Accounting for Hire Purchase and Installment Sale Transactions

For CA Intermediate (Paper-I)

BY CA PARDEEP MAKKAR
Introduction

When a person wants to acquire an asset but is not able to make payment in one go then he may opt for making payment in installments if vendor agrees.

This enables the purchaser to use the asset while paying for it in installments over an agreed period of time.

This type of Business Deal is known as hire purchase transaction.

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Hire-purchase meant for transactions where goods are purchased or sold with the following features:

(a) Payment would be made in installments.

(b) Each installment will be treated as Rental/hire so that if default is made in the payment of even the last installment, the seller will be entitled to take away the goods without compensating the hire-purchaser.

(c) If all the installments are paid, the goods will be treated as sold and the property will pass on to purchaser.
Terms used in Hire Purchase Agreements

1. Possession - Retain

2. Down Payment – Payment made by hire purchaser at the time of signing of agreement.

3. Repossession: if any installment is not paid by Hire Purchaser, Hire vendor may acquire the goods which is called Repossession.

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Terms used in Hire Purchase Agreements

4. Hire Vendor: Hire vendor is a person who delivers the goods along with its possession to the hire purchaser under a hire purchase agreement.

5. 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.

6. Cash Price: Cash price is the amount to be paid by the buyer on outright purchase in cash.
Methods of Recording:-

(i) Cash Price Method:
- Asset account is debited with cash price included in each installment.
- Down payments is fully adjusted towards cash price.

(ii) Interest Suspense Method:
- Buyer debits the asset with total cash price at the time of signing the Agreement.
- Total Interest = HP Price – CP Price is transferred to interest suspense account at the timing of Signing the Agreement.
Cash price method

Buyer's Books:-
Goods purchased on hire purchase system should be treated as property of the business on the assumption that asset has been purchased with the intention of paying all the installments on due dates.
Under this method, the following entries are to be passed in the books of the buyer:

i. When an asset is purchased on hire purchase system
   Asset Account \( \text{Dr.} \) (With cash price)
   To Hire Vendor Account

ii. For cash down payment on delivery
    Hire Vendor Account \( \text{Dr.} \)
    To Cash/Bank

iii. For interest due at the end of the year
     Interest Account \( \text{Dr.} \)
     To Hire Vendor Account

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iv. For the payment of the first installment
   Hire Vendor Account     Dr.
   To Bank

v. For depreciation charged
   Depreciation Account     Dr.
   To Asset Account

vi. For transfer of interest and depreciation to profit and loss account
    Profit & Loss Account     Dr.
    To Interest Account
    To Depreciation Account

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Disclosure in the balance sheet

Assets
Fixed Assets :
Asset (at cash price) xxxxx.xx
Less : Depreciation xxxxx.xx

Creditors :
Hire Purchase Creditors:
Balance in hire vendor's A/c xxxxxxx.xx
Installment due xxxxxxx.xx
Installment not yet due xxxxxxx.xx

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Vendor's Book:
The following entries are passed in the books of vendor:

(i) When goods are sold on hire purchase

    Hire Purchaser's Account Dr.
    To Hire Sales Account

Hire Sales Account is ultimately closed by transfer to trading account.

(ii) For cash received on delivery

    Cash/Bank Account Dr.
    To Hire Purchaser's Account

(iii) For interest due on installment at the end of the year

    Hire Purchaser's Account Dr.
    To Interest Account
Note. Interest in the last installment will be difference between the installment payable and amount remaining unpaid by way of principal.

iv. For receipt of the amount of installment
   Cash/Bank Account   Dr.
   To Hire Purchaser's Account

v. For transferring the balance of interest to profit and loss account
   Interest Account   Dr.
   To Profit and Loss Account

Note. Entries (iii) to (v) will be repeated in subsequent years.

Lets Do Illustration No. 6
Default and Repossession:
When the hirer is not able to make the payment in time then default is committed by and the owner take back the possession of goods.

Possession can be in two ways :-
(i) When seller takes possession of complete goods – Complete Repossession
(ii) When seller takes possession of only part of total goods sold to the buyers – Partial Repossession
Complete Repossession:

1. Hire vendor Debits goods Repossessed A/c and Credit Hire Purchaser A/c with the agreed value.

Partial Repossession:

1. Hire Vendor Debit goods Repossessed A/c and Credit Hire Purchaser A/c and Credit Hire Purchaser A/c with the agreed value.

2. Hire purchaser debits the Hire Vendor A/c and Credit Asset A/c with the agreed value.

**Note:** If agreed Value < Book Value

The difference is charged to Profit & Loss A/c of Hire Purchaser.
Accounting Treatment:
Calculation of Interest: Following are the cases stating the method of segregating interest from installments in different situations.

Q. 1 When rate of interest, total cash price and installments are given.
Q.1. On January 1, 2010 HP and Co. acquired a pick-up Van on hire purchase from FM & Co. Ltd. The terms of the contract were as follows:

a) The cash price of the van was Rs.1,00,000.
b) Rs.40,000 were to be paid on signing of the contract.
c) The balance was to be paid in annual installments of Rs.20,000 plus interest.
d) Interest chargeable on the outstanding balance was 6% p.a.
e) Depreciation at 20% p.a. is to be written-off using the straight-line method.
You are required to:

a) Give Journal Entries and show the relevant accounts in the books of HP and Co. from January 1, 2010 to December 31, 2012; and

b) Show the relevant items in the Balance sheet of the purchaser as on December 31, 2010 to 2012.

Accounting for Hire Purchase and Installment Purchases

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Accounting Treatment:

When total cash price and installments are given but rate of interest is not given.

Q 2. On 1st Jan. 20X1, A Ltd. purchased a machine from B Ltd. on hire purchase basis on the following terms:
(a) Cash-Price-Rs. 7,92,500  
(b) Cash Down Payment-20%  
(c) Four annual equal installments of Rs. 2,00,000 each to be paid at the end of each year.

Required: Compute the amount of interest pertaining to each accounting year assuming
(a) That the sales were made at the beginning of the year, and
(b) That the sales were made uniformly throughout the year.
Solution

(i) Hire Purchase Price = Down Payment + Installments
= Rs. 1,58,500 + Rs. 8,00,000
= Rs. 9,58,500

(ii) Total Interest = H.P. Price - Cash Price
= Rs. 9,58,500 - Rs. 7,92,500
= Rs. 1,66,000
a) If the sales were made at the beginning of the year

iii. Statement showing the Calculation of Ratio of Hire Purchase Price Outstanding in the Beginning of each year

<table>
<thead>
<tr>
<th>Year</th>
<th>Amount Due in the Beginning of each year</th>
<th>Installment paid</th>
<th>Amount Due at the End of each year</th>
<th>Ratio of Amount Due in Begging</th>
<th>Interest (Total Interest X Ration / Total Ratio)</th>
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Accounting Treatment:
When only installments are given but cash price and rate of interest is not given

Q 3. A Ltd. purchased a machine on hire purchase basis from B Ltd. on the following terms:

a) Cash Down Payment - Rs. 1,58,500

b) Four Installments of Rs. 2,21,900, Rs. 2,06,050, Rs. 1,90,200 & Rs. 1,74,350 at the end of the 1st year, 2nd year, 3rd year and 4th year respectively.

c) The payment of the cash price in each installment - Uniform.
Solution
Difference between any two successive installments represents the least amount of interest charged in the last year i.e.
Rs. 2,21,900 - Rs. 2,06,050 = Rs. 15,850

Thus, Interest for 3rd year = Least amount of Interest x 2 = 31,700

Thus, Interest for 2nd year = Rs. 15,850 x 3 = 47,550

Thus, Interest for 1st year = Rs. 15,850 x 4 = 63,400

Thus, the allocation of installment between cash price and interest is at under:
# Accounting for Hire Purchase and Installment Purchases

<table>
<thead>
<tr>
<th>Installment</th>
<th>Interest</th>
<th>Cash Price</th>
<th>Installment Interest</th>
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Accounting for Hire Purchase and Installment Purchases

Accounting Treatment:
When rate of interest and installments are given but total cash price is not given

Q.4. On 1st April, 2011, Globe Press purchased a printing machine on hire purchase system from Modern Manufacturing Co. The payment was to be made as Rs. 30,000 down and the balance in three equal annual installments of Rs. 20,000 each payable on 31st March. The vendor company charged interest @ 8% p.a. Globe Press provided depreciation @ 10% on the diminishing balances and paid all the installments. It closed its books on 31st March every year.


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### Accounting for Hire Purchase and Installment Purchases

<table>
<thead>
<tr>
<th>Year</th>
<th>Amount outstanding at the end</th>
<th>Interest included in it</th>
<th>Amount outstanding at the Beginning of</th>
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</thead>
<tbody>
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<td>3(^{rd}) Year</td>
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<tr>
<td>2(^{nd}) Year</td>
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<td></td>
</tr>
<tr>
<td>1(^{st}) Year</td>
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</tbody>
</table>
Q.7. Rapid Engineering Works sold to CSFIE Ltd. a machine on the cash value of Rs. 31,360 on hire purchase basis on 1\textsuperscript{st} April, 2011. A sum of Rs. 9,000 was paid at the time of delivery. The balance was payable in three equal annual installments of Rs. 9,000 each payable on 31\textsuperscript{st} March of every year. Interest was charged at the rate of 10\% per annum. The purchaser charged 10\% depreciation per annum on the diminishing balances on the machine. Hire purchaser failed to pay the installment due on 31\textsuperscript{st} March, 2013. Rapid Engineering Works obtained the permission of the court to repossess the machine as a result of default by the purchaser and having completed all the statutory requirements took possession of the machine on 31\textsuperscript{st} May, 2013. Prepare the necessary ledger accounts in the books of hire purchaser.

\textbf{Ans. Profit and Loss A/c (balancing figure) Rs. 7537.}
Q.8. X Ltd. purchased 3 milk vans from Super Motors costing Rs. 75,000 each on hire purchase system. Payment was to be made: Rs. Rs. 45,000 down and the remainder in 3 equal installments together with interest @ 9%. X Ltd. writes off depreciation @ 20% on the diminishing balance. It paid the installment 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.

Ans. P & L A/c =22,500
Q.9. Banerjee & Co. purchased seven trucks on hire purchase on 1\textsuperscript{st} July, 2011. The cash purchase price of each truck was Rs. 50,000. The company has to pay 20\% of the cash purchase price at the time of delivery and the balance in five half yearly installments starting from 31\textsuperscript{st} December, 2011 with interest at 5\% per annum at half yearly rest. On the Company’s failure to pay the installment due on 30\textsuperscript{th} June, 2012, it was agreed that the company would return three trucks to the vendor and the remaining four would be retained. The vendor agreed to allow him a credit for the amount paid against these three trucks less 25\%. Show the relevant accounts in the books of the purchaser and the vendor assuming the books are closed in June every year and depreciation @ 20\% p.a. is charged on trucks. Vendor after spending Rs.1,000 on repairs sold away all the three trucks for Rs. 40,000.

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Ans. Credit allowed by Vendor
(Rs. 54,000 - 25% of Rs. 54,000) 40,500
Loss on return of three Trucks 79,500
Accounting for Hire Purchase and Installment Purchases

Accounting Treatment
When reference to annuity table rate of interest and installments are given total cash price is not given.

Miscellaneous.

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 years @ 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:

\[
\text{Cash price} = \text{Annual instalment} \times \frac{(1 + r)^n - 1}{r (1 + r)^n}
\]

\[
= 30,000 \times \frac{(1 + 0.05)^3 - 1}{0.05 (1 + 0.05)^3}
\]

\[
= \text{`81697.}
\]

Note - The difference in cash price of `7 is on account of approximation.
Question 1
Kamal purchased a Bus on hire purchase system. As per terms he is required to pay 2,80,000 down, 2,12,000 at the end of first year, 1,96,000 at the end of second year and 2,20,000 at the end of the third year. Interest is charged @ 10% p.a.

You are required to calculate the total cash price of the Bus and the interest paid with each instalment.
## Calculation of Interest and Cash Price

<table>
<thead>
<tr>
<th>No. of installments</th>
<th>Amount due at the time of installment</th>
<th>Interest</th>
<th>Cash price</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>[2 ]</td>
<td>[3]</td>
<td>[4]</td>
</tr>
<tr>
<td>3rd</td>
<td>2,20,000</td>
<td>1/11 of 2,20,000 = 20,000</td>
<td>2,00,000</td>
</tr>
<tr>
<td>2nd</td>
<td>*3,96,000</td>
<td>1/11 of 3,96,000 = 36,000</td>
<td>3,60,000</td>
</tr>
<tr>
<td>1st</td>
<td>**5,72,000</td>
<td>1/11 of 5,72,000 = 52,000</td>
<td>5,20,000</td>
</tr>
</tbody>
</table>
Total cash price = 5,20,000 + 2,80,000 (down payment) = 8,00,000.

* 2,00,000 + 2nd installment of 1,96,000 = 3,96,000.

** 3,60,000 + 1st installment of 2,12,000 = 5,72,000.
Question 2

The following particulars relate to hire purchase transactions:

(i) R (hire purchaser) purchased three machineries from S on hire purchase system. The cash price of each machinery being ₹3,00,000.

(ii) The hire purchaser charged depreciation @ 20% on written down value method.

(iii) Two machineries were seized by hire vendor when second installment was not paid at the end of the second year. The hire vendor valued the two machineries at cash price less 30% depreciation charge for each of the years under written down value method.

(iv) The hire vendor spent ₹15,000 on repairs of the machineries and then sold them for a total amount of ₹2,55,000. You are required to compute:

(1) Agreed value of two machineries taken back by the hire vendor.

(2) Book value of one machine left with the Hire purchaser.
(3) Profit or loss to hire purchaser on two machineries taken, back by the hire vendor.

(4) Profit or loss on machineries repossessed, when sold by the hire vendor.