operatorname{Root} 121)$
II) $(3+\sqrt{5})-\sqrt{5}$
III) $2 \sqrt{27} / \sqrt{3}$ (Root 27 \& root 3 )
IV) $\sqrt{ } 135$ (Root 135)
V) 1.21 (Bar 21)
VI) $\mathbf{1 . 1 0 1 0 0 1 0 0 0}$
Q.06- Rationalise
I) $\sqrt{5} / \sqrt{3}+\sqrt{2}$
II) $2+\sqrt{3} / \sqrt{7}-\sqrt{2}$
III) $4 / \sqrt{7}+\sqrt{3}$
Q.07- Find the value of $a \& b$, if
I) $\sqrt{3-1} / \sqrt{3}+1=a+b \sqrt{3}$
II) $\sqrt{3}+2 / \sqrt{3-2}=a+b \sqrt{2}$
III) $\sqrt{7-1} / \sqrt{7+1}-\sqrt{7+1} / \sqrt{7-1}=\mathbf{a}+\mathbf{b} \sqrt{7}$
Q.08-Simplify the following
I) $(\sqrt{2}+2)^{2}$
II) $(2-\sqrt{2})(2+\sqrt{2})$
III) $(\sqrt{2}+\sqrt{3})^{2}$
Q.09- Find the remainder when $\left(y^{3}+y^{2}-2 y+5\right)$ is divided by $(y-5)$ with division method.
Q.10-Find the remainder when polynomial ( $x^{4}-3 x^{2}+2 x-5$ ) is divided by ( $\mathrm{x}-2$ ) by remainder theorem.
Q.11- Complete chapter $1^{\text {st }}$ and chapter $2^{\text {nd. }}$.
Q.12- Revise chapter $1^{\text {st }}$ and chapter $2^{\text {nd }}$.

## Kendriya Vidyalaya Mussoorie

## SUMMER VACATIONS HOMEWORK

## CLASS - IX ${ }^{\text {th }}$, SUBJECT - MATHS

Q.01- Solve the following and find 3 rational between
I) $1 / 3 \& 1 / 2$
II) $-2 \& 0$
Q.02- Write 2 rational numbers between $2 / 3$ \& 5/6
Q.03- Which of the following decimal have terminating
I) $7 / 20$
II) $2 / 13$
III) $23 / 7$
IV) $133 / 125$
Q.04- Express these in the form of $p / q$
I) 0.6 (Bar 6)
II) 0.27 (Bar 27)
III) 3.7 (Bar 7)
Q.05- Identify that following are rational or irrational
I) $\sqrt{121}(\operatorname{Root} 121)$
II) $(3+\sqrt{5})-\sqrt{5}$
III) $2 \sqrt{27} / \sqrt{3}$ (Root 27 \& root 3 )
IV) $\sqrt{ } 135$ (Root 135)
V) 1.21 (Bar 21)
VI) $\mathbf{1 . 1 0 1 0 0 1 0 0 0}$
Q.06- Rationalise
I) $\sqrt{5} / \sqrt{3}+\sqrt{2}$
II) $2+\sqrt{3} / \sqrt{7}-\sqrt{2}$
III) $4 / \sqrt{7}+\sqrt{3}$
Q.07- Find the value of $a \& b$, if
I) $\sqrt{3-1} / \sqrt{3}+1=a+b \sqrt{3}$
II) $\sqrt{3}+2 / \sqrt{3-2}=a+b \sqrt{2}$
III) $\sqrt{7-1} / \sqrt{7+1}-\sqrt{7+1} / \sqrt{7-1}=\mathbf{a}+\mathbf{b} \sqrt{7}$
Q.08-Simplify the following
I) $(\sqrt{2}+2)^{2}$
II) $(2-\sqrt{2})(2+\sqrt{2})$
III) $(\sqrt{2}+\sqrt{3})^{2}$
Q.09- Find the remainder when $\left(y^{3}+y^{2}-2 y+5\right)$ is divided by $(y-5)$ with division method.
Q.10-Find the remainder when polynomial ( $x^{4}-3 x^{2}+2 x-5$ ) is divided by ( $\mathrm{x}-2$ ) by remainder theorem.
Q.11- Complete chapter $1^{\text {st }}$ and chapter $2^{\text {nd. }}$.
Q.12- Revise chapter $1^{\text {st }}$ and chapter $2^{\text {nd }}$.

## Kendriya Vidyalaya Mussoorie Summer Holiday Homework 2023-24 Class- VI A/B Subject-Maths

1). Write the Roman Numeral from 1 to 500 .
2). A Crore has $\qquad$ lakhs.
3). The successor of 999 is $\qquad$
4).Even number is divisible by $\qquad$
5). is the Smallest natural number .
6). Insert commas suitably \& write the number name of
i) 16573449
ii) $\mathbf{2 8 7 6 5 1 0 0 9}$ according to Indian system of numeration
7). write the first 5 multiples of " 8 ".
8). Find the sum by suitable arrangement.
i) $832+553+168+447$
ii) $3578 \times 123-3578 \times 23$
9). Write the numeral for "Ten Crore Sixty five lakhs Twenty One thousand Sixty Three".
10). Find the difference between the greatest and the least 6 -digit number.
11). Population of a town was $4,95,000$ in the year 2019. In the year 2020 it was to be decreased by 72,958 . What was the population of that town in 2020?
12). To stitch a shirt, 2 m 15 cm cloth is needed. Out of 40 m 50 cm cloth, how many shirts can be stitched and how much cloth will remain?
13).Raju had Rs.6980/- with him .He bought a fan for Rs.1900/and a music system for Rs.3080/-.Find the amount that is left with Raju.
14) i) Add: $24560+379+1467$
ii) Subtract 9457 from 16115
iii) Multiply 29840 by 26 iv) Divide 56646 by 27
15). Find the factors of : a) 45 b) 16 c) 8 d) 100
16). Insert commas Suitably \& write the number names according to International Number System
i) 45296510
ii) 965006467
iii) 11203688
17) Learn and write (two times) tables from 2 to 20.

## Holiday Home work (Science)

## CLASS - IX A

## Learn and write the following :

- What is matter ?
- What are the characteristics of matter ?
- Differentiate between solids, liquid and gas .
- Define the following :

Rigidity, density, fluidity

- Convert the following temperatures to the Celsius scale : 278 K , 500 K , 470 K , 20 K
- Why does our palm feel cold when we put some acetone or petrol or perfume on it ?
- How does evaporation causes cooling?
- How does evaporation causes cooling ?
- Differentiate between homogenous and heterogeneous substances.
- What are the characteristics of solution, colloidal solution and suspension.
- Differentiate between mixtures and compounds
- Differentiate between mixture and compounds.
- Define the following laws of chemical combination :
a) Law of conservation of mass
b) Law of Constant proportion
- Write the chemical formula of following compounds :
a)Hydrogen chloride
b) Magnesium chloride
c)Calcium hydroxide
d)Carbon tetrachloride

ASSIGNMENT : Write name and symbol of elements mentioned in the table 3.1 in chapter 3( Atoms and molecules )on chart paper.

## VI

Write and learn the following :

1. Q no $1,2,3,4,5$ of chapter (Components of food )
2. Q no $1,3,4,5,6,7$ of chapter ( Sorting materials into groups)
3. Write 5 examples of the following objects:
a) Transparent object
b) Translucent object
c) Opaque object
4. Write 4 examples of following types of plants:
a) Herb
b) Shrub
c) Tree
5. Draw the well labelled diagram of leaf.

ASSIGNMENT : i) Collect the leaves showing reticulate and parallel venation.
ii) Mention the food that you ate for any two days, also mention the type of nutrient that you get from that food. Write this information in tabular form.

## VII

Learn and write the following :

1. Q No $1,2,5,6,7,9,10$ of chapter (Nutrition in plants )
2. $Q$ No $1,2,4,5,9,11$ of chapter (2)
3. Write 5 examples of following :
a) Conductor
b) Insulators
4. Q No $3,4,8$ of chapter ( Heat)

ASSIGNMENT : Draw the well labelled diagram of following :
a) Human digestive system
b) Amoeba

## VIII

Learn and write the following :

1. Define the following :
a) Weed
b) Manure
c) Communicable diseases
d) Antibiotic
e) Fossil fuels
2. Learn and write Q no 1-10 of chapter ( Crop Production and management)
3. Learn and write $Q$ no 1-9 of chapter (Microorganisms: friends and foe)
4. Explain the process of formation of petroleum.
5. Learn and write Q no 4,5 of chapter ( Coal and petroleum)

ASSIGNMENT : Draw the nitrogen cycle on chart paper.

1. Write Questions and answer of $C h-2$ of SPL With Glossary.
2. Attempt Exercise from $\mathrm{ch}-1$ \& $\mathrm{ch}^{-2}$ of Historr.
3. Read $\mathrm{ch}^{-1}$ \& $\mathrm{Ch}-2$ of History.
4. India map - state and capitals.

## संस्कुत गृहकार्य

## कक्षा 6

1. बालक बालिका पुष्प मुनि भानु शब्द रुपाणि एकबारं लिखत।
2. पठ् गम् धातुरूपौ लिखत लट् लृट् लङ् लोट् लकारे
3. प्रथम पाठस्य शब्दार्थाः लिखत स्मरत च।

## कक्षा 7

1. प्रथम पाठस्य सर्वाणि श्लोकानि एक बारं लिखत स्मरत च।
2. नदी वारि मधु पितृणाम् शब्दरूपाणि एक बारं लिखत।
3. चर् कृ वश् दृश् धातुरूपाणि लिखत ( पश्च लकारेषु)

## कक्षा 8

1. प्रथम पाठस्य सर्वाणि श्लोकानि एकबारं लिखत
2. यत् शब्दरूपं त्रिषु लिङ्गेषु लिखित

एकपश्चाशततः शतं पर्यन्तं
3. संख्यावाचकशब्दाः लिखत
4. चर् धातु रूप पश्चलकारेषु लिखत

हिन्दी ग्रीष्म अवकाश गृहकार्य

## कक्षा 8

1. भारत की खोज से 12 पेज सुलेख लिखें
2. पत्र लेखन

क) नगर पालिका अध्यक्ष से को अपने क्षेत्र में व्याप्त गंदगी की समस्या को बताते हुए उसके निस्तारण हेतु प्रार्थना पत्र
ख) बड़ी बहन के विवाह में उपस्थित होने हेतु प्राचार्य महोदय से 7 दिन का अवकाश प्रार्थना पत्र
ग) अपने मित्र को मसूरी भ्रमण हेतु आमंत्रण पत्र
3. निबंध

सर्व शिक्षा अभियान।

