

HIRE PURCHASE AND INSTALLMENT SALE TRANSACTIONS



LEARNING OUTCOMES

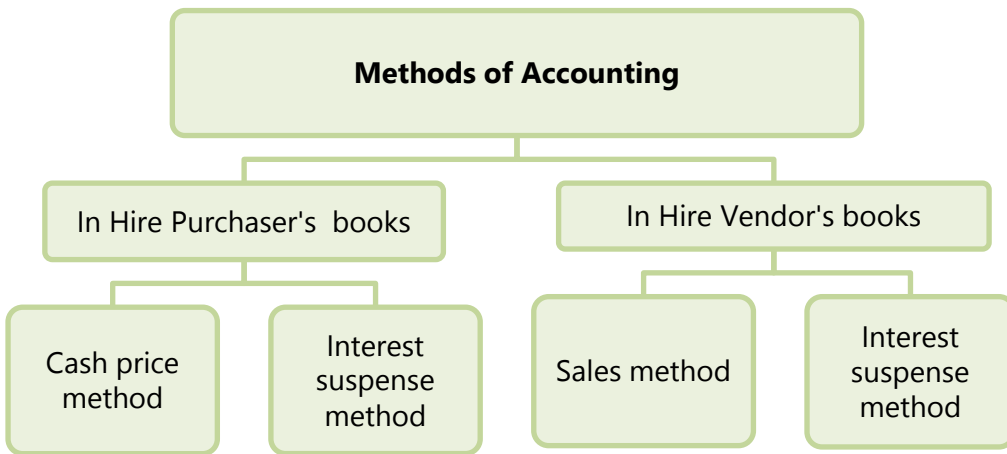
After studying this unit, you will be able to–

- ❑ Understand the salient features and nature of Hire purchase transactions.
- ❑ Journalize the Hire purchase entries both in the books of hire purchaser and the hire vendor.
- ❑ Learn various methods of accounting for hire purchase transactions.
- ❑ Ascertain various missing values, required while accounting the hire purchase transactions, on the basis of given information.
- ❑ Calculate and record the value of repossessed goods and also to calculate the profit on re-sale of such goods.
- ❑ Understand the instalment payment system and also how it is different from hire purchase transactions

CHAPTER OVERVIEW 

Hire Purchase Accounting: Under Hire Purchase System, hire purchaser pays the cost of purchased asset in number of instalments. The ownership of the goods is transferred by the Hire Vendor only after payment of outstanding balance.

Installment System: Under Installment System also, the purchaser pays the cost of purchased asset in number of installments. However, under installment system, ownership of the goods is transferred by owner on the date of delivery of the goods.



1. INTRODUCTION

With an increasing demand for better life, the consumption of goods has been on the expanding scale. But, this has not been backed up by adequate purchasing power, transforming it into effectual demand, i.e., actual sale at set or settled prices. This has created the market for what is called hire purchase.

When a person wants to acquire an asset, but is not sure how to make payment within a stipulated period of time he may pay in instalments if the vendor agrees. This enables the purchaser to use the asset while paying for it in instalments over an agreed period of time. This type of a business deal is known as hire purchase transaction. Here, the customer pays the entire amount either in monthly or quarterly or yearly instalments, while the asset remains the property of the seller until the buyer squares up his entire liability. For the seller, the agreed instalments include his interest on the assets given on credit to the purchaser. Therefore, when the total amount (being paid in instalments over a period of time) is certainly higher than the cash down price of the asset because of interest charges. Obviously, both the parties gain in the bargain. By virtue of this, the purchaser has the right of immediate use of the asset without making immediate payment for the asset, by this, he gets both credit and product from the same seller. From seller's view point, he derives the benefits by way of increase in sales and also he recovers his own cost of credit.

2. NATURE OF HIRE PURCHASE AGREEMENT

Under the Hire Purchase System the Hire Purchaser gets possession of the goods at the outset and can use it, while paying for it in instalments over a specified period of time as per the agreement. However, the ownership of the goods remains with the Hire Vendor until the hire purchaser has paid all the instalments. Each instalment paid by the hire purchaser is treated as hire charges for using the asset. In case he fails to pay any of the instalments (even the last one) the hire vendor has the right to take back his goods without compensating the buyer, i.e., the hire vendor is not going to pay back a part or whole of the amount received through instalments till the date of default from the buyer.

3. SPECIAL FEATURES OF HIRE PURCHASE AGREEMENT

1. **Possession:** The hire vendor transfers only possession of the goods to the hire purchaser immediately after the contract for hire purchase is made.
2. **Installments:** The goods are delivered by the hire vendor on the condition that a hire purchaser should pay the amount in periodical instalments.
3. **Down Payment:** The hire purchaser generally makes a down payment, i.e., an amount on signing the agreement.
4. **Constituents of Hire purchase instalments:** Each instalment consists of two elements- finance charge (interest on unpaid amount) and capital payment.
5. **Ownership:** The property in goods is to pass to the hire purchaser on the payment of the last instalment and exercising the option conferred upon him under the agreement.
6. **Repossession:** In case of default in respect of payment of even the last instalment, the hire vendor has the right to take the goods back without making any compensation.

4. TERMS USED IN HIRE PURCHASE AGREEMENTS

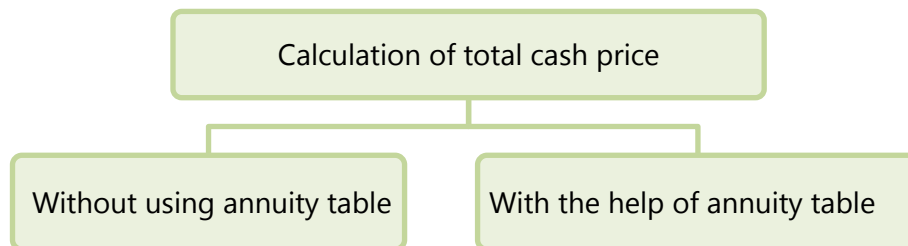
1. **Hire Vendor:** Hire vendor is a person who delivers the goods along with its possession to the hire purchaser under a hire purchase agreement.
2. **Hire Purchaser:** Hire purchaser is a person who obtains the goods and rights to use the same from hire vendor under a hire purchase agreement.
3. **Cash Price:** Cash price is the amount to be paid by the buyer on outright purchase in cash.
4. **Down Payment:** Down payment is the initial payment made to the hire vendor by the hire purchaser at the time of entering into a hire purchase agreement.
5. **Hire Purchase Instalment:** Hire purchase instalment is the amount which the hire purchaser has to pay after a regular interval upto certain period as specified in the agreement to obtain the ownership of the asset purchased

(on payment of the last installment) under a hire purchase agreement. It comprises of principal amount and the interest on the unpaid amount.

6. **Hire purchase price:** It means the total sum payable by the hire purchaser to obtain the ownership of the asset purchased under hire purchase agreement. It comprises of cash price and interest on outstanding balances.

5. ASCERTAINMENT OF TOTAL CASH PRICE

We know that the basis for accounting in the books of the hire purchaser is the total cash price. Sometimes, the total cash price may not be given. For the purpose of ascertaining the total cash price, we can use any of the following methods according to the need.



5.1. Calculation of Total Cash Price without using Annuity Table

In this method, the interest included in the last instalment is to be calculated first with the help of the appropriate formula (explained below).

For example in a hire purchase transaction, apart from down payment, four other instalments are payable. The interest will be calculated first on the 4th instalment, then on the 3rd instalment, then on the 2nd instalment and lastly on the 1st instalment. Interest on down payment will be nil.

In this connection, it should be noted that the amount of interest will go on increasing from the 4th instalment to the 3rd instalment, from the 3rd instalment to the 2nd instalment and from the 2nd instalment to the 1st instalment.

We know that interest is to be calculated on the outstanding balance of cash price.

In this case, we will have to calculate the interest with the help of the total amount due on hire purchase price since the cash price is not known. For the purpose of calculating the interest, the following steps should be followed:

Step 1 : Calculate the ratio between interest and the amount due with the help of the following formula:

$$\text{Ratio of interest and amount due} = \frac{\text{Rate of interest}}{100 + \text{Rate of interest}}$$

Step 2: Calculate the interest included in the last instalment by applying the following formula:

$$\text{Interest} = \text{Total amount due at the time of instalment} \times \text{Ratio of interest and amount due (as calculated in step 1)}$$

Step 3: Subtract the interest (as calculated in step 2) from this instalment to get the amount of outstanding cash price at the time of last instalment.

Step 4: Add the cash price calculated in Step 3 to the amount of instalment due at the end of the third year.

Step 5: Calculate the interest on the entire sum (cash price included in the 4th instalment + amount of 3rd instalment). Deduct this interest from the total amount due at the end of 3rd year to get the outstanding cash price at the time of 3rd instalment.

Step 6: Add the cash price calculated in step 5 to the amount of instalment due at the end of 2nd year.

Step 7: Calculate the interest on the entire sum so obtained in Step 6. Deduct this interest from the total amount due at the end of 2nd year to get the outstanding cash price at the time of 2nd instalment.

Step 8: Add the cash price calculated in Step 7 to the amount of instalment due at the end of 1st year.

Step 9: Calculate the interest on the entire sum so obtained in Step 8. Deduct this interest from the total amount due at the end of 1st year to get the outstanding cash price at the time of 1st instalment.

Step 10: Add the cash price calculated in Step 9 to the amount of down payment, if any. The sum so obtained will be the total cash price.

Illustration 1

Asha purchased a truck on hire purchase system. As per terms he is required to pay ₹ 70,000 down, ₹ 53,000 at the end of first year, ₹ 49,000 at the end of second year and ₹ 55,000 at the end of third year. Interest is charged @ 10% p.a.

You are required to calculate the total cash price of the truck and the interest paid with each instalment.

Solution

$$(1) \text{ Ratio of interest and amount due} = \frac{\text{Rate of interest}}{100 + \text{Rate of interest}} = \frac{10}{110} = \frac{1}{11}$$

(2) Calculation of Interest and Cash Price

No. of instalments	Amount due at the time of instalment	Interest	Cash price
[1]	[2]	[3]	[4]
3 rd	55,000	1/11 of ₹ 55,000 = ₹ 5,000	50,000
2 nd	*99,000	1/11 of ₹ 99,000 = ₹ 9,000	90,000
1 st	**1,43,000	1/11 of ₹ 1,43,000 = ₹ 13,000	1,30,000

Total cash price = ₹ 1,30,000 + 70,000 (down payment) = ₹ 2,00,000.

*₹ 50,000 + 2nd instalment of ₹ 49,000 = ₹ 99,000.

** ₹ 90,000 + 1st instalment of ₹ 53,000 = ₹ 1,43,000.

Illustration 2

A acquired on 1st January, 20X1 a machine under a Hire-Purchase agreement which provides for 5 half-yearly instalments of ₹ 6,000 each, the first instalment being due on 1st July, 20X1. Assuming that the applicable rate of interest is 10 per cent per annum, calculate the cash value of the machine. All working should form part of the answer.

Solution

Statement showing cash value of the machine acquired on hire-purchase basis

	Instalment Amount	Interest @ 5% half yearly (10% p.a.) = 5/105 = 1/21 (in each instalment)	Principal Amount (in each instalment)
	₹	₹	₹
5th Instalment	6,000	286	5,714
Less: Interest	(286)		

	5,714		
Add: 4th Instalment	<u>6,000</u>		
	11,714	558	5,442
Less: Interest	<u>(558)</u>		(6,000 – 558)
	11,156		
Add: 3rd instalment	<u>6,000</u>		
	17,156	817	5,183
Less: Interest	<u>(817)</u>		(6,000 – 817)
	16,339		
Add: 2nd instalment	<u>6,000</u>		
	22,339	1,063	4,937
Less: Interest	<u>(1,063)</u>		(6,000 – 1,063)
	21,276		
Add: 1st instalment	<u>6,000</u>		
	27,276	1,299	4,701
Less: Interest	<u>(1,299)</u>	—	(6,000 – 1,299)
	<u>25,977</u>	<u>4,023</u>	<u>25,977</u>

The cash purchase price of machinery is ₹ 25,977.

5.2 Calculation of Total Cash Price with the help of Annuity Table

Cash price = Down payment + Present value of instalments

Present value of instalments is calculated as follows:

- (a) If present value of an annuity of ₹ 1 for a given period, at given rate of interest, is given Present value of instalments = Annual instalments x Present value of an annuity of ₹ 1 for a given period at given rate of interest

$$= \text{Annual instalment} \times \frac{(1+r)^n - 1}{r(1+r)^n}$$

- (b) If annuity to recover ₹ 1 during a given period at given rate of interest is given

$$= \text{Annual instalment} \times \frac{r(1+r)^n}{(1+r)^n - 1}$$

Illustration 3

On 1st April, 20X1 a manufacturing company buys on Hire-purchase system a machinery for ₹ 90,000, payable by three equal annual instalments combining principal and interest, the rate of interest was 5% per annum. Calculate the amount of cash price and interest. Assume that the present value of an annuity of one rupee for three years at 5% interest is ₹ 2.723.

Solution

Calculation of Cash Price – The present value of an annuity of Re. 1 paid for 3 year @ 5% = ₹ 2.723. Hence, the present value of ₹ 30,000 for 3 years = 2.723 x 30,000 = ₹ 81,690.

Thus, Cash Price will be computed as ₹ 81,690.

Cash price may also be calculated using the annuity formula discussed above:

$$\begin{aligned} \text{Cash price} &= \text{Annual instalment} \times \frac{(1+r)^n - 1}{r(1+r)^n} \\ &= 30,000 \times [(1 + 0.05)^3 - 1] / 0.05 (1 + 0.05)^3 \\ &= ₹ 81697. \end{aligned}$$

Note- The difference in cash price of ₹ 7 is on account of approximation.

**6. ASCERTAINMENT OF INTEREST**

We know that the hire purchase price consists of two elements: (i) cash price; and (ii) interest. Cash price is an expenditure incurred for the acquisition of an asset towards payment of capital (principal) amount and (ii) interest is a expense in the nature of revenue for delay in making the full payment. Ascertainment of any of these two gives the answer for the other, e.g., if we ascertain the total amount of interest, it becomes very simple to ascertain the cash price just by deducting the amount of interest from the hire purchase price.

Interest is charged on the amount outstanding. Therefore, if the hire purchaser makes a down payment on signing the contract, it will not include any amount of interest. It should be noted that though the instalments of a hire purchase agreement may be equal, the interest element in each instalment is not the same.

At the time of calculating interest, students may face the following two situations:

- (a) When the cash price, rate of interest and the amount of instalments are given; and
- (b) When the cash price and the amount of instalments are given, but the rate of interest is not given.

Now, let us consider the above two situations.

6.1 When the cash price, rate of interest and the amount of instalments are given

In this situation, the total amount of interest is to be ascertained first. It is the difference between the hire purchase price (down payment + total instalments) and the cash price. To calculate the amount of interest involved in each instalment the following steps are followed:

- Step 1 :** Deduct down payment from the cash price. Calculate the interest at the given rate on the remaining balance. This represents the amount of interest included in the first instalment.
- Step 2 :** Deduct the interest of Step 1 from the amount of first instalment. The resultant figure is the cash price included in the first instalment.
- Step 3 :** Deduct the cash price of the 1st instalment (Step 2) from the balance due after down payment. It represents the amount outstanding after the 1st instalment is paid.
- Step 4 :** Calculate the interest at the given rate on the balance outstanding after the 1st instalment. Deduct this interest from the amount of the 2nd instalment to get the cash price included in the 2nd instalment.
- Step 5:** Deduct the cash price of the 2nd instalment (Step 4) from the balance due after the 1st instalment. It represents the amount outstanding after the 2nd instalment is paid.

Repeat the above steps till the last instalment is paid.

Illustration 4

Om Ltd. purchased a machine on hire purchase basis from Kumar Machinery Co. Ltd. on the following terms:

- (a) Cash price ₹ 80,000
- (b) Down payment at the time of signing the agreement on 1.1.20X1 ₹ 21,622.

(c) 5 annual instalments of ₹ 15,400, the first to commence at the end of twelve months from the date of down payment.

(d) Rate of interest is 10% p.a.

You are required to calculate the total interest and interest included in cash instalment.

Solution

Calculation of interest

	Total (₹)	Interest in each instalment (1)	Cash price in each instalment (2)
Cash Price	80,000		
Less: Down Payment	<u>(21,622)</u>	Nil	₹ 21,622
Balance due after down payment	58,378		
Interest/Cash Price of 1 st instalment	-	₹ 58,378 x10/100 = ₹ 5,838	₹ 15,400 – ₹ 5,838 = ₹ 9,562
Less: Cash price of 1 st instalment	<u>(9,562)</u>		
Balance due after 1st instalment	48,816		
Interest/cash price of 2 nd instalment	-	₹ 48,816 x 10/100 = ₹ 4,882	₹ 15,400 – ₹ 4,882 = ₹ 10,518
Less: Cash price of 2 nd instalment	<u>(10,518)</u>		
Balance due after 2nd instalment	38,298		
Interest/Cash price of 3 rd instalment	-	₹ 38,298 x 10/100 = ₹ 3,830	₹ 15,400 – ₹ 3,830 = ₹ 11,570
Less: Cash price of 3 rd instalment	<u>(11,570)</u>		
Balance due after 3rd instalment	26,728		
Interest/Cash price of 4 th	-	₹ 26,728	₹ 15,400 –

instalment		$\times 10/100 =$ ₹ 2,672	₹ 2,672 = ₹ 12,728
Less: Cash price of 4 th instalment	<u>(12,728)</u>		
Balance due after 4th instalment	14,000		
Interest/Cash price of 5 th instalment	-	₹14,000 $\times 10/100 =$ ₹ 1,400	₹ 15400– ₹ 1,400= 14,000
Less: Cash price of 5 th instalment	<u>(14,000)</u>		
Total	Nil	₹ 18,622	₹ 80,000

Total interest can also be calculated as follow:

(Down payment + instalments) – Cash Price = ₹ [21,622 +(15400 x 5)] – ₹ 80,000 = ₹ 18,622

6.2 When the cash price and the amount of instalments are given, but the rate of interest is not given

When the rate of interest is not given, but the cash price and the amount of installments are given, we have to find interest rate implicit in the transaction by bifurcating the installments between reduction in liability and finance charges (interest).

Internal rate of return (IRR) is the discount rate that equates the present value of the expected net cash outflows (amount of down-payment and installments) with the cash price. When the net cash flows are not uniform over the life of the investment, the determination of the discount rate can involve trial and error and interpolation between interest rates.

In case of hire purchase, Internal Rate of Return Method (IRR)* method considers the time value of money, the cash price, and all cash outflows (amount of down-payment and installments) relating to the purchase of the asset on hire purchase basis. IRR method does not use the desired rate of return but estimates the discount rate that makes the present value of subsequent net cash outflows equal to the cash price.

* For detailed understanding of IRR, students are advised to refer Financial Management Study Material.

Illustration 5

Happy Valley Florists Ltd. acquired a delivery van on hire purchase on 01.04.20X1 from Ganesh Enterprises. The terms were as follows:

Particulars	Amount (₹)
Hire Purchase Price	180,000
Down Payment	30,000
1 st installment payable after 1 year	50,000
2 nd installment after 2 years	50,000
3 rd installment after 3 years	30,000
4 th installment after 4 years	20,000

Cash price of van ₹ 150,000 You are required to calculate Total Interest and Interest included in each instalment.

Solution:

Calculation of total Interest and Interest included in each installment

$$\begin{aligned} \text{Hire Purchase Price (HPP)} &= \text{Down Payment} + \text{instalments} \\ &= 30,000 + 50,000 + 50,000 + 30,000 + 20,000 = 1,80,000 \end{aligned}$$

$$\text{Total Interest} = 1,80,000 - 1,50,000 = 30,000$$

Computation of IRR (considering two guessed rates of 6% and 12%)

Year	Cash Flow	DF @6%	PV	DF @12%	PV
0	30,000	1.00	30,000	1.00	30,000
1	50,000	0.94	47,000	0.89	44,500
2	50,000	0.89	44,500	0.80	40,000
3	30,000	0.84	25,200	0.71	21,300
4	20,000	0.79	15,800	0.64	12,800
		NPV	1,62,500	NPV	1,48,600

Interest rate implicit on lease is computed below by interpolation:

$$\text{Interest rate implicit on lease} = 6\% + \frac{1,62,500 - 1,50,000}{1,62,500 - 1,48,600} \times (12 - 6) = 11.39\%$$

Thus, repayment schedule and interest would be as under:

Installment no.	Principal at beginning	Interest included in each installment	Gross amount	Installment	Principle at end
Cash down	1,50,000		1,50,000	30,000	1,20,000
1	1,20,000	13,668	1,33,668	50,000	83,668
2	83,668	9,530	93,198	50,000	43,198
3	43,198	4,920	48,118	30,000	18,118
4	18,118	2,064	20,182	20,000	182*
		30,182*			

* the difference is on account of approximations

7. ACCOUNTING FOR HIRE PURCHASE TRANSACTION

7.1 In the Books of Hire Purchaser

There are following two methods of recording the hire purchase transactions in the books of the hire-purchaser:

1. Cash price method
2. Interest suspense method

It is necessary to disclose assets taken on hire purchase basis by classifying it as "Asset on Hire Purchase". Accordingly, amount due to the hire vendor should also be shown in his books as a liability—"Hire Purchase Creditors" with additional such classifications of amount of hire purchase instalment due and amount of hire purchase instalment not yet due.

Cash price method

Under this method, the full cash price of the asset is debited to the Asset Account and credited to the Hire Vendor Account, therefore, it is also called Full Cash Price Method. At the time of payment of instalment, Interest Account is debited and Hire Vendor Account is credited (with the interest on outstanding balance). When instalment is paid, the Hire Vendor Account is debited and Bank Account is credited. At the time of preparation of Final Accounts, interest is transferred to

Profit and Loss Account and asset is shown in the Balance Sheet at cost less depreciation. The balance due to hire vendor is shown in the Balance Sheet as a liability

Accounting

To have proper accounting record, one should know: (1) Date of purchase of the asset; (2) Cash price of the asset; (3) Hire purchase price of the asset; (4) The amount of down payment; (5) Number and amount of each instalment; (6) Rate of interest; (7) Method and rate of depreciation; (8) Date of payment of every instalment; and (9) Date of closing the books of account.

Journal Entries

1.	<i>At the time of entering into the agreement</i> Asset Account To Hire Vendor Account	Dr. [Full cash price]
2.	<i>When down payment is made</i> Hire Vendor Account To Cash/Bank Account	Dr. [Down payment]
3.	<i>When an instalment becomes due</i> Interest Account To Hire Vendor Account	Dr. [Interest on outstanding balance]
4.	<i>When an instalment is paid</i> Hire Vendor Account To Bank Account	Dr. [Amount of instalment]
5.	<i>When depreciation is charged on the asset</i> Depreciation Account To Asset Account	Dr. [Calculated on cash price]
6.	<i>For closing interest and depreciation account</i> Profit and Loss Account To Interest Account To Depreciation Account	Dr.

Disclosure in the balance sheet

Assets

Fixed Assets:

Asset (at cash price) XXXXXXXX.XX

Less: Depreciation XXXX.XX

XXXXXXXX.XX

Liabilities

Hire Purchase Creditors:

Balance in hire vendor's A/c XXXXX.XX

Interest accrued not yet due XXXXX.XX

Illustration 6

On January 1, 20X1 HP M/s acquired a Pick-up Van on hire purchase from FM M/s. The terms of the contract were as follows:

- The cash price of the van was ₹ 1,00,000.
- ₹ 40,000 were to be paid on signing of the contract.
- The balance was to be paid in annual instalments of ₹ 20,000 plus interest.
- Interest chargeable on the outstanding balance was 6% p.a.
- Depreciation at 10% p.a. is to be written-off using the straight-line method.

You are required to:

- Give Journal Entries and show the relevant accounts in the books of HP M/s from January 1, 20X1 to December 31, 20X3; and
- Show the relevant items in the Balance Sheet of the purchaser as on December 31, 20X1 to 20X3.

Solution

In the books of HP M/s Journal Entries

Date	Particulars		Dr. ₹	Cr. ₹
20X1	Pick-up Van A/c	Dr.	1,00,000	

Jan. 1	To FM M/s A/c (Being the purchase of a pick-up van on hire purchase from FM M/s)			1,00,000
"	FM M/s A/c To Bank A/c (Being the amount paid on signing the H.P. contract)	Dr.	40,000	40,000
Dec. 31	Interest A/c To FM M/s A/c (Being the interest payable @ 6% on ₹ 60,000)	Dr.	3,600	3,600
"	FM M/s A/c (₹ 20,000+₹ 3,600) To Bank A/c (Being the payment of 1 st instalment along with interest)	Dr.	23,600	23,600
"	Depreciation A/c To Pick-up Van A/c (Being the depreciation charged @ 10% p.a. on ₹ 1,00,000)	Dr.	10,000	10,000
"	Profit & Loss A/c To Depreciation A/c To Interest A/c (Being the depreciation and interest transferred to Profit and Loss Account)	Dr.	13,600	10,000 3,600
20X2 Dec. 31	Interest A/c To FM M/s A/c (Being the interest payable @ 6% on ₹ 40,000)	Dr.	2,400	2,400
	FM M/s A/c (₹ 20,000 + ₹ 2,400) To Bank A/c (Being the payment of 2 nd instalment along with interest)	Dr.	22,400	22,400
	Depreciation A/c To Pick-up Van A/c (Being the depreciation charged @ 10% p.a.)	Dr.	10,000	10,000

20X3 Dec. 31	Profit & Loss A/c To Depreciation A/c To Interest A/c (Being the depreciation and interest charged to Profit and Loss Account)	Dr.	12,400	10,000 2,400
	Interest A/c To FM M/s A/c (Being the interest payable @ 6% on ₹ 20,000)	Dr.	1,200	1,200
	FM M/s A/c (₹ 20,000 + ₹ 1,200) To Bank A/c (Being the payment of final instalment along with interest)	Dr.	21,200	21,200
	Depreciation A/c To Pick-up Van A/c (Being the depreciation charged @ 10% p.a. on ₹ 1,00,000)	Dr.	10,000	10,000
	Profit & Loss A/c To Depreciation A/c To Interest A/c (Being the interest and depreciation charged to Profit and Loss Account)	Dr.	11,200	10,000 1,200

**Ledgers in the books of HP M/s
Pick-up Van Account**

<i>Date</i>	<i>Particulars</i>	<i>₹</i>	<i>Date</i>	<i>Particulars</i>	<i>₹</i>
1.1.20X1	To FM M/s A/c	1,00,000	31.12.20X1	By Depreciation A/c	10,000
			31.12.20X1	By Balance c/d	90,000
		1,00,000			1,00,000
1.1.20X2	To Balance b/d	90,000	31.12.20X2	By Depreciation A/c	10,000
			31.12.20X2	By Balance c/d	80,000
		90,000			90,000
1.1.20X3	To Balance b/d	80,000	31.12.20X3	By Depreciation A/c	10,000
			31.12.20X3	By Balance c/d	70,000
		80,000			80,000

FM M/s Account

<i>Date</i>	<i>Particulars</i>	<i>₹</i>	<i>Date</i>	<i>Particulars</i>	<i>₹</i>
1.1.20X1	To Bank A/c	40,000	1.1.20X1	By Pick-up Van A/c	1,00,000
31.12.20X1	To Bank A/c	23,600	31.12.20X1	By Interest c/d	3,600
31.12.20X1	To Balance c/d	40,000			
		1,03,600			1,03,600
31.12.20X2	To Bank A/c	22,400	1.1.20X2	By Balance b/d	40,000
31.12.20X2	To Balance c/d	20,000	31.12.20X2	By Interest A/c	2,400
		42,400			42,400
31.12.20X3	To Bank A/c	21,200	1.1.20X3	By Balance b/d	20,000
		21,200	31.12.20X3	By Interest A/c	1,200
					21,200

Depreciation Account

<i>Date</i>	<i>Particulars</i>	<i>₹</i>	<i>Date</i>	<i>Particulars</i>	<i>₹</i>
31.12.20X1	To Pick-up Van A/c	10,000	31.12.20X1	By Profit & Loss A/c	10,000
31.12.20X2	To Pick-up Van A/c	10,000	31.12.20X2	By Profit & Loss A/c	10,000
31.12.20X3	To Pick-up Van A/c	10,000	31.12.20X3	By Profit & Loss A/c	10,000

Interest Account

<i>Date</i>	<i>Particulars</i>	<i>₹</i>	<i>Date</i>	<i>Particulars</i>	<i>₹</i>
31.12.20X1	To FM M/s A/c	3,600	31.12.20X1	By Profit & Loss A/c	3,600
31.12.20X2	To FM M/s A/c	2,400	31.12.20X2	By Profit & Loss A/c	2,400
31.12.20X3	To FM M/s A/c	1,200	31.12.20X3	By Profit & Loss A/c	1,200

Balance Sheet of HP M/s as at 31st December, 20X1

<i>Liabilities</i>	<i>₹</i>	<i>Assets</i>	<i>₹</i>
FM M/s	40,000	Pick-up Van	90,000

Balance Sheet of HP M/s as at 31st December, 20X2

<i>Liabilities</i>	<i>₹</i>	<i>Assets</i>	<i>₹</i>
FM M/s	20,000	Pick-up Van	80,000

Balance Sheet of HP M/s as at 31st December, 20X3

<i>Liabilities</i>	₹	<i>Assets</i>	₹
		Pick-up Van	70,000

Interest suspense method

Under this method, at the time of transfer of possession of asset, the total interest unaccrued is transferred to interest suspense account. At later years, as and when interest becomes due, interest account is debited and interest suspense account is credited.

Journal Entries

1.	<i>When the asset is acquired on hire purchase</i> Asset Account To Hire Vendor Account	Dr. [Full cash price]
2.	<i>For total interest payment</i> H.P. Interest Suspense Account To Hire Vendor Account	Dr. [Total interest]
3.	<i>When down payment is made</i> Hire Vendor Account To Bank Account	Dr.
4.	<i>For Interest of the relevant period</i> Interest Account To H.P. Interest Suspense Account	Dr. [Interest of the relevant period]
5.	<i>When an instalment is paid</i> Hire Vendor Account To Bank Account	Dr.
6.	<i>When depreciation is charged on the asset</i> Depreciation Account To Asset Account	Dr. [Calculated on cash price]
7.	<i>For closing interest and depreciation account</i> Profit and Loss Account To Interest Account To Depreciation Account	Dr.

Illustration 7

In illustration 6 assume that the hire purchaser adopted the interest suspense method for recording his hire purchase transactions. On this basis, prepare H.P. Interest Suspense Account, Interest Account and FM M/s Accounts and Balance Sheets in the books of hire purchaser.

Solution**H.P. Interest Suspense Account**

Date	Particulars	₹	Date	Particulars	₹
1.1.20X1	To FM M/s A/c (W.N.)	7,200	31.12.20X1	By Interest A/c	3,600
			31.12.20X1	By Balance c/d	3,600
		7,200			7,200
1.1.20X2	To Balance b/d	3,600	31.12.20X2	By Interest A/c	2,400
			31.12.20X2	By Balance c/d	1,200
		3,600			3,600
1.1.20X3	To Balance b/d	1,200	31.12.20X3	By Interest A/c	1,200

Interest Account

Date	Particulars	₹	Date	Particulars	₹
31.12.20X1	To H.P. Interest Suspense A/c	3,600	31.12.20X1	By Profit & Loss A/c	3,600
31.12.20X2	To H.P. Interest Suspense a/c	2,400	31.12.20X2	By Profit & Loss A/c	2,400
31.12.20X3	To H.P. Interest Suspense A/c	1,200	31.12.20X3	By Profit & Loss A/c	1,200

FM M/s Account

Date	Particulars	₹	Date	Particulars	₹
1.1.20X1	To Bank A/c	40,000	1.1.20X1	By Pick-up Van A/c	1,00,000
31.12.20X1	To Bank A/c	23,600	1.1.20X1	By H.P. Interest Suspense A/c	7,200
31.12.20X1	To Balance c/d	43,600			

31.12.20X2	To Bank A/c	1,07,200	1.1.20X2	By Balance b/d	1,07,200
		22,400			43,600
31.12.20X2	To Balance c/d	21,200			
		43,600			43,600
31.12.20X3	To Bank A/c	21,200	1.1.20X3	By Balance b/d	21,200

Balance Sheet of HP M/s as at 31st December, 20X1

Liabilities		₹	Assets		₹
FM M/s	43,600		Pick-up Van	1,00,000	
Less: H.P. Interest	(3,600)	40,000	Less: Depreciation	(10,000)	90,000
Suspense					

Balance Sheet of HP M/s as at 31st December, 20X2

Liabilities		₹	Assets		₹
FM M/s	21,200		Pick-up Van	90,000	
Less: H.P. Interest			Less: Depreciation	(10,000)	80,000
Suspense	(1,200)	20,000			

Balance Sheet of HP M/s as at 31st December, 20X3

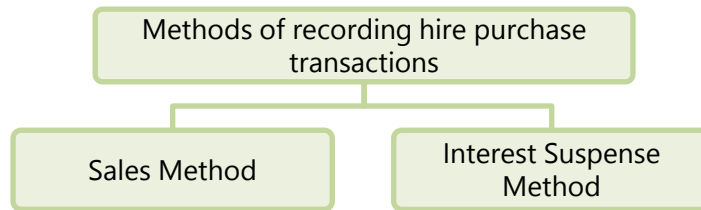
Liabilities		₹	Assets		₹
			Pick-up Van	80,000	
			Less: Depreciation	(10,000)	70,000

Working Note:

Total Interest = ₹ 3,600 + ₹ 2,400 + ₹ 1,200 = ₹ 7,200.

7.2 In the books of the Hire Vendor

There are two methods of recording hire purchase transactions in the books of the hire vendor. The selection of the method is based on the type and value of goods sold, volume of transactions, the length of the period of purchase, etc. These two methods are as follows:



Sales Method

A business that sells relatively large items on hire purchase may adopt this method. Under this method, hire purchase sale is treated as a credit sale. The only exception is that the vendor agrees to accept payments in instalments and for that he charges interest. Generally, a special Sales Day Book is maintained for recording all sales under hire purchase agreement. The amount due from the hire purchaser at the end of the year is shown in the Balance sheet on the assets side as Hire Purchase Debtors.

Journal Entries

1.	<i>When goods are sold and delivered under hire purchase</i> Hire Purchaser Account To H.P. Sales Account	Dr. [Full cash price]
2.	<i>When the down payment is received</i> Bank Account To Hire Purchaser Account	Dr.
3.	<i>When an instalment becomes due</i> Hire Purchaser Account To Interest Account	Dr.
4.	<i>When the amount of instalment is received</i> Bank Account To Hire Purchaser Account	Dr.
5.	<i>For closing interest Account</i> Interest Account To Profit and Loss Account	Dr.

6.	<i>For closing Hire Purchase Sales Account</i> H.P. Sales Account To Trading Account	Dr.
----	--	-----

It is worth noting that

- (i) The entire profit on sale under hire purchase agreement is credited to the Profit and Loss account of the year in which the sale has taken place; and***
- (ii) Interest pertaining to each accounting period is credited to the Profit and Loss Account of the respective year.***

Interest Suspense Method

This method is almost similar to the sales method, except the accounting for interest. Under this method, the hire purchaser is debited with full cash price and interest (total) included in the hire selling price. Credit is given to the H.P. Sales Account and Interest Suspense Account. When the instalment is received, the Bank Account is debited and the Hire Purchaser Account is credited. At the same time an appropriate amount of interest (i.e., interest for the relevant accounting period) is removed from the Interest Suspense Account and credited to the Interest Account. At the time of preparation of Final Accounts, interest is transferred to the credit of the Profit and Loss Account. The balance of the Interest Suspense Account is shown in the Balance Sheet as a deduction from Hire Purchase Debtors.

Journal Entries

1.	<i>When goods are sold and delivered under hire purchase</i> Hire Purchaser Account To H.P. Sales Account To Interest Suspense Account	Dr. [Full cash price + total interest] [Full cash price] [Total Interest]
2.	<i>When down payment/instalment is received</i> Bank Account To Hire Purchaser Account	Dr.

3.	<i>For interest of the relevant accounting period</i> Interest Suspense Account To Interest Account	Dr.
4.	<i>For closing interest Account</i> Interest Account To Profit and Loss Account	Dr.
5.	<i>For closing Hire Purchase Sales Account</i> H.P. Sales Account To Trading Account	Dr.

The disclosure in balance sheet of the respective parties will be:

Balance Sheet of Hire Purchaser

Assets

Fixed assets:

Asset on Hire purchase

Less: Depreciation

Liabilities

Amount payable to Vendor

Less: Balance in Interest Suspense A/c

Balance Sheet of Vendor

Assets

Current assets:

Hire purchase debtors

Less: Balance in Interest suspense A/c

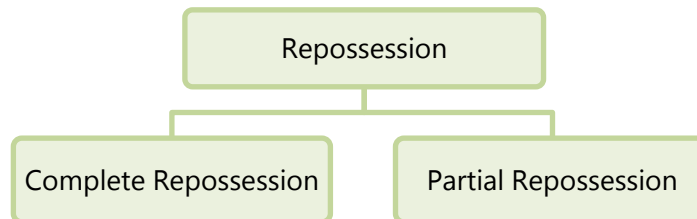
Liabilities

8. REPOSESSION

In a hire purchase agreement, the hire purchaser has to pay up to the last instalment to obtain the ownership of goods. If the hire purchaser fails to pay any of the instalments, the hire vendor takes the asset back in its actual form without any refund of the earlier payments to the hire purchaser. The amounts received from the hire purchaser through down payment and instalments are treated as the hire charges by the hire vendor. This act of recovery of possession of the asset is termed as **repossession**.

Repossessed assets are resold to any other customer after repairing or reconditioning (if necessary). Accounting figures relating to repossessed assets are segregated from the normal hire purchase entries. Repossessions are then accounted for in a separate "Goods Repossessed Account".

So far as the repossession of assets are concerned, the hire vendor can take back the whole of the asset or a part thereof depending on the agreement between the parties. The former is called "Complete Repossession" and the latter is called "Partial Repossession".



8.1 Complete Repossession

The hire vendor closes Hire Purchaser's Account by transferring balance of Hire Purchaser Account to Goods Repossessed Account.

The hire purchaser closes the Hire Vendor's Account by transferring the balance of Hire Vendor Account to Hire Purchase Asset and then finding the profit and loss on repossession in Asset Account.

After repossession, the vendor may incur expenses on repossessed stock and may sell the same in due course of time.

Particulars	Books of hire purchaser		Books of hire vendor	
Purchase/Sales	Asset A/c	...Dr.	Hire Purchaser A/c	...Dr.
	To Hire Vendor A/c		To Sales A/c	
Installment	Hire Vendor A/c	...Dr.	Cash A/c	...Dr.
	To Cash A/c		To Hire Purchaser A/c	
Interest	Interest A/c	...Dr.	Hire Purchaser A/c	...Dr.
	To Hire Vendor		To Interest A/c	
Repossession	Hire Vendor A/c	...Dr.	Goods Repossessed A/c	...Dr.
	To Asset A/c		To Hire Purchaser	

8.2 Partial Repossession

In case of a partial repossession, only a part of the asset is taken back by the hire vendor and other part is left with the hire purchaser. The Journal Entries are as usual up to the date of default (excepting entry for payment) in the books of both

the parties. As a portion of the asset is still left with the hire purchaser, neither party closes the account of the other in their respective books.

Assets are repossessed at a mutually agreed value (based on agreed rate of depreciation which is an enhanced rate). The hire vendor debits the Goods Repossessed Account and credit the Hire Purchaser Account with the value as agreed upon on the repossession. Similarly, the hire purchaser debits the Hire Vendor Account and credits the Assets Account with the same amount. If the repossessed value is less than the book value of the asset which is repossessed, the difference is charged to the Profit and Loss Account of the hire purchaser as '**loss on surrender**'.

For the remaining portion of the asset lying with the hire purchaser, the (Hire Purchaser) applies the usual rate of depreciation and shows the Asset Account at its usual written-down value.

MISCELLANEOUS ILLUSTRATIONS

Illustration 8

X Ltd. purchased 3 milk vans from Super Motors costing ₹ 75,000 each on hire purchase system. Payment was to be made: ₹ 45,000 down and the remainder in 3 equal instalments together with interest @ 9%. X Ltd. writes off depreciation @ 20% on the diminishing balance. It paid the instalment at the end of the 1st year but could not pay the next. Super Motor agreed to leave one milk van with the purchaser, adjusting the value of the other two milk vans against the amount due. The milk vans were valued on the basis of 30% depreciation annually on written down value basis. X Ltd. settled the seller's dues after three months.

You are required to give necessary journal entries and the relevant accounts in the books of X Ltd.

Solution

In the Books of X Ltd. Journal Entries

		Dr. (₹)	Cr. (₹)
I Year			
Milk Vans purchased:			
Milk Vans A/c	Dr.	2,25,000	
To Vendor A/c			2,25,000

On down payment:			
Vendor A/c	Dr.	45,000	
To Bank			45,000
I Year end			
Interest A/c (₹ 1,80,000 @ 9%)	Dr.	16,200	
To Vendor A/c			16,200
Vendor A/c	Dr.	76,200	
To Bank A/c (60,000 + 16,200)			76,200
Depreciation @ 20%			
Depreciation A/c	Dr.	45,000	
To Milk Vans A/c			45,000
Profit & Loss A/c	Dr.	61,200	
To Depreciation			45,000
To interest A/c			16,200
II Year end			
Depreciation @ 20%			
Depreciation A/c	Dr.	36,000	
To Milk Vans A/c			36,000
Interest A/c	Dr.	10,800	
(1,20,000 @ 9%)			
To Vendor A/c			10,800
For Loss in Repossession:			
Super Motors A/c (1,50,000 – 45,000 – 31,500)	Dr.	73,500	
Profit/Loss A/c (b.f.)	Dr.	22,500	
To Milk Vans A/c [(2,25,000 – 45,000 – 36,000) x 2/3]			96,000
IIIrd Year Depreciation			
Depreciation A/c (48,000 x 20%)	Dr.	9,600	
To Milk Vans A/c			9,600
Settlement of A/cs			
Vendor A/c	Dr.	57,300	
To Bank			57,300

Milk Vans Account

Year		₹	Year		₹
1	To Super Motors A/c	2,25,000	1 end	By Depreciation A/c	45,000
				By Balance c/d	1,80,000
		2,25,000			2,25,000
2	To Balance b/d	1,80,000	2 end	By Depreciation	36,000
				By Super Motors (value of 2 vans after depreciation for 2 years @ 30%)	73,500
				By P & L A/c (balancing figure)	22,500
				By Balance c/d (one van less depreciation for 2 years) @ 20%	48,000
		1,80,000			1,80,000

Super Motors Account

Year		₹	Year		₹
1	To Bank A/c	45,000	1	By Milk Vans A/c	2,25,000
	To Bank A/c	76,200		By Interest @ 9% on ₹ 1,80,000	16,200
	To Balance c/d	1,20,000			
		2,41,200			2,41,200
2	To Milk Van A/c	73,500	2	By Balance b/d	1,20,000
	To Balance c/d	57,300		By Interest A/c	10,800
		1,30,800			
3	To Bank A/c	57,300	3	By Balance b/d	57,300

Illustration 9

A firm acquired two tractors under hire purchase agreements, details of which were as follows:

Date of Purchase	Tractor A 1st April, 20X1 (₹)	Tractor B 1st Oct., 20X1 (₹)
Cash price	14,000	19,000

Both agreements provided for payment to be made in twenty-four monthly instalments (of ₹ 600 each for Tractor A and ₹ 800 each for Tractor B), commencing on the last day of the month following purchase, all instalments being paid on due dates.

On 30th June, 20X2, Tractor B was completely destroyed by fire. In full settlement, on 10th July, 20X2 an insurance company paid ₹ 15,000 under a comprehensive policy. Any balance on the hire purchase company's account in respect of these transactions was to be written off.

The firm prepared accounts annually to 31st December and provided depreciation on tractors on a straight-line basis at a rate of 20 per cent per annum rounded off to nearest ten rupees, apportioned as from the date of purchase and up to the date of disposal.

You are required to record these transactions in the following accounts, carrying down the balances on 31st December, 20X1 and 31st December, 20X2:

- Tractors on hire purchase.
- Provision for depreciation of tractors.
- Disposal of tractors.

Solution

Hire Purchase accounts in the buyer's books

(a) Tractors on Hire Purchase Account

20X1			₹	20X1				₹
April 1	To	HP Co. - Cash price		Dec. 31	By	Balance c/d		
		Tractor A	14,000			Tractor A	14,000	
Oct. 1	"	HP Co. - Cash price				Tractor B	19,000	33,000
		Tractor B	19,000					
			33,000					33,000

20X2			₹	20X2			₹
Jan. 1	To	Balance b/d		June 30	By	Disposal of Tractor A/c - Transfer	19,000
		Tractor A	14,000		By	Balance c/d	14,000
		Tractor B	19,000	Dec. 31			33,000
			33,000				
20X3							
Jan. 1	To	Balance b/d	14,000				

(b) Provision for Depreciation of Tractors Account

20X1		₹	20X1			₹
Dec. 31	To	Balance c/d	3,050	Dec.31	By P & L A/c:	
					Tractor A	2,100*
					Tractor B	950**
		3,050				3,050

* $14,000 \times 20\% \times 9/12 = 2,100$

** $19,000 \times 20\% \times 3/12 = 950$

20X2		₹	20X2		₹	
June30	To	Disposal of Tractor account— Transfer (950 + 1,900)	2,850	Jan. 1	By Balance b/d	3,050
Dec. 31	To	Balance c/d	4,900	Jun. 30	By P & L A/c (Depn. for Tractor B) (19,000 x 20% x 6/12)	1,900
				Dec. 31	By P & L A/c (Depn. for Tractor A) (14,000 x 20%)	2,800
			7,750			7,750
				20X3		₹
				Jan. 1	By Balance b/d	4,900

(c) Disposal of Tractor Account

20X2		₹	20X2		₹
June 30	To Tractors on hire purchase — Tractor B	19,000	June 30	By Provision for Depn. of Tractors A/c	2,850
			July 10	By Cash : Insurance	15,000
			Dec. 31	By P & L A/c : Loss (b.f.)	1,150
		19,000			19,000

Illustration 10

A machinery is sold on hire purchase. The terms of payment is four annual instalments of ₹ 6,000 at the end of each year commencing from the date of agreement. Interest is charged @ 20% and is included in the annual payment of ₹ 6,000.

Show Machinery Account and Hire Vendor Account in the books of the purchaser who defaulted in the payment of the third yearly payment whereupon the vendor re-possessed the machinery. The purchaser provides depreciation on the machinery @ 10% per annum on WVV basis. All workings should form part of your answers.

Solution**Machinery Account**

		₹			₹
I Yr.	To Hire Vendor A/c (W.N.)	15,533	I Yr.	By Depreciation A/c	1,553
				By Balance c/d	13,980
		15,533			15,533
II Yr.	To Balance b/d	13,980	II Yr.	By Depreciation A/c*	1,398
				By Balance c/d	12,582
		13,980			13,980
III Yr.	To Balance b/d	12,582	III Yr.	By Depreciation A/c*	1,258
				By Hire Vendor	11,000

			By Profit & Loss A/c (Loss on Surrender) (bal.fig.)	324
		12,582		12,582

*Depreciation has been directly credited to the Machinery Account; it could have been accumulated in provision for depreciation account.

Hire Vendor Account

		₹			₹
I Yr.	To Bank A/c	6,000	I Yr.	By Machinery A/c	15,533
	To Balance c/d	12,639		By Interest A/c	3,106
		18,639			18,639
II Yr.	To Bank A/c	6,000	II Yr.	By Balance b/d	12,639
	To Balance c/d	9,167		By Interest A/c	2,528
		15,167			15,167
III Yr.	To Machinery A/c (transfer)	11,000	III Yr.	By Balance b/d	9,167
		11,000		By Interest A/c	1,833
					11,000

Note: Alternatively, total interest could have been debited to Interest Suspense A/c and credited to Hire Vendor A/c with consequential changes.

Working Notes:

		Instalment Amount	Interest	Principal
4th Instalment		6,000	₹	₹
Interest	$6,000 \times \frac{20}{120}$	1,000	1,000	5,000
		5,000		
Add : 3rd Instalment		6,000		
		11,000		
Interest	$11,000 \times \frac{20}{120}$	1,833	1,833	4,167

Add : 2nd Instalment		9,167		
		6,000		
		15,167		
Interest	$15,167 \times \frac{20}{120}$	2,528	2,528	3,472
		12,639		
Add : 1st Instalment		6,000		
		18,639		
Interest	$18,639 \times \frac{20}{120}$	3,106	3,106	2,894
		15,533	8,467	15,533

Illustration 11

X Transport Ltd. purchased from Delhi Motors 3 Tempos costing ₹ 50,000 each on the hire purchase system on 1-1-20X1. Payment was to be made ₹ 30,000 down and the remainder in 3 equal annual instalments payable on 31-12-20X1, 31-12-20X2 and 31-12-20X3 together with interest @ 9%. X Transport Ltd. write off depreciation at the rate of 20% on the diminishing balance. It paid the instalment due at the end of the first year i.e. 31-12-20X1 but could not pay the next on 31-12-20X2. Delhi Motors agreed to leave one Tempo with the purchaser on 1-1-20X3 adjusting the value of the other 2 Tempos against the amount due on 31-12-20X2. The Tempos were valued on the basis of 30% depreciation annually. Show the necessary accounts in the books of X Transport Ltd. for the years 20X1, 20X2 and 20X3.

Solution

X Transport Ltd. Tempo Account

20X1		₹	20X1		₹
Jan. 1	To Delhi Motors	1,50,000	Dec. 31	By Depreciation A/c:20% on 1,50,000	30,000
				By Balance c/d	1,20,000
		1,50,000			1,50,000

20X2			20X2			
Jan. 1.	To Balance b/d	1,20,000	Dec.31.	By Depreciation A/c		24,000
				By Delhi Motors A/c (Value of 2 tempos taken away)		49,000
				By Profit and Loss A/c [(96,000 x 2/3) – 49,000]		15,000
				By Balance c/d (Value of one tempo left) (W.N.1)		32,000
		1,20,000				1,20,000
20X3			20X3			
Jan. 1	To Balance b/d	32,000	Dec. 31	By Depreciation A/c		6,400
				By Balance b/d		25,600
		32,000				32,000

Delhi Motors Account

20X1			₹	20X1			₹
Jan. 1	To	Bank (Down Payment)	30,000	Jan. 1	By	Tempos A/c	1,50,000
Dec. 31	To	Bank	50,800	Dec. 31	By	Interest (9% on ₹ 1,20,000)	10,800
	To	Balance c/d	80,000				
			1,60,800				1,60,800
20X2				20X2			
Jan. 1	To	Tempo	49,000	Jan. 1	By	Balance b/d	80,000
Dec. 31	To	Balance c/d	38,200	Dec. 31	By	Interest (9% on ₹ 80,000)	7,200
			87,200				87,200
20X3			₹	20X3			₹
Dec. 31	To	Bank	41,638	Jan. 1	By	Balance b/d	38,200

				Dec. 31	By	Interest (9% on ₹ 38,200)	3,438
			41,638				41,638

Working Notes :**(1) Value of a Tempo left with the buyer:**

	₹
Cost	50,000
Depreciation @ 20% p.a. under WDV method for 2 years [i.e. ₹ 10,000 + ₹ 8,000]	<u>(18,000)</u>
Value of the Tempo left with the buyer at the end of 2nd year	<u>32,000</u>

(2) Value of Tempos taken away by the seller:

No. of tempos Two

	₹
Cost ₹ 50,000 × 2 =	1,00,000
Depreciation @ 30% Under WDV method for 2 years [i.e. ₹ 30,000 + ₹ 21,000]	<u>(51,000)</u>
Value of tempos taken away at the end of 2nd year	<u>49,000</u>

9. INSTALMENT PAYMENT SYSTEM

In instalment payment system, the ownership of the goods is passed immediately to the buyer on the signing the agreement. The accounting entries under instalment payment system are similar to those passed under the hire-purchase system. The scheme of entries is as under:

Books of buyer: Buyer debits asset account with full cash price, credits vendor's account with full instalment price and debits interest suspense account with the difference between full cash price and full instalment price. Interest is debited to interest suspense account (not interest account) because it includes interest in respect of a number of years. Every year interest account is debited and interest suspense account is credited with the interest of current year. Interest account, at the end of the year, is closed by transferring to profit and loss account. The

balance of vendor account should be shown in the balance sheet after deducting amount in interest suspense account. Vendor is paid the instalment due to him and entry for the depreciation is passed in the usual way.

Books of Seller: The seller debits the purchaser with the full amount (instalment price) payable by him and credits sales account by the full cash price and credits interest suspense account by the difference between the total instalment price and total cash price. Seller, like the buyer, also transfers the amount of interest due from the interest suspense account interest account every year. Interest account is closed by transferring to profit and loss account and the purchaser account should be shown in the balance sheet after deducting amount in interest suspense account. On receiving the instalment the vendor debits cash/bank account and credits purchaser's account.



10. DIFFERENCE OF HIRE PURCHASE AGREEMENT AND INSTALMENT PAYMENT AGREEMENT

A hire purchase agreement is a contract of bailment coupled with an option to the hire purchaser to acquire the goods delivered to him under such an agreement. By the delivery of goods to the hire purchaser, the hire vendor merely pass with their possession, but not the ownership. The property or title to the goods is transferred to the hire-purchaser, on his paying the last instalment of the hire price or complying with some other conditions stipulated in the contract. At any time before that the hire-purchaser has the option to return the goods and, if he does so, he has only to pay the instalments of price that by then have fallen due. The right or option to purchase is the essence of hire-purchase agreement. In the event of a default by the buyer (hire purchaser) in the payment of any of the instalments of hire price, the vendor can take back the goods into his possession. This is legally permissible since the property in the goods is still with the vendor.

On the other hand, it may have been agreed between the buyer and the seller that the price of the goods would be payable by instalments and the property would immediately pass to the buyer; in the event of a default of instalments, it would not be possible for the vendor to recover back the goods. He, however, would have the right to bring an action against the purchaser for the recovery of the part of the price that has not been paid to him.

Analysis of the hire purchase price: The hire purchase price is always greater than the cash price, since it includes interest payable over and above the price of the goods to compensate the seller for the sacrifice he has made by agreeing to receive the price by instalments and the risk that he thereby undertakes. It is thus made up of following elements:

- (a) cash price;
- (b) interest on unpaid instalments; and
- (c) a charge to cover the risk involved in the buyer defaulting to pay one or more of instalments of price or that of his returning the goods in a damaged condition.

Interest is the charge for the facility to pay the price for the goods by instalments after they have been delivered. The rate of interest is generally higher than that payable in respect of an advance or a loan since it also includes a charge to cover the risk that the hirer may fail to pay any of the instalments and, in such an event, the goods may have to be taken back into possession in whatever condition they are at the time. A separate charge on this account is not made as that would not be in keeping with the fundamental character of the hire-purchase sale.

Statement showing differences between Hire Purchase and Instalment System

	Basis of Distinction	Hire Purchase	Instalment System
1.	Governing Act	It is governed by Hire Purchase Act, 1972.	It is governed by the Sale of Goods Act, 1930.
2.	Nature of Contract	It is an agreement of hiring.	It is an agreement of sale.
3.	Passing of Title (ownership)	The title to goods passes on last payment.	The title to goods passes immediately as in the case of usual sale.
4.	Right to Return goods	The hirer may return goods without further payment except for accrued instalments.	Unless seller defaults, goods are not returnable.
5.	Seller's right to repossess	The seller may take possession of the goods if hirer is in default.	The seller can sue for price if the buyer is in default. He cannot take possession of the goods.

6.	Right of Disposal	Hirer cannot hire out sell, pledge or assign entitling transferee to retain possession as against the hire vendor.	The buyer may dispose off the goods and give good title to the bona fide purchaser.
7.	Responsibility for Risk of Loss.	The hirer is not responsible for risk of loss of goods if he has taken reasonable precaution because the ownership has not yet transferred.	The buyer is responsible for risk of loss of goods because of the ownership has transferred.
8.	Name of Parties involved	The parties involved are called Hirer and Hire vendor.	The parties involved are called buyer and seller.
9.	Component other than cash price.	Component other than Cash Price included in installment is called Hire charges.	Component other than Cash Price included in Installment is called Interest.

SUMMARY

- **Under Hire Purchase System**, hire purchaser will pay cost of purchased asset in installments. The ownership of the goods will be transferred by the Hire Vendor only after payment of outstanding balance.
- **Under installment system**, ownership of the goods is transferred by owner on the date of delivery of goods.
- **Accounting for hire purchase transactions**
 - Hire purchaser's books
 - ✓ Cash price Method
 - ✓ Interest suspense method
 - Hire vendor's books
 - ✓ Sales Method
 - ✓ Interest suspense method

TEST YOUR KNOWLEDGE

MCQs

- The amount paid at the time of entering the hire-purchase transaction for the goods purchased is known as
 - Cash price
 - Down payment
 - First instalment
- Total interest on hire purchased goods is the difference between
 - Hire purchase price and cash price
 - Hire purchase price and down payment
 - Cash price and first instalment
- Depreciation on hire purchased asset is claimed by
 - Hire vendor
 - Hire purchaser
 - Either the hire vendor or the hire purchaser as per the agreement between them
- Under instalment payment system, ownership of goods
 - is transferred at the time of payment of last instalment
 - is not transferred
 - is transferred at the time of signing the contract.
- The hire purchaser records the asset at its
 - Hire purchase price
 - Amount paid to the vendor till date
 - Cash price
- The ownership of goods purchased under hire purchase is transferred only when
 - Down payment is paid
 - Outstanding balance is paid in full.

- (c) Cash price and first installment is paid
7. Hire purchase price is
- Cash price
 - Interest on unpaid installments.
 - Both (a) and (b).

Theoretical Questions

- What is meant by Hire purchase transactions? What are the specific features of hire purchase transactions?
- What are the differences between Hire Purchase and Instalment System?

Practical Questions

Question 1

A acquired on 1st January, 20X1 a machine under a Hire-Purchase agreement which provides for 5 half-yearly instalments of ₹ 6,000 each, the first instalment being due on 1st July, 20X1. Assuming that the applicable rate of interest is 10 per cent per annum, calculate the cash value of the machine. All working should form part of the answer.

Question 2

On 1st April, 20X1, Fastrack Motors Co. sells a truck on hire purchase basis to Teja Transport Co. for a total hire purchase price of ₹ 9,00,000 payable as to ₹ 2,40,000 as down payment and the balance in three equal annual instalments of ₹ 2,20,000 each payable on 31st March 20X2, 20X3 and 20X4.

The hire vendor charges interest @ 10% per annum.

You are required to ascertain the cash price of the truck for Teja Transport Co. Calculations may be made to the nearest rupee.

Question 3

Lucky bought 2 tractors from Happy on 1-10-20X1 on the following terms:

	₹
Down payment	5,00,000
1 st installment at the end of first year	2,65,000
2 nd installment at the end of 2 nd year	2,45,000

3rd installment at the end of 3rd year

2,75,000

Interest is charged at 10% p.a.

Lucky provides depreciation @ 20% on the diminishing balances.

On 30-9-20X4 Lucky failed to pay the 3rd installment upon which Happy repossessed 1 tractor. Happy agreed to leave one tractor with Lucky and adjusted the value of the tractor against the amount due. The tractor taken over was valued on the basis of 30% depreciation annually on written down basis. The balance amount remaining in the vendor's account after the above adjustment was paid by Lucky after 3 months with interest @ 18% p.a.

You are required to:

- (1) Calculate the cash price of the tractors and the interest paid with each installment.
- (2) Prepare Tractor Account and Happy Account in the books of Lucky assuming that books are closed on September 30 every year. Figures may be rounded off to the nearest rupee.

ANSWERS/ SOLUTIONS

MCQs

1. (b) 2. (a) 3. (b) 4. (c) 5. (c) 6. (b) 7. (c)

Theoretical Questions

1. Under the Hire Purchase System, the Hire Purchaser gets possession of the goods at the outset and can use it, while paying for it in instalments over a specified period of time as per the agreement. However, the ownership of the goods remains with the Hire Vendor until the hire purchaser has paid all the instalments. For specific features of such transactions, refer Para 3 of the Chapter.
2. Hire Purchase is an agreement of hiring the asset whereas Instalment sale is an agreement of sale. The title to goods passes on last payment in the hire purchase transaction but the title to goods passes immediately in the case of instalment sale. The hirer may return goods without further payment except for accrued instalments in hire purchase transaction but in case of instalment sale, goods are not returnable unless seller defaults. For details, refer Para 10 of the Chapter.

Practical Questions

Answer 1

Statement showing cash value of the machine acquired on hire-purchase basis

	<i>Instalment Amount</i>	<i>Interest @ 5% half yearly (10% p.a.) = 5/105 = 1/21 (in each instalment)</i>	<i>Principal Amount (in each instalment)</i>
	₹	₹	₹
5th Instalment	6,000	286	5,714
Less: Interest	<u>(286)</u>		
	5,714		
Add: 4th Instalment	<u>6,000</u>		
	11,714	558	5,442
Less: Interest	<u>(558)</u>		(6,000 – 558)
	11,156		
Add: 3rd instalment	<u>6,000</u>		
	17,156	817	5,183
Less: Interest	<u>(817)</u>		(6,000 – 817)
	16,339		
Add: 2nd instalment	<u>6,000</u>		
	22,339	1,063	4,937
Less: Interest	<u>(1,063)</u>		(6,000 – 1,063)
	21,276		
Add: 1st instalment	<u>6,000</u>		
	27,276	1,299	4,701
Less: Interest	<u>(1,299)</u>		(6,000 – 1,299)
	<u>25,977</u>	<u>4,023</u>	<u>25,977</u>

The cash purchase price of machinery is ₹ 25,977.

Answer 2

$$\text{Ratio of interest and amount due} = \frac{\text{Rate of interest}}{100 + \text{Rate of interest}} = \frac{10}{110} = \frac{1}{11}$$

There is no interest element in the down payment as it is paid on the date of the transaction. Instalments paid after certain period includes interest portion also. Therefore, to ascertain cash price, interest will be calculated from last instalment to first instalment as follows:

Calculation of Interest and Cash Price

No. of instalments	Amount due at the time of instalment	Interest	Cumulative Cash price
[1]	[2]	[3]	(2-3) = [4]
3 rd	2,20,000	1/11 of ₹ 2,20,000 = ₹ 20,000	2,00,000
2 nd	4,20,000 [W.N.1]	1/11 of ₹ 4,20,000 = ₹ 38,182	3,81,818
1 st	6,01,818 [W.N.2]	1/11 of ₹ 6,01,818 = ₹ 54,711	5,47,107

Total cash price = ₹ 5,47,107 + 2,40,000 (down payment) = ₹ 7,87,107.

Working Notes:

1. ₹ 2,00,000 + 2nd instalment of ₹ 2,20,000 = ₹ 4,20,000.
2. ₹ 3,81,818 + 1st instalment of ₹ 2,20,000 = ₹ 6,01,818.

Answer 3

(i) Calculation of Interest and Cash Price

No. of installments	Outstanding balance at the end after the payment of installment	Amount due at the time of installment	Outstanding balance at the end before the payment of installment	Interest	Outstanding balance at the beginning
[1]	[2]	[3]	[4] = 2 + 3	[5] = 4 × 10/110	[6] = 4 - 5
3 rd	-	2,75,000	2,75,000	25,000	2,50,000
2 nd	2,50,000	2,45,000	4,95,000	45,000	4,50,000
1 st	4,50,000	2,65,000	7,15,000	65,000	6,50,000

Total cash price = ₹ 6,50,000 + 5,00,000 (down payment) = ₹ 11,50,000.

(ii) ... In the books of Lucky

Tractors Account

<i>Date</i>	<i>Particulars</i>	<i>₹</i>	<i>Date</i>	<i>Particulars</i>	<i>₹</i>
1.10.20X1	To Happy a/c	11,50,000	30.9.20X2	By Depreciation A/c	2,30,000
				Balance c/d	9,20,000
		11,50,000			11,50,000
1.10.20X2	To Balance b/d	9,20,000	30.9.20X3	By Depreciation A/c	1,84,000
				Balance c/d	7,36,000
		9,20,000			9,20,000
1.10.20X3	To Balance b/d	7,36,000	30.9.20X4	By Depreciation A/c	1,47,200
				By Happy a/c (Value of 1 Tractor taken over after depreciation for 3 years @30% p.a.) {5,75,000-(1,72,500+1,20,750+84,525)}	1,97,225
				By Loss transferred to Profit and Loss a/c on surrender (Bal. fig.) or (2,94,400-1,97,225)	97,175
				By Balance c/d	2,94,400
				½ (7,36,000-1,47,200=5,88,800)	
		7,36,000			7,36,000

Happy Account

<i>Date</i>	<i>Particulars</i>	<i>₹</i>	<i>Date</i>	<i>Particulars</i>	<i>₹</i>
1.10.X1	To Bank (down payment)	5,00,000	1.10.X1	By Tractors a/c	11,50,000
30.9.X2	To Bank (1 st Installment)	2,65,000	30.9.X2	By Interest a/c	65,000
	To Balance c/d	4,50,000			
		12,15,000			12,15,000

30.9.X3	To Bank (2 nd Installment)	2,45,000	1.10.X2	By Balance b/d	4,50,000
	To Balance c/d	2,50,000	30.9.X3	By Interest a/c	45,000
		4,95,000			4,95,000

30.9.X4	To Tractor a/c	1,97,225	1.10.X3	By Balance b/d	2,50,000
	To Balance c/d (b.f.)	77,775	30.9.X4	By Interest a/c	25,000
		2,75,000			2,75,000
31.12.X4	To Bank (Amount settled after 3 months)	81,275	1.10.X4	By Balance b/d	77,775
			31.12.X4	By Interest a/c (@ 18% on bal.) (77,775x3/12x18/100)	3,500
		81,275			81,275

