# SARALA BIRLA PUBLIC SCHOOL 

Mahilong, Ranchi<br>Assignment - 1 (2023-24)

## ENGLISH (301)

1. Prepare one A4 sheet for your class magazine on the theme 'SDG'. You can use paper of any colour and material. Do decorate it.
2. Tracing the roots: Prepare a PPT tracing your family's ancestry and take a trip down the memory lane. Talk to your grandparents and find out about their roots and whereabouts.

## ACCOUNTANCY (055)

1. Anna and Bobby were partners sharing profits and losses in the ratio 5: 3. Their Capital Accounts showed balances of Rs. 3,00,000 and Rs. 2,00,000 respectively as on April 1, 2018. The partnership deed provided for interest on capital @ $10 \%$ p.a. The firm earned a profit of Rs. 45,000 for the year ended March 31, 2019.
Show the distribution of profit among the partners by preparing the necessary account.
2. Calculate interest on drawings of Mr. Siddhant, a partner in a firm @ $10 \%$ p.a. for the year ended March 31, 2019 in each of the following alternative cases:
(a) If he withdrew Rs. 6,000 in the beginning of every month.
(b) If his drawings during the year were Rs. 30,000.
(c) If he withdraws Rs. 5,000 in the middle of each quarter.
3. $X$ and $Y$ were partners sharing profit and losses in the ratio 7: 3. Their Capital Accounts as on April 1, 2018 stood at X - Rs. 5,00,000 and Y - Rs. 4,00,000. Partners were allowed interest on capital @ 5 \% p.a. Drawings of the partners during the year ended March 31, 2019 were Rs. 72,000 and Rs. 50,000 respectively. Profit for the year before allowing interest on capital and salary to Y @ Rs. 5,000 per month was Rs. 8,00,000. $10 \%$ of the net profit was to be set aside as General Reserve. Pass journal entries for appropriation of profit of the firm.
4. The Capital Accounts of A, B and C stood at Rs. 1,50,000, Rs. 5,50,000 and Rs. 11,00,000 respectively as on March 31, 2018. Profit amounting to Rs. 3,00,000 for the year 2017-18 was distributed in the ratio 4: 1: 1 after allowing interest on capital @ $10 \%$ p.a. During the year, each partner withdrew Rs. 50,000 p.m. in the beginning of each month. The partnership deed was silent as to profit sharing ratio and interest on drawings but provided for interest on capital @ 12 \% p.a.
Pass necessary journal entry to rectify the above error. Show your workings clearly.
5. Karan and Varun were partners in a firm sharing profit and losses in the ratio 1: 2. Their fixed capitals were Rs. 2,00,000 and Rs. 3,00,000 respectively. Kishore was admitted as a new partner for $1 / 4^{\text {th }}$ share on April 1, 2016. He brought Rs. 2,00,000 as his capital which was to be kept fixed like the capitals of Karan and Varun. Kishore acquired his share of profit from Varun only. Calculate goodwill of the firm on Kishore's admission and the new profit-sharing ratio of Karan, Varun and Kishore.

## BUSINESS STUDIES (054)

1. Principles of Taylor and Fayol are mutually complementary. One believed that, management should not close its ears to constructive suggestions made by the employees, while the other suggested that a good company should have an time or cost reduction should be rewarded. Identify and explain the principles of Taylor and Fayol referred to in the above para.
2. A company wants to modify its existing product in the market due to decreasing sales. You can imagine any product about which you are familiar. What decisions/steps should each level of management take to give effect to this decision?
3. A firm plans in advance and has a sound organization structure with efficient supervisory staff and control system. On several occasion it finds that plans are not being adhered to. It leads to confusion and duplication of work. Advise remedy.
4. Ritu is the manager of the Northern Division of a large corporate house. At what level does she work in the organization? What are her basic functions?
5. 'Accent Electronics Ltd.' was operating its business in Malaysia. The company started exporting its products to India when the Prime Minister announced relaxation in import duties on electronic items. The company appointed retailers in India who had direct on-line links with the suppliers to replenish stocks when needed.
Identify and explain the dimensions of business environment discussed in the above case.

## ECONOMICS (030)

## Macro Economics

1 Will the following be included in gross domestic product / Domestic Income of India? Give reasons for each answer.
a) Services charges paid to a dealer (broker) in exchange of second-hand goods.
b) Purchase of new shares of a domestic firm.
c) Profits earned by a foreign bank from its branches in India.
d) Consultation fee received by a doctor.

2 How will you treat the following in estimating national income of India? Give reasons for your answer.
a) Scholarship given to Indian students studying in India by a foreign company.
b) Profits earned by branch of a foreign bank.
c) Profit earned by a branch of foreign bank in India.
d) Payment of salaries to its staff by an embassy located in New Delhi.
e) Interest received on loan given to a foreign company in India.
3. From the following data calculate (a) Gross domestic product at factor cost and (b) Factor income to abroad: Rs. (cr)
a) Compensation of employees 800
b) Profits 200
c) Dividends 50
d) Gross national product at market price 1400
e) Rent 150
f) Interest 100
g) Gross domestic capital formation 300
h) Net fixed capital formation 200
i) Change in stock 50
j) Factor income from abroad 60
k) Net indirect tax 120
4. From the following data calculate Gross national product at market price by (a) Income method and (b) expenditure method:

Rs. (cr)
a) Net domestic capital formation 375
b) Compensation of employees 600
c) Net indirect taxes 150
d) Profit 450
e) Private final consumption expenditure 1100
f) Rent 200
g) Consumption of fixed capital 115
h) Government final consumption expenditure 700
i) Interest 250
j) Mixed income of self-employed 500
k) Net factor income from abroad (-) 15
I) Net exports
(-) 25

## INDIAN ECONOMIC DEVELOPMENT

5. What were the various forms of revenue settlement adopted by the British in India? What was its impact?
6. Name those parts of Pakistan which were the part of British India. Why were those parts so important to India from the economic point of view?
7. What are the basic requirements for setting up any modern industry? Explain with few examples.
8. Prepare a pie chart for the occupational structure in India at the time of independence and current year. Do you find any change in it? Write your views on changing trends on occupational structure.

## ENTREPRENEURSHIP (066)

1. Explain the following:
a. Elevator Pitch
b. A pitch desk with oral narrative
c. An internal operational plan
2. Explain the following:
a. Routing
b. Scheduling
c. Dispatching
d. Follow Up
e. Inspection
3. What is a Joint Stock Company? Write down the features.
4. Explain the concept of PAN.
5. What is a Business Plan? What should a business plan cover?

## STANDARD MATHEMATICS (041)

1. Solve the following system of equations, using matrix method:

$$
\frac{2}{x}+\frac{3}{y}+\frac{10}{z}=4 \quad, \quad \frac{4}{x}-\frac{6}{y}+\frac{5}{z}=1 \quad, \quad \frac{6}{x}+\frac{9}{y}-\frac{20}{z}=2 \quad ; x, y, z \neq 0
$$

2. There are two real value(s) of, for which the value of the determinant $\Delta=\left[\begin{array}{ccc}1 & -2 & 5 \\ 2 & x & -1 \\ 0 & 4 & 2 x\end{array}\right]$ Is 86 . Find the value(s) of $x$.
3. Let $\mathrm{A}=\left[\begin{array}{cc}0 & -\tan \frac{x}{2} \\ \tan \frac{x}{2} & 0\end{array}\right]$ and $I$ is the identity matrix of order 2 . Show that $(I+A)=$ $(I-A) \cdot\left[\begin{array}{cc}\operatorname{Cos} x & -\operatorname{Sin} x \\ \operatorname{Sin} x & \operatorname{Cos} x\end{array}\right]$
4. If $\mathrm{A}=\left[\begin{array}{cc}x & y \\ z & -x\end{array}\right]$ and $A^{2}=I$, then obtain a relation between $x$, yand $z$.
5. If $\mathrm{A}=\left[\begin{array}{ll}3 & 1 \\ 7 & 5\end{array}\right]$, find $x$ \& $y$ such that $A^{2}+x I=y A$. Hence, find $A^{-1}$.
6. Find the inverse of $\left[\begin{array}{ccc}2 & -3 & 3 \\ 2 & 2 & 3 \\ 3 & -2 & 2\end{array}\right]$.
7. Examine the consistency of the following system of equations
$x-y+z=3$
$2 x+y-z=2$
$-x-2 y+2 z=1$.
If possible, also find the solution.
8. If $A$ and $B$ are symmetric matrices of the same order, then show that $(A B-B A)$ is skew symmetric.
9. Write the element a of a $3 \times 3$ matrix $A=\left[a_{i j}\right]$, whose elements are given by $\mathrm{a}_{\mathrm{ij}}=|\mathrm{i}-\mathrm{j}| / 2$
10. Find the area of triangle whose vertices are $A(-2,-3), B(3,2)$ and $C(-1,-8)$.

## APPLIED MATHEMATICS (241)

1. Solve the following system of equations, using matrix method:

$$
\frac{2}{x}+\frac{3}{y}+\frac{10}{z}=4 \quad, \quad \frac{4}{x}-\frac{6}{y}+\frac{5}{z}=1 \quad, \quad \frac{6}{x}+\frac{9}{y}-\frac{20}{z}=2 \quad ; x, y, z \neq 0
$$

2. There are two real value(s) of, for which the value of the determinant $\Delta=\left[\begin{array}{ccc}1 & -2 & 5 \\ 2 & x & -1 \\ 0 & 4 & 2 x\end{array}\right]$ Is 86 . Find the value(s) of $x$.
3. Let $\mathrm{A}=\left[\begin{array}{cc}0 & -\tan \frac{x}{2} \\ \tan \frac{x}{2} & 0\end{array}\right]$ and $I$ is the identity matrix of order 2 . Show that $(I+A)=$ $(I-A) \cdot\left[\begin{array}{cc}\operatorname{Cos} x & -\operatorname{Sin} x \\ \operatorname{Sin} x & \operatorname{Cos} x\end{array}\right]$
4. If $\mathrm{A}=\left[\begin{array}{cc}x & y \\ z & -x\end{array}\right]$ and $A^{2}=I$, then obtain a relation between $x$, yand $z$.
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## PHYSICAL EDUCATION (048)

1) What is the meaning of tournament? Draw knock-out fixture for 27 teams.
2) What is league tournament? Draw a fixture of 9 teams on the basis of league tournament using cycle method. Explain American method to declare the winner.
3) Now a days yoga plays a very important role in cure of various disease. Justify the statement by giving suitable examples of asanas for hypertension.
4) Discuss the role of various committees and their responsibilities to organise National level sports events.
