## CHAPTER

## Accounting Equation

## MEANING OF KEY TERMS USED IN THE CHAPTER

1. Accounting Equation
2. Assets
3. Liabilities
4. Capital

Accounting Equation shows the relationship among capital, liabilities and assets. Total assets are equal to the sum of capital and liabilities.
Mathematical Expression of Accounting Equation:
(i) Assets = Liabilities + Capital; or
(ii) Capital = Assets - Liabilities; or
(iii) Liabilities $=$ Assets - Capital

Assets are the resources that the business owns. They refer to properties or legal rights owned by the business, which can be measured in terms of money.
Liabilities are the financial obligations of an enterprise. In common parlance, it refers to financial obligations of the enterprise other than capital of the owners.
Capital is the amount invested by the owner in the business. It increases by the profit earned during the year and decreases by the loss incurred during the year and drawings made.

Or
Capital is the excess of assets over external liabilities, i.e., Capital $=$ Assets - Liabilities.

## CHAPTER SUMMARY

- Accounting Equation is the basis for Double Entry System of Book Keeping. Total assets of the business firm are provided by the creditors/lenders and the owners. Therefore, at any point of time, the total assets of a business are equal to its total liabilities. Liabilities to the outsiders are known as liabilities but liability to the owners, in accounting is referred to as capital.
We can express the relationship that exists among assets, liabilities and capital in the form of an accounting equation as follows:

$$
\begin{aligned}
& \text { Total Assets }=\text { Total Liabilities } \\
& \text { Or } \\
& \text { Total Assets }=\text { Liabilities }+ \text { Capital } \\
& \quad \text { Or } \\
& \text { Capital }=\text { Total Assets }- \text { Liabilities }
\end{aligned}
$$

## Solved Questions

## Illustration 1.

$X$ has following assets and liabilities as on 31st March, 2020. Ascertain his capital.
Cash ₹ 25,000; Bank ₹ 47,500 ; Debtors ₹ 18,000 ; Creditors ₹ 22,000 ; Plant and Machinery ₹ 80,000 ; Building ₹ 2,00,000; Furniture ₹ 24,000; Bills Receivable ₹ 56,500; Bills Payable ₹ 23,500.

## Solution:

$$
\begin{aligned}
\text { Assets }= & \text { Liabilities }+ \text { Capital } \\
& \quad \text { Or } \\
\text { Capital }= & \text { Assets }- \text { Liabilities } \\
= & (\text { Cash }+ \text { Bank }+ \text { Debtors }+ \text { Plant and Machinery }+ \text { Building }+ \\
& \text { Furniture }+ \text { Bills Receivable })-(\text { Creditors }+ \text { Bills Payable }) \\
= & ₹(25,000+47,500+18,000+80,000+2,00,000+24,000+ \\
& 56,500)-₹(22,000+23,500) \\
= & ₹ 4,51,000-₹ 45,500=₹ 4,05,500 .
\end{aligned}
$$

## Illustration 2.

Show the effect of following transactions on the accounting equation:
(i) Ram commenced business with cash ₹ $15,00,000$, Bank Balance ₹ $7,50,000$ and Bank Loan ₹ 2,00,000.
(ii) Purchased Car for ₹ $1,30,000$ by paying ₹ 85,000 in cash and balance at a later date.
(iii) Purchased 300 chairs @ ₹ 700 each from $X Y Z$ Ltd.
(iv) Purchased 2 tables @ ₹ 5,000 each to be used in his showroom and paid by cheque.
(v) Payment made to $X Y Z$ by cheque in full settlement after receiving $20 \%$ discount.
(vi) Paid commission ₹ $24,000.20 \%$ is for current year.

Solution: Refer to Page No. 6.3.

## Illustration 3.

Show the effect of following transactions on the accounting equation:
(i) Mr. Y started business with cash ₹ 4,00,000, Machinery ₹ 25,000, Furniture ₹ 15,000 and a loan of ₹ $1,75,000$.
(ii) He purchased goods of ₹ $1,00,000$ from $\mathrm{M} / \mathrm{s} X Y Z$. Traders who are willing to give cash discount of $5 \%$, if payment was made within 1 month.
(iii) Furniture is now valued at $75 \%$.
(iv) Sold goods of list price ₹ 20,000 at a profit of $33 \frac{1}{3} \%$ on cost price to Mr. Aman. He accepted a bill for $1 / 5$ th of the amount due and paid the remaining amount.
(v) Purchased Investment (Personal) of ₹ 5,000.
(vi) Paid instalment of Loan of ₹ 25,000 including interest on Loan of ₹ 3,000.
(vii) Paid Life Insurance premium for 8 months of ₹ 16,000 .
(viii) Paid rent ₹ 15,000 and security deposit to landlord ₹ 50,000 .
(ix) Charge interest on drawings ₹ 4,000 .

Solution: Refer to Page No. 6.4.

Solution: Refer to Illustration 2 on Page No. 6.2.

| Transactions |  |  |  |  |  | Ass |  |  |  |  |  | $=$ |  |  | Liabilitie | + | pital |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | $\begin{gathered} \hline \text { Cash } \\ \text { ₹ } \end{gathered}$ | $+$ | Bank ₹ |  | $\begin{gathered} \text { Car } \\ \text { ₹ } \end{gathered}$ |  | Chairs ₹ |  | Tables ₹ |  | Prepaid <br> Comm. (₹) |  | Bank Loan $₹$ | + | Creditor <br> for $\operatorname{Car}$ ( ${ }^{\text {₹ }}$ ) | $+$ | XYZ Ltd. ₹ | $+$ | Capital <br> ₹ |
| (i) | 15,00,000 |  | 7,50,000 | + |  | + | 0 | + | 0 | + | 0 | $=$ | 2,00,000 | + | 0 | + | 0 | + | 20,50,000 |
| (ii) | $(85,000)$ | $+$ | 0 | + | 1,30,000 | + | 0 | + | 0 | + | 0 | $=$ | 0 | + | 45,000 | + | 0 | + | 0 |
| New Equation | 14,15,000 |  | 7,50,000 | + | 30,000 |  | 0 | + | 0 | + | 0 | $=$ | 2,00,000 | + | 45,000 | + | 0 | + | 20,50,000 |
| (iii) | 0 |  |  | + |  |  |  | + | 0 | + | 0 | $=$ | 0 | + | 0 | + | 2,10,000 | + | 0 |
| New Equation | 14,15,000 |  | 7,50,000 |  | 1,30,000 |  | 0,000 |  | 0 | + | 0 | $=$ | 2,00,000 | + | 45,000 | + | 2,10,000 | + | 20,50,000 |
|  | 0 |  | $(10,000)$ | + |  |  |  |  |  | + | 0 | = | 0 | + | 0 | + | 0 | + | 0 |
| New Equation | 14,15,000 | + | 7,40,000 |  | 1,30,000 | + | 0,000 |  | 00 |  | 0 | $=$ | 2,00,000 | + | 45,000 | + | 2,10,000 | + | 20,50,000 |
| (v) | 0 |  | $(1,68,000)$ |  | 0 |  |  |  |  |  | 0 | $=$ | 0 | + | 0 | + | $(2,10,000)$ | + | 42,000 |
| New Equation | 14,15,000 | + | 5,72,000 |  | 1,30,000 |  | 0,000 | + | 0,000 |  |  | $=$ | 2,00,000 | + | 45,000 | + | 0 | + | 20,92,000 |
| (vi) | $(24,000)$ | $+$ | 0 | + | 0 | + |  | + | 0 |  | 200 |  | 0 | + | 0 | + | 0 | + | $(4,800)$ |
| New Equation | 13,91,000 | $+$ | 5,72,000 |  | 1,30,000 | $+$ | 0,000 | + | ,000 |  | 19,200 |  | 2,00,000 | + | 45,000 | + | 0 | + | 20,87,200 |

Solution: Refer to Illustration 3 on Page No. 6.2.


## Illustration 4.

Show the accounting equation on the basis of the following transactions and also the Balance Sheet of Mr. Rahul:
(i) Commenced business with cash ₹ 2,00,000.
(ii) Purchased goods from Ms. Neha ₹ 50,000.
(iii) Withdrew goods costing ₹ 10,000 for personal use.
(iv) Sold goods for cash (cost ₹ 35,000 ) ₹ 60,000 .
(v) Introduced fresh capital 50,000.
(vi) Paid telephone bills amounting to ₹ 3,000.
(vii) Goods costing ₹ 2,000 sold at a profit of $25 \%$ on cost.
(viii) Motorcycle purchased for personal use ₹ 18,000.
(ix) Paid Rent ₹ $18,000$.
(x) Paid Salaries ₹ 12,000 .

Solution: Refer to Page No. 6.6.

## Advanced Level Question

## Illustration 5.

Use Accounting Equation to show the effect of following transactions on assets, liabilities and capital and also show the Balance Sheet:

## Transactions

(i) Mohan started business with cash of ₹ 3,60,000, Goods ₹ 1,00,000, Debtors ₹ 20,000, Furniture ₹ 20,000 and Creditors ₹ 40,000 .
(ii) Goods costing $₹ 12,000$ sold to Ram at a loss of $10 \%$, out of which $₹ 4,000$ received in cash.
(iii) Cash deposited into bank ₹ 40,000 .
(iv) Outstanding Rent ₹ 10,000.
(v) Received cheque from Ram ₹ 6,400 in full settlement of ₹ 6,800 . Cheque deposited on the same date.
(vi) Prepaid Insurance ₹ 2,000 .
(vii) Paid to creditors ₹ 36,000 by cheque in full settlement of their accounts.
(viii) Depreciation on Furniture @ 10\%.
(ix) Unearned Commission ₹ 4,000.

Solution: Refer to Page Nos. 6.7 and 6.8.

Solution: Refer to Illustration 4 on Page No. 6.5.

| No. | Transactions | Assets |  |  | $=$$=$ | Liabilities <br> Ms. Neha (Creditor) ₹ | ++ | Capital <br> Capital <br> ₹ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Cash | + | Stock |  |  |  |  |
|  |  |  |  |  |  |  |  |  |
| 1 | Started business with cash <br> Purchased goods from Ms. Neha <br> New Equation | 2,00,000 | + | 0 | $=$ | 0 | + | 2,00,000 |
| 2. |  |  |  |  |  |  |  |  |
|  |  | 0 | + | 50,000 | $=$ | 50,000 | + | 0 |
|  |  | 2,00,000 | + | 50,000 | = | 50,000 | + | 2,00,000 |
| 3. | Withdrew goods for personal use | 0 | + | $(10,000)$ | = | 0 | + | $(10,000)$ |
|  | New Equation | 2,00,000 | + | 40,000 | $=$ | 50,000 | + | 1,90,000 |
| 4. | Sold goods for cash <br> New Equation | 60,000 | $+$ | $(35,000)$ | = |  | + | 25,000 |
|  |  | 2,60,000 | + | 5,000 |  | 50,000 | + | 2,15,000 |
| 5. | Introduced fresh capital <br> New Equation | 50,000 | + | 0 |  | 0 | + | 50,000 |
|  |  | 3,10,000 | + | 5,000 |  | 50,000 | + | 2,65,000 |
| 6. | Paid telephone bills <br> New Equation | $(3,000)$ | + | 0 |  | 0 | + | $(3,000)$ |
|  |  | 3,07,000 | + | 5,000 |  | 50,000 | + | 2,62,000 |
| 7. | Goods goods at a profit of $25 \%$ on cost | 2,500 |  | $(2,000)$ | = | 0 | + | 500 |
|  | New Equation | 3,09,500 |  | 3,000 | = | 50,000 | + | 2,62,500 |
| 8 | Purchased motorcycle for personal use | $(18,000)$ |  | 0 | $=$ | 0 | + | $(18,000)$ |
|  | New EquationPaid rent |  | + | 3,000 | $=$ | 50,000 | + | 2,44,500 |
| 9. |  |  | + | 0 | = | 0 | + | $(18,000)$ |
| 10. | New Equation <br> Paid Salaries <br> New Equation | 2,73,500 | + | 3,000 | $=$ | 50,000 | + | 2,26,500 |
|  |  | $(12,000)$ | + | 0 | $=$ | 0 | + | $(12,000)$ |
|  |  | 2,61,500 | + | 3,000 | $=$ | 50,000 | + | 2,14,500 |

BALANCE SHEET OF RAHUL

| as $a t . .$ |  |  |  |
| :--- | ---: | :--- | :--- | ---: |
| Liabilities | $₹$ | Assets | $₹$ |
| Capital | $2,14,500$ | Cash | $2,61,500$ |
| Ms. Neha (Creditor) | 50,000 | Stock | 3,000 |
|  | $2,64,500$ |  | $2,64,500$ |

Solution: Refer to Illustration 5 on Page No. 6.5.

| Transactions | Assets |  |  |  |  |  |  |  |  |  |  | $=$ |  |  | Liabilities + Capital |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | $\begin{gathered} \text { Cash } \\ ₹ \end{gathered}$ | + | Stock ₹ | + | Furniture ₹ | + | $\begin{gathered} \text { Debtors } \\ ₹ \end{gathered}$ | + | Prepaid Insu. (₹) | $+$ | $\underset{₹}{\text { Bank }}$ | $=$ | Creditors <br> (₹) | + | Unearned Comm. (₹) | + | Outstanding Rent ( ${ }^{\text {₹ }}$ ) | $+$ | Capital ₹ |
| (i) | 3,60,000 | + | 1,00,000 | + | 20,000 | + | 20,000 | + | 0 | $+$ | 0 | $=$ | 40,000 | + | 0 | $+$ | 0 | + | 4,60,000 |
| (ii) | 4,000 | - | 12,000 | + |  | + | 6,800 | + | 0 | + | 0 | $=$ | 0 | + | 0 | + | 0 | - | 1,200 (Loss) |
| New Equation | 3,64,000 | + | 88,000 | + | 20,000 | + | 26,800 | + | 0 | + | 0 | $=$ | 40,000 | + | 0 | + | 0 | + | 4,58,800 |
| (iii) | -40,000 | + | 0 | + |  |  | 0 | + | 0 | + | 40,000 | $=$ | 0 | + | 0 | + | 0 | + | 0 |
| New Equation | 3,24,000 | $+$ | 88,000 | + | 20,000 |  | 26,800 | + | 0 | + | 40,000 | $=$ | 40,000 | + | 0 | + | 0 | + | 4,58,800 |
| (iv) | 0 | + | 0 | + | 0 |  |  | + | 0 | + | 0 | $=$ | 0 | + | 0 | + | 10,000 | - | 10,000 |
| New Equation | 3,24,000 | + | 88,000 | + | 20,000 |  | 26,800 |  | 0 | + | 40,000 | $=$ | 40,000 | + | 0 | + | 10,000 | + | 4,48,800 |
| (v) | 0 | + | 0 | + |  | - | 6,800 |  |  | + | 6,400 | $=$ | 0 | + | 0 | + | 0 | - | 400 |
| New Equation | 3,24,000 | + | 88,000 | + | 20,000 | + | 20,000 |  |  | + | 46,400 | $=$ | 40,000 | + | 0 | + | 10,000 | + | 4,48,400 |
| (vi) | -2,000 | + | 0 | + | 0 | + |  |  |  |  | 0 | = | 0 | + | 0 | + | 0 | + | 0 |
| New Equation | 3,22,000 | $+$ | 88,000 | + | 20,000 | + | 20,000 |  | 2,000 |  | 46,400 | = | 40,000 | + | 0 | + | 10,000 | + | 4,48,400 |
| (vii) | 0 | $+$ | 0 | + | 0 | + | 0 | + |  |  | 36,000 | $=$ | -40,000 | + | 0 | + | 0 | + | 4,000 |
| New Equation | 3,22,000 | + | 88,000 | $+$ | 20,000 | + | 20,000 | + | 2,000 |  | 10,400 | $=$ | 0 | + | 0 | + | 10,000 | + | 4,52,400 |
| (viii) | 0 | + | 0 | - | 2,000 | + | 0 | + | 0 | + |  |  | 0 | + | 0 | + | 0 | - | 2,000 |
| New Equation | 3,22,000 | $+$ | 88,000 | + | 18,000 | + | 20,000 | + | 2,000 | + | 10,400 |  | 0 | + | 0 | + | 10,000 | + | 4,50,400 |
| (ix) | 4,000 | + | 0 | + | 0 | + | 0 | + | 0 | + | 0 |  |  | + | 4,000 | + | 0 | + | 0 |
| New Equation | 3,26,000 | $+$ | 88,000 | + | 18,000 | + | 20,000 | + | 2,000 | + | 10,400 |  |  | $+$ | 4,000 | + | 10,000 | + | 4,50,400 |


| BALANCE SHEET as at ... |  |  |  |
| :---: | :---: | :---: | :---: |
| Liabilities | ₹ | Assets | ₹ |
| Unearned Commission | 4,000 | Cash | 3,26,000 |
| Outstanding Rent | 10,000 | Debtors | 20,000 |
| Capital | 4,50,400 | Stock | 88,000 |
|  |  | Prepaid Insurance | 2,000 |
|  |  | Bank | 10,400 |
|  |  | Furniture | 18,000 |
|  | 4,64,400 |  | 4,64,400 |

## Illustration 6.

Show the accounting equation on the basis of the following transactions and also show the Balance Sheet:

1. Commenced business with cash ₹ $5,00,000$, Goods ₹ $1,00,000$ and Furniture ₹ 10,000.
2. Sold goods to Rakesh on credit costing ₹ 4,000 for
3. Paid rent in advance 5,000
4. Salary outstanding 1,000
5. Charge depreciation on furniture 1,000
6. Goods destroyed by fire 5,000
7. Purchased household goods for ₹ $1,50,000$, giving ₹ 50,000 in cash and balance through a loan
8. Accrued Interest
9. Commission received in Advance 10,000
10. Interest due but not paid 1,000
11. Prepaid Insurance 7,000
12. Creditors accepted a bill for $\quad 15,000$
13. Interest on Capital 10,000
14. Interest on Drawings 3,000
15. Transfer from capital to loan 50,000

Use the following headings in equation:
Cash + Stock + Debtors + Furniture + Prepaid Expenses + Accrued Income $=$ Unearned Commission + Loan + Bills Payable ( $\mathrm{B} / \mathrm{P}$ ) + Outstanding Expenses ( $\mathrm{O} / \mathrm{s}$ Expenses) + Capital.

| Transaction <br> No. | Assets |  |  |  |  |  |  |  |  |  |  | = |  |  | Liabilities + Capital |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{aligned} & \text { Cash } \\ & ₹ \end{aligned}$ | + | $\begin{gathered} \text { Stock } \\ \text { ₹ } \end{gathered}$ | + | Debtors ₹ | + | $\begin{aligned} & \text { Furniture } \\ & \text { ₹ } \end{aligned}$ | + | Prepaid Exp. (₹) | + | Accrued Int. (₹) | $=$ | Unearned Comm. (₹) | + | $\begin{gathered} \text { Loan } \\ ₹ \end{gathered}$ | + | $\begin{gathered} \mathrm{B} / \mathrm{P} \\ ₹ \end{gathered}$ | + Outstanding + Exp. (₹) |  |  | Capital (₹) |
| 1. | 5,00,000 | + | 1,00,000 | $+$ | 0 | + | 10,000 | + | 0 | $+$ | 0 | $=$ | 0 | $+$ | 0 | $+$ | 0 | $+$ | 0 | $+$ | 6,10,000 |
| New Equation | 5,00,000 | + | 1,00,000 | + | 0 | + | 10,000 | + | 0 | + | 0 | = | 0 | + | 0 | + | 0 | + | 0 | + | 6,10,000 |
| 2. | 0 | - | 4,000 | $+$ | 5,000 | + | 0 | + | 0 | + | 0 | = | 0 | + | 0 | $+$ | 0 | + | 0 | $+$ | 1,000 |
| New Equation | 5,00,000 | + | 96,000 | + | 5,000 | + | 10,000 | + | 0 | + | 0 | = | 0 | + | 0 | + | 0 | + | 0 | + | 6,11,000 |
| 3. | -5,000 | + | 0 | $+$ | 0 | + | 0 | + | 5,000 | + | 0 | = | 0 | + | 0 | + | 0 | + | 0 | + | 0 |
| New Equation | 4,95,000 | + | 96,000 | + | 5,000 |  | 10,000 | + | 5,000 | + | 0 | = | 0 | + | 0 | + | 0 | + | 0 | + | 6,11,000 |
| 4. | 0 | + | 0 | $+$ | 0 |  | 0 | + | 0 | $+$ | 0 | = | 0 | $+$ | 0 | $+$ | 0 | $+$ | 1,000 | - | 1,000 |
| New Equation | 4,95,000 | + | 96,000 | + | 5,000 |  | 10,000 | + | 5,000 | + | 0 | = | 0 | + | 0 | + | 0 | + | 1,000 | + | 6,10,000 |
| 5. | 0 | + | 0 | $+$ | 0 |  | 1,000 | + | 0 | $+$ | 0 | $=$ | 0 | $+$ | 0 | $+$ | 0 | $+$ | 0 | - | 1,000 |
| New Equation | 4,95,000 | + | 96,000 | + | 5,000 |  | 9,000 |  | 5,000 | + | 0 | = | 0 | + | 0 | + | 0 | + | 1,000 | + | 6,09,000 |
| 6. | 0 | - | 5,000 | $+$ | 0 | + |  |  | 0 | $+$ | 0 | $=$ | 0 | + | 0 | $+$ | 0 | $+$ | 0 | - | 5,000 |
| New Equation | 4,95,000 | + | 91,000 | + | 5,000 | + | 9,000 |  | 5,000 | + | 0 | = | 0 | + | 0 | + | 0 | + | 1,000 | + | 6,04,000 |
| 7. | -50,000 | $+$ | 0 | $+$ | 0 | + |  |  | $\bigcirc$ | + | 0 | = | 0 | + | 1,00,000 | + | 0 | $+$ | 0 | - | 1,50,000 |
| New Equation | 4,45,000 | + | 91,000 | + | 5,000 | + | 9,000 |  | 5,000 |  | 0 | = | 0 | + | 1,00,000 | + | 0 | + | 1,000 | + | 4,54,000 |
| 8. | 0 | + | 0 | $+$ | 0 | + | 0 |  | 0 |  | 5,000 | = | 0 | + | 0 | + | 0 | + | 0 | $+$ | 5,000 |
| New Equation | 4,45,000 | + | 91,000 | + | 5,000 | + | 9,000 |  | 5,000 |  | 5,000 | = | 0 | + | 1,00,000 | + | 0 | + | 1,000 | + | 4,59,000 |
| 9. | 10,000 | + | 0 | $+$ | 0 | + | 0 | + |  |  | 0 | = | 10,000 | + | 0 | + | 0 | + | 0 | $+$ | 0 |
| New Equation | 4,55,000 | + | 91,000 | + | 5,000 | + | 9,000 | + | 5,000 |  | 5,000 | = | 10,000 | + | 1,00,000 | + | 0 | + | 1,000 | + | 4,59,000 |
| 10. | 0 | + | 0 | $+$ | 0 | + | 0 | + | 0 |  | - 0 | $=$ | 0 | + | 0 | + | 0 | + | 1,000 | - | 1,000 |
| New Equation | 4,55,000 | + | 91,000 | + | 5,000 | + | 9,000 | + | 5,000 | + | 5,000 |  | 10,000 | + | 1,00,000 | + | 0 | + | 2,000 | + | 4,58,000 |
| 11. | -7,000 | $+$ | 0 | $+$ | 0 | + | 0 | $+$ | 7,000 | + |  |  | 0 | + | 0 | $+$ | 0 | $+$ | 0 | $+$ | 0 |
| New Equation | 4,48,000 | + | 91,000 | + | 5,000 | + | 9,000 | + | 12,000 | + | 5,000 |  | 10,000 | + | 1,00,000 | + | 0 | + | 2,000 | + | 4,58,000 |
| 12. | 0 | + | 0 | $+$ | 0 | + | 0 | + | 0 | + | 0 |  | 0 | - | 15,000 |  | ,000 | + | 0 | + | 0 |
| New Equation | 4,48,000 | + | 91,000 | + | 5,000 | + | 9,000 | + | 12,000 |  | 5,000 |  | 0,000 | + | 85,000 |  | ,000 | + | 2,000 | + | 4,58,000 |
| 13. | 0 | + | 0 | $+$ | 0 | + | 0 | + | 0 |  | 0 | = |  |  | 0 | + | 0 | + | 0 | $+$ | $\begin{aligned} & 10,000 \\ & 10,000 \end{aligned}$ |
| New Equation | 4,48,000 | + | 91,000 | + | 5,000 | + | 9,000 | + | 12,000 | + | 5,000 | = | 10,000 | + | 85,000 |  | ,000 | + | 2,000 | + | 4,58,000 |
| 14. | 0 | + | 0 | + | 0 | + | 0 | + | 0 | + | 0 | = | 0 | + | 0 | + | 0 | + | 0 | $+$ | $\begin{aligned} & 3,000 \\ & 3,000 \end{aligned}$ |
| New Equation | 4,48,000 | + | 91,000 | + | 5,000 | + | 9,000 | + | 12,000 | + | 5,000 | = | 10,000 | + | 85,000 |  | ,000 | + | 2,000 | + | 4,58,000 |
| 15. | 0 | $+$ | 0 | $+$ | 0 | + | 0 | $+$ | 0 | + | 0 | $=$ | 0 | $+$ | 50,000 | + | 0 | $+$ | 0 | - | 50,000 |
| New Equation | 4,48,000 | + | 91,000 | $+$ | 5,000 | + | 9,000 | + | 12,000 | + | 5,000 | = | 10,000 | + | 1,35,000 |  | ,000 | + | 2,000 | + | 4,08,000 |

BALANCE SHEET
as at ...

| Liabilities | $₹$ | Assets | $₹$ |
| :--- | ---: | :--- | ---: |
| Unearned Commission | 10,000 | Cash | $4,48,000$ |
| Bills Payable | 15,000 | Stock | 91,000 |
| Outstanding Expenses | 2,000 | Debtors | 5,000 |
| Loan | $1,35,000$ | Prepaid Expenses | 12,000 |
| Capital | $4,08,000$ | Accrued Interest | 5,000 |
|  |  | Furniture | 9,000 |
|  |  |  | $5,70,000$ |
|  |  | $5,70,000$ |  |

## Unsolved Questions

1. Raghunath had the following transactons in an accounting year:
(i) Commenced business with cash
₹
(ii) Paid into bank 10,000
(iii) Purchased goods for cash ₹ 20,000 and credit ₹ 30,000.
(iv) Sold goods for cash ₹ 40,000 costing ₹ $30,000$.
(v) Rent paid 500
(vi) Rent outstanding 100
(vii) Bought furniture on credit 5,000
(viii) Bought refrigerator for personal use $\quad$ 5,000
(ix) Purchased motorcycle for cash 20,000

Create an Accounting Equation to show the effect of the above transactions on his assets, liabilities and capital and also show his Balance Sheet.
2. Show an Accounting Equation on the basis of the following transactions:
₹
(i) Sunil started business with cash 1,50,000
(ii) He purchased a building and furniture for 1,00,000
(iii) He purchased goods from Ram on credit 50,000
(iv) He paid cartage 500
(v) He sold to Shyam on credit goods costing ₹ 6,000 for 9,000
(vi) Received rent from tenants 1,000
$\begin{array}{ll}\text { (vii) Received security deposit from tenants } & \text { 1,500 }\end{array}$
(viii) Purchased stationery for cash 100
(ix) Invested in shares (personal) 50,000
(x) Received interest in cash 200
(xi) Introduced fresh capital 25,000
(xii) Goods destroyed by fire 500
3. Create an Accounting Equation on the basis of the following transactions:
(i) Commenced business with cash ₹ 50,000 , goods ₹ 30,000 and furniture ₹ 20,000 .
(ii) Sold goods to Ajay on credit costing ₹ 4,000 for ₹ 5,000 .
(iii) Sold goods for cash costing ₹ 12,000 for ₹ 16,000 .
(iv) Purchased goods for cash ₹ 40,000.
(v) Purchased goods on credit for ₹ 20,000 .
(vi) Paid rent ₹ 3,000 including ₹ 2,000 in advance.
(vii) Paid salaries ₹ 2,000 .
(viii) Sold goods costing ₹ 8,000 for ₹ 10,000 .
(ix) Salaries outstanding ₹ 1,000 .
(x) Charge depreciation on furniture ₹ 500.
4. Show an Accounting Equation on the basis of the following transactions:
(i) D. Mahapatra commenced business with cash ₹ $1,50,000$; goods ₹ 60,000 ; machinery ₹ $1,00,000$ and furniture ₹ 50,000 .
(ii) $1 / 3$ rd of the above goods sold at a profit of $10 \%$ on cost and half of the payment is received in cash.
(iii) Depreciation on machinery provided @ $10 \%$.
(iv) Cash withdrawn for personal use ₹ 10,000 .
(v) Interest on drawings charged @ $5 \%$.
(vi) Goods sold to Gupta for ₹ 10,000 and received a Bill Receivable for the same amount for 3 months.
(vii) Received ₹ 10,000 from Gupta against the Bills Receivable on its maturity.
5. Mr. B.K. Goyal started a real estate agency business with a cash investment of $₹ 3,50,000$. Show the impact of following transactions on the Accounting Equation and check whether the equation remains balanced or not:
(a) Paid three month's advance rent for office accommodation ₹ 21,000 .
(b) Bought car for office use ₹ $2,10,000$.
(c) Purchased office furniture ₹ 70,000 .
(d) Bought office Laptop from Gupta Tech. \& Co. ₹ 30,000 .
(e) Sold extra office furniture at cost to Mohan for ₹ 10,000 . Mohan paid ₹ 6,000 in cash and accepted a bill at three months for the balance.
(f) Mohan paid the amount of the bill at maturity and Mr. B.K. Goyal paid half the amount he owed to Gupta Tech. \& Co.
(g) Collected commission ₹ 60,000 .
(h) Paid telephone bill amounting to ₹ 1,500 .

## GUIDETO ANSWERS

1. Assets—Cash ₹ $34,500+$ Bank $₹ 10,000+$ Stock ₹ $20,000+$ Furniture ₹ $5,000+$ Motorcycle ₹ $20,000=₹ 89,500$; Liabilities—Creditors $₹ 30,000$ + Outstanding Rent $₹ 100$ +Vendor for Furniture $₹ 5,000$ + Capital $₹ 54,400=₹ 89,500$.
2. Assets—Cash ₹ 27,100 + Building \& Furniture ₹ $1,00,000+$ Stock $₹ 43,500+$ Debtor (Shyam) ₹ $9,000=₹ 1,79,600$; Liabilities—Creditor (Ram) ₹ $50,000+$ Security Deposits ₹ $1,500+$ Capital ₹ $1,28,100=₹ 1,79,600$.
3. Assets—Cash $₹ 31,000+$ Stock $₹ 66,000$ + Furniture $₹ 19,500+$ Debtor (Ajay) $₹ 5,000+$ Prepaid Rent $₹ 2,000=₹ 1,23,500$; Liabilities—Creditor ₹ 20,000 + Outstanding Salary ₹ $1,000+$ Capital ₹ $1,02,500=₹ 1,23,500$.
[Hint: In transaction (x), furniture will be reduced by ₹ 500 and capital will also be reduced by ₹ 500 because of loss due to depreciation.]
4. Assets—Cash ₹ $1,61,000+$ Stock (goods) ₹ 30,000 + Machinery ₹ $90,000+$ Furniture ₹ $50,000+$ Debtors ₹ 11,000 $=$ ₹ $3,42,000$;
Liabilities—Nil + Capital ₹ $3,42,000=₹ 3,42,000$.
[Hints: 1. Opening Capital ₹ $3,60,000=$ Cash ₹ $1,50,000+$ Stock ₹ $60,000+$ Machinery ₹ $1,00,000+$ Furniture ₹ 50,000.
5. Liabilities: Nil.]
6. Assets—Cash ₹ $1,02,500$ + Bill Receivable $0+$ Prepaid Rent ₹ $21,000+$ Office Car ₹ $2,10,000$ + Office Furniture ₹ 60,000 + Office Laptop: ₹ $30,000=₹ 4,23,500$;
Liabilities—Gupta Tech. \& Co.: ₹ 15,000 + Capital—₹ $4,08,500=₹ 4,23,500$.
