

ASSIGNMENTS FOR CLASS

EQUITY, FINANCIAL LIABILITY, COMPOUND FINANCIAL INSTRUMENT

1).

Trade receivables

A Ltd. makes sale of goods to customers on credit of 45 days. The customers are entitled to earn a cash discount @ 2% per annum if payment is made before 45 days and an interest @ 10% per annum is charged for any payments made after 45 days. Company does not have a policy of selling its debtors and holds them to collect contractual cash flows. Evaluate the financial instrument.

2).

Deposits

Z Ltd. (the 'Company') makes sale of goods to customers on credit. Goods are carried in large containers for delivery to the dealers' destinations. All dealers are required to deposit a fixed amount of ₹10,000 as security for the containers, which is returned only when the contract with Company terminates. The deposits carry 8% per annum which is payable only when the contract terminates. If the containers are returned by the dealers in broken condition or any damage caused, then appropriate adjustments shall be made from the deposits at the time of settlement. How would such deposits be treated in books of the dealers?

3).

Creditors for sale of goods

A Ltd. (the 'Company') makes purchase of steel for its consumption in normal course of business. The purchase terms provide for payment of goods at 30 days credit and interest payable @ 12% per annum for any delays beyond the credit period. Analyse the nature of this financial instrument.

4).

Derivative contract:

Entity – B Ltd writes an option contract for sale of shares of Target Ltd. at a fixed price of ₹ 100 per share to C Ltd. This option is exercisable anytime for a period of 90 days ('American option'). Evaluate this under definition of financial instrument.

5).

Settlement in variable number of shares

Target Ltd. took a borrowing from Z Ltd. for ₹10,00,000. Z Ltd. enters into an arrangement with Target Ltd. for settlement of the loan against issue of a certain number of equity shares of Target Ltd. whose value equals ₹10,00,000. For this purpose, fair value per share (to determine total number of equity shares to be issued) shall be determined based on the market price of the shares of Target Ltd. at a future date, upon settlement of the contract.

Evaluate this under definition of financial instrument.

6).

Preference shares with non-cumulative dividend

Silver Ltd. issued irredeemable preference shares with face value of ₹10 each and premium of ₹90. These shares carry dividend @ 8% per annum, however dividend is paid only when Silver Ltd declares dividend on equity shares. Analyse the nature of this instrument.

7).

Non-derivative contract to be settled in own equity instruments

A Ltd. invests in compulsorily convertible preference shares (CCPS) issued by its subsidiary – B Ltd. at ₹1,000 each (₹10 face value + ₹990 premium). Under the terms of the instrument, each CCPS is compulsorily convertible into one equity share of B Ltd at the end of 5 years. Such CCPS carry dividend@12% per annum, payable only when declared at the discretion of B Ltd. Evaluate this under definition of financial instrument.

8).

Derivative contract to be settled in own equity instruments

A Ltd. issues warrants to all existing shareholders entitling them to purchase additional equity shares of A Ltd. (with face value of ₹100 per share) at an issue price of ₹150 per share. Evaluate whether this constitutes an equity instrument or a financial liability?

9).

Redeemable preference shares with mandatory dividend

A Ltd. (issuer) issues preference shares to B Ltd. (holder). Those preference shares are redeemable at the end of 10 years from the date of issue and entitle the holder to a cumulative dividend of 15% p.a. The rate of dividend is commensurate with the credit risk profile of the issuer. Examine the nature of the financial instrument.

10).

Redeemable debentures with discretionary dividend

X Co. Ltd. (issuer) issues debentures to Y Co. Ltd. (holder). Those debentures are redeemable at the end of 10 years from the date of issue. Interest of 15% p.a. is payable at the discretion of the issuer. The rate of interest is commensurate with the credit risk profile of the issuer. Examine the nature of the financial instrument.

11).

Perpetual loan with mandatory interest

P Co. Ltd. (issuer) takes a loan from Q Co. Ltd. (holder). The loan is perpetual and entitles the holder to fixed interest of 8% p.a. Examine the nature of the financial instrument.

12).

Restriction on the ability of an entity to satisfy a contractual obligation

Does the lack of access to foreign currency or the need to obtain approval for payment from a regulatory authority, will negate the contractual right or obligation?

13).

Optionally convertible redeemable preference shares

D Ltd. issues preference shares to G Ltd. The holder has an option to convert these preference shares to equity instruments of the issuer anytime up to a period of 10 years. If the option is not exercised by the holder, the preference shares are redeemed at the end of 10 years. Examine the nature of the financial instrument.

14).

Settlement alternative is non-financial obligation

LMN Ltd. issues preference shares to PQR Ltd. These preference shares are redeemable at the end of 5 years from the date of issue.

The instrument also provides a settlement alternative to the issuer whereby it can transfer a particular commercial building to the holder, whose value is estimated to be significantly higher than the cash settlement amount. Examine the nature of the financial instrument.

15).

Cap on amount payable on liquidation

ABC Ltd. has two classes of puttable shares – Class A shares and Class B shares. On liquidation, Class B shareholders are entitled to a pro rata share of the entity's residual assets up to a maximum of ₹10,000,000.

There is no limit to the rights of the Class A shareholders to share in the residual assets on liquidation. Examine the nature of the financial instrument.

16).

Investment manager's share in a mutual fund

Mutual Fund X has an Investment Manager Y. At the inception of the fund, Y had invested a nominal or token amount in units of X. Such units rank last for repayment in the event of liquidation. Accordingly, they constitute the most subordinate class of instruments. Examine the nature of the financial instrument.

17).

Differential voting rights

T Motors Ltd. has issued puttable ordinary shares and puttable 'A' ordinary shares whereby holders of ordinary shares are entitled to one vote per share whereas holders of 'A' ordinary shares are not entitled to any voting rights. The holders of two classes of shares are equally entitled to receive share in net assets upon liquidation. Examine whether the financial instrument will be classified as equity.

18).

Conversion into a variable number of equity instruments

S Ltd. has issued a class of puttable ordinary shares to T Ltd. Besides the put option (which is consistent with other classes of ordinary shares), T Ltd. is also entitled to convert the class of ordinary shares held by it into equity instruments of S Ltd. whose number will vary as per the market value of S Ltd. Examine whether the financial instrument will be classified as equity.

19).

Management fee contract between issuer and puttable instrument holder

P Ltd. has issued puttable ordinary shares to Q Ltd. Q Ltd. has also entered into an asset management contract with P Ltd. whereby Q Ltd. is entitled to 50% of the profit of P Ltd. Normal commercial terms for similar contracts will entitle the service provider to only 4%-6% of the net profits. Examine whether the financial instrument will be classified as equity.

20).

Foreign currency convertible bond

Entity A issues a bond with face value of USD 100 and carrying a fixed coupon rate of 6% p.a. Each bond is convertible into 1,000 equity shares of the issuer. Examine the nature of the financial instrument.

21).

Conversion into a number of equity instruments equivalent to a fixed value

CBA Ltd. issues convertible debentures to RQP Ltd. for a subscription amount of ₹100 crores. Those debentures are convertible after 5 years into equity shares of CBA Ltd. using a predetermined formula. The formula is:

$$\frac{100 \text{ crores} \times (1+10\%)^5}{\text{Fair value on date of conversion}}$$

Examine the nature of the financial instrument.

22).

Conversion into a fixed number of equity instruments

DF Ltd. issues convertible debentures to JL Ltd. for a subscription amount of ₹100 crores. Those debentures are convertible after 5 years into 15 crore equity shares of ₹10 each.

Examine the nature of the financial instrument.

23).

Written option for a fixed or variable number of equity instruments

ST Ltd. purchases an option from AT Ltd. entitling the holder to subscribe to equity shares of issuer at a fixed exercise price of ₹50 per share at any time during a period of 3 months. Holder paid an initial premium of ₹2 per option. Examine whether the financial instrument will be classified as equity.

24).

Written option with multiple exercise prices

WC Ltd. writes an option in favour of GT Ltd. wherein the holder can purchase issuer's equity instruments at prices that fluctuate in response to the share price of issuer.

As per the terms, if the share price of issuer is less than ₹50 per share, option can be exercised at ₹40 per share. If the share price is equal to or more than ₹50 per share, option can be exercised at ₹60 per share. Explain the nature of the financial instrument.

25).

Instrument F is a bond that is convertible into a fixed number of equity instruments of the issuer. Analyse the nature of cash flows.

26).

Conversion ratio changes with time

On 1 January 2011, NKT Ltd. subscribes to convertible preference shares of VT Ltd. The conversion ratio varies as below:

Conversion upto 31 March 2011: 1 equity share of VT Ltd. for each preference share held

Conversion upto 30 June 2011: 1.5 equity share of VT Ltd. for each preference share held

Conversion upto 31 December 2011: 2 equity share of VT Ltd. for each preference share held.

Examine whether the financial instrument will be classified as equity.

27).

Conversion ratio changes to protect rights of convertible instrument holders

On 1st January 2011, HT Ltd. subscribes to convertible preference shares of RT Ltd. The preference shares are convertible in the ratio of 1:1.

The terms of the instrument entitle HT Ltd. to proportionately more equity shares of RT Ltd. in case of a stock split or bonus issue. Examine whether the financial instrument will be classified as equity.

28).

Conversion ratio changes if issuer subsequently issues shares to others at a lower price

On 1st January 2011, PG Ltd. subscribes to convertible preference shares of BG Ltd. at ₹100 per preference share. The preference shares are convertible in the ratio of 10:1 i.e. 10 equity shares for each preference share held. On a fully diluted basis, PG Ltd. is entitled to 30% stake in BG Ltd.

If subsequent to the issuance of these convertible preference shares, BG Ltd. issues any equity instruments at a price lower than ₹10 per share, conversion ratio will be changed to compensate PG Ltd. for dilution in its stake below the expected dilution at a price of ₹10 per share. Examine the nature of the financial instrument.

29).

Conversion ratio is variable in a narrow range

On 1 January 2011, NG Ltd. subscribes to convertible preference shares of AG Ltd. at ₹100 per preference share. On a fully diluted basis, NG Ltd. is entitled to 30% stake in AG Ltd.

The preference shares are convertible at fair value, subject to, NG Ltd.'s stake not going below 15% and not going above 40%. Examine the nature of the financial instrument.

30).

Perpetual loan with mandatory interest

P Co. Ltd. (issuer) takes a loan from Q Co. Ltd. (holder) for ₹12 lakhs. The loan is perpetual and entitles the holder to fixed interest of 8% p.a. The rate of interest commensurate with credit risk profile of the issuer is 12% p.a. Calculate the value of the liability and equity components.

31).

Instrument convertible only at the option of issuer

XYZ Ltd. issues optionally convertible debentures with the following terms:

The debentures carry interest at the rate of 7% p.a.

Issuer has option to either:

Convert the instrument into a fixed number of its own shares at any time, or redeem the instrument in cash at any time. The redemption price is the fair value of the fixed number of shares into which the instrument would have converted if it had been converted.

The holder has no conversion or redemption options.

Debentures have a tenor of 12 years and, if not converted or redeemed earlier, will be repaid in cash at maturity, including accrued interest, if any.

Examine the nature of the financial instrument.

32).

Conversion ratio changes under independent scenarios

On 1 January 2011, STAL Ltd. subscribes to convertible preference shares of ATAL Ltd.

The preference shares are convertible as below:

Convertible 1:1 if another strategic investor invests in the issuer within one year

Convertible 1.5:1: if an IPO is successfully completed within 2 years

Convertible 2:1: if a binding agreement for sale of majority stake by equity shareholders is entered into within 3 years

Convertible 3:1: if none of these events occur in 3 years' time.

Examine whether the financial instrument will be classified as equity.

33).

Conversion ratio changes under inter-dependent scenarios

On 1 January 2011, RHT Ltd. subscribes to convertible preference shares of RDT Ltd.

The preference shares are convertible as below:

Convertible 1:1 if another strategic investor invests at an enterprise valuation (EV) of USD 100 million.

Convertible 1.5:1: if another strategic investor invests at EV of USD 150 million

Convertible 2:1: if another strategic investor invests at EV of USD 200 million

Convertible 3:1: if no strategic investment is made within a period of 3 years

Examine the nature of the financial instrument.

34).

Redeemable debentures with discretionary dividend

X Co. Ltd. (issuer) issues debentures to Y Co. Ltd. (holder). Those debentures are redeemable at the end of 10 years from the date of issue. Interest of 15% p.a. is payable at the discretion of the issuer. The rate of interest is commensurate with the credit risk profile of the issuer. Examine the nature of the financial instrument.

35).

Perpetual loan with mandatory interest

P Co. Ltd. (issuer) takes a loan from Q Co. Ltd. (holder). The loan is perpetual and entitles the holder to fixed interest of 8% p.a. Examine the nature of the financial instrument.

36).

Optionally convertible redeemable preference shares

D Ltd. issues preference shares to G Ltd. The holder has an option to convert these preference shares to equity instruments of the issuer anytime up to a period of 10 years. If the option is not exercised by the holder, the preference shares are redeemed at the end of 10 years. Examine the nature of the financial instrument.

37).

Determining fair value upon initial measurement

The shareholders of Company C provide C with financing in the form of loan notes to enable it to acquire investments in subsidiaries. The loan notes will be redeemed solely out of dividends received from these subsidiaries and become redeemable only when C has sufficient funds to do so. In this context, 'sufficient funds' refers only to dividend receipts from subsidiaries. Analyse the initial measurement of loan notes.

38).

Silver Ltd. has purchased 100 ounces of gold on 10 March 2011. The transaction provides for a price payable which is equal to market value of 100 ounces of gold on 10 April 2011 and shall be settled by issue of such number of equity shares as is required to settle the aforementioned transaction price at ₹10 per share on 10 April 2011. Whether this is classified as liability or equity? Own use exemption does not apply.

BUSINESS MODEL TEST AND CONTRACTUAL CASH FLOW CHARACTERISTIC TEST

1).

Instrument D is loan with full recourse and is secured by collateral. Does the collateral affect the nature of contractual cash flows?

2).

An entity holds investments to collect their contractual cash flows. The funding needs of the entity are predictable and the maturity of its financial assets is matched to the entity's estimated funding needs.

The entity performs credit risk management activities with the objective of minimising credit losses. In the past, sales have typically occurred when the financial assets' credit risk has increased such that the assets no longer meet the credit criteria specified in the entity's documented investment policy. In addition, infrequent sales have occurred as a result of unanticipated funding needs.

Reports to key management personnel focus on the credit quality of the financial assets and the contractual return. The entity also monitors fair values of the financial assets, among other information.

Evaluate the business model.

3).

An entity's business model is to purchase portfolios of financial assets, such as loans. Those portfolios may or may not include financial assets that are credit impaired.

If payment on the loans is not made on a timely basis, the entity attempts to realise the contractual cash flows through various means—for example, by contacting the debtor by mail, telephone or other methods. The entity's objective is to collect the contractual cash flows and the entity does not manage any of the loans in this portfolio with an objective of realising cash flows by selling them.

In some cases, the entity enters into interest rate swaps to change the interest rate on particular financial assets in a portfolio from a floating interest rate to a fixed interest rate.

Evaluate the business model.

4).

Entity B sells goods to customers on credit. Entity B typically offers customers up to 60 days following the delivery of goods to make payment in full. Entity B collects cash in accordance with the contractual cash flows of trade receivables and has no intention to dispose of the receivables.

Evaluate the business model.

5).

An entity anticipates capital expenditure in a few years. The entity invests its excess cash in short and long-term financial assets so that it can fund the expenditure when the need arises. Many of the financial assets have contractual lives that exceed the entity's anticipated investment period.

The entity will hold financial assets to collect the contractual cash flows and, when an opportunity arises, it will sell financial assets to re-invest the cash in financial assets with a higher return. The managers responsible for the portfolio are remunerated based on the overall return generated by the portfolio.

Evaluate the business model.

6).

An entity has a business model with the objective of originating loans to customers and subsequently selling those loans to a securitisation vehicle. The securitisation vehicle issues instruments to investors. The originating entity controls the securitisation vehicle and thus consolidates it.

The securitisation vehicle collects the contractual cash flows from the loans and passes them on to its investors. In the consolidated balance sheet, loans continue to be recognised because they are not derecognised by the securitisation vehicle.

Evaluate the business model.

7).

A financial institution holds financial assets to meet liquidity needs in a 'stress case' scenario (eg, a run on the bank's deposits). The entity does not anticipate selling these assets except in such scenarios. The entity monitors the credit quality of the financial assets and its objective in managing the financial assets is to collect the contractual cash flows. The entity evaluates the performance of the assets on the basis of interest revenue earned and credit losses realised.

However, the entity also monitors the fair value of the financial assets from a liquidity perspective to ensure that the cash amount that would be realised if the entity needed to sell the assets in a stress case scenario would be sufficient to meet the entity's liquidity needs. Periodically, the entity makes sales that are insignificant in value to demonstrate liquidity.

Evaluate the business model.

8).

Instrument A is a bond with a stated maturity date. Payments of principal and interest on the principal amount outstanding are linked to an inflation index of the currency in which the instrument is issued. The inflation link is not leveraged and the principal is protected.

Evaluate the Contractual cash flows characteristics test

9).

Instrument H is a perpetual instrument but the issuer may call the instrument at any point and pay the holder the par amount plus accrued interest due.

Instrument H pays a market interest rate but payment of interest cannot be made unless the issuer is able to remain solvent immediately afterwards. Deferred interest does not accrue additional interest. Analyse the nature of cash flows.

10).

Instrument G is a loan that pays an inverse floating interest rate (i.e. the interest rate has an inverse relationship to market interest rates). Analyze the nature of cash flows.

DERECOGNITION PRINCIPLES

1).

Part of a financial asset

State whether the derecognition principles will be applied or not.

- i. Interest strip of an interest-bearing financial asset i.e. the part entitles its holder to interest cash flows of a financial asset
- ii. Dividend strip of an equity share i.e. the part entitles its holder to only dividends arising from an equity share
- iii. Cash flows (principal and asset) upto a certain tenure or first right on a proportion of cash flows of an amortising financial asset. Say, the part entitles its holder to first 80% of the cash flows or cash flows for first 4 of the 6 years' tenure.

2).

Part of a financial asset

State whether the de-recognition principles will be applied or not.

- i. Entity Y transfers the rights to the first or the last 90 per cent of cash collections from a financial asset (or a group of financial assets)
- ii. Entity Z transfers the rights to 90 per cent of the cash flows from a group of receivables, but provides a guarantee to compensate the buyer for any credit losses up to 8 per cent of the principal amount of the receivables.

3).

Repurchase agreements

A financial asset is sold under repurchase agreement. The repurchase price as per that agreement is (a) fixed price or (b) sale price plus a lender's return. Let's look at three alternate scenarios:

- i. Repurchase agreement is for the same financial asset.
- ii. Repurchase agreement is for substantially the same asset
- iii. Repurchase agreement provides the transferee a right to substitute assets that are similar and of equal fair value to the transferred asset at the repurchase date.

State whether the derecognition principles will be applied or not.

4).

Put options on transferred financial assets

A financial asset is sold and the transferee has a put option. Let's look at some alternate scenarios:

- i. Put option is deeply in the money
- ii. Put option is deeply out of the money.

State whether the derecognition principles will be applied or not.

5).

Call options on transferred financial assets

A financial asset is sold and the transferor has a call option. Let's look at some alternate scenarios:

- i. Call option is deeply in the money
- ii. Call option is deeply out of the money.

What if the transferor holds a call option on an asset that is readily obtainable in the market?

- iii. Call option is neither deeply in the money nor deeply out of the money. State whether the derecognition principles will be applied or not.

6).

Amortising interest rate swaps (Not required to solve)

An entity may transfer to a transferee a fixed rate financial asset that is paid off over time, and enter into an amortising interest rate swap with the transferee to receive a fixed interest rate and pay a variable interest rate based on a notional amount.

Scenarios:

- i. Notional amount of the swap amortises so that it equals the principal amount of the transferred financial asset outstanding at any point in time.
- ii. Amortisation of the notional amount of the swap is not linked to the principal amount outstanding of the transferred asset.

State whether the derecognition principles will be applied or not.

7).

Assignment of receivables

ST Ltd. assigns its trade receivables to AT Ltd. The carrying amount of the receivables is ₹10,00,000. The consideration received in exchange of this assignment is ₹9,00,000. Customers have been instructed to deposit the amounts directly in a bank account for the benefit of AT Ltd. AT Ltd. has no recourse to ST Ltd. in case of any shortfalls in collections.

State whether the derecognition principles will be applied or not.

Agrawal
Classes

MIXED BAG

1).

Share swap arrangements

Acquirer Ltd. enters into an arrangement with shareholders of Target Ltd. wherein Acquirer Ltd. will purchase shares of Target Ltd. in a share swap arrangement. The share swap ratio is agreed as 1:5 i.e. 1 equity share of Acquirer Ltd. for every 5 equity shares held in Target Ltd. Examine whether the financial instrument will be classified as equity.

2).

An entity is about to purchase a portfolio of fixed rate assets that will be financed by fixed rate debentures. Both financial assets and financial liabilities are subject to the same interest rate risk that gives rise to opposite changes in fair value that tend to offset each other. Provide your comments.

3).

Regular way contracts: forward contracts

ST Ltd. enters into a forward contract to purchase 10 lakh shares of ABC Ltd. in a month's time for ₹50 per share. This contract is entered into with a broker, Mr. AG and not through regular trading mode in a stock exchange. The contract requires Mr. AG to deliver the shares to ST Ltd. upon payment of agreed consideration. Shares of ABC Ltd. are traded on a stock exchange. Regular way delivery is two days. Assess the forward contract.

4).

Regular way contracts: option contracts

NKT Ltd. purchases a call option in a public market permitting it to purchase 100 shares of VT Ltd. at any time over the next one month at a price of ₹1,000 per share. If NKT Ltd. exercises its option, it has 7 days to settle the transaction according to regulation or convention in the options market. VT Ltd.'s shares are traded in an active public market that requires two-day settlement.

5).

Regular way purchase of financial asset

On 1 January 2011, X Ltd. enters into a contract to purchase a financial asset for ₹10 lakhs, which is its fair value on trade date. On 4 January 2011 (settlement date), the fair value of the asset is ₹10.5 lakhs. The amounts to be recorded for the financial asset will depend on how it is classified and whether trade date or settlement date accounting is used. Pass necessary journal entries.

6).

Prepaid interest rate swap (fixed rate payment obligation prepaid at inception)

Entity S enters into a ₹100 crores notional amount five-year pay-fixed, receive-variable interest rate swap with Counterparty C.

- ◆ The interest rate of the variable part of the swap is reset on a quarterly basis to three month Mumbai Interbank Offer Rate (MIBOR).
- ◆ The interest rate of the fixed part of the swap is 10% p.a.
- ◆ Entity S prepays its fixed obligation under the swap of ₹50 crores ($₹100 \text{ crores} \times 10\% \times 5 \text{ years}$) at inception, discounted using market interest rates
- ◆ Entity S retains the right to receive interest payments on the ₹100 crores reset quarterly based on three-month MIBOR over the life of the swap.

Analyse.

7).

Prepaid pay-variable, receive-fixed interest rate swap

- ◆ Entity S enters into a ₹100 crores notional amount five-year pay-variable, receive-fixed interest rate swap with Counterparty C.
- ◆ The variable leg of the swap is reset on a quarterly basis to three-month MIBOR.
- ◆ The fixed interest payments under the swap are calculated as 10% of the swap's notional amount, i.e. ₹10 crores p.a.
- ◆ Entity S prepays its obligation under the variable leg of the swap at inception at current market rates. Say, that amount is ₹36 crores.
- ◆ It retains the right to receive fixed interest payments of 10% on ₹100 crores every year.

Analyse.

8).

Prepaid forward

Entity XYZ enters into a forward contract to purchase 1 million ordinary shares of Entity T in one year

- ◆ The current market price of T is ₹50 per share
- ◆ The one-year forward price of T is ₹55 per share
- ◆ XYZ is required to prepay the forward contract at inception with a ₹50 million payment.

Analyse.

9).

Debt instrument with indexed repayments

Entity X issues a redeemable fixed interest rate debenture to Entity Y. Amount of interest and principal is indexed to the value of equity instruments of Entity X

Analyse

10).

Debt instrument with prepayment option

Entity PQR borrows ₹100 crores from CFDH Bank on 1 April 2011.

Interest is payable at 12% p.a. and there is a bullet repayment of principal at the end of the term.

Term of the loan is 6 years.

The loan includes an option to prepay the loan at 1st April each year with a prepayment penalty of 3%.

There are no transaction costs.

Without the prepayment option, the interest rate quoted by bank is 11% p.a.

Analyse

11).

Purchase contract settled in a foreign currency

On 1 January 2011, ABG Pvt. Ltd., a company incorporated in India enters into a contract to buy solar panels from A&A Associates, a firm domiciled in UAE, for which delivery is due after 6 months i.e. on 30 June 2011

The purchase price for solar panels is US\$ 50 million.

The functional currency of ABG is Indian Rupees (INR) and of A&A is Dirhams.

The obligation to settle the contract in US Dollars has been evaluated to be an embedded derivative which is not closely related to the host purchase contract.

Exchange rates:

1. Spot rate on 1 January 2011: USD 1 = INR 60
2. Six-month forward rate on 1 January 2011: USD 1 = INR 65
3. Spot rate on 30 June 2011: USD 1 = INR 66

Analyse

12).

Issue of borrowings with fixed rate of interest

A Ltd has made a borrowing from RBC Bank for ₹10,000 at a fixed interest of 12% per annum. Loan processing fees were additionally paid for ₹500 and loan is payable 4 half yearly installments of ₹2,500 each. Details are as follows:

Particulars	Details
Loan amount	₹10,000
Date of loan (Starting Date)	1-Apr-2011
Date of loan (Finishing Date)	31-March-2012
Description of repayment	Repayment of loan starts from 30-Sept-2011 (To be paid half yearly)
Installment amount	₹2,500
Interest rate	12.00%
Interest charge	Interest to be charged quarterly
Upfront fees	₹500
IRR	16.6%

How would loan be accounted in books of A Ltd?

13).

Perpetual debt instruments

A Ltd. issues a bond at principal amount of CU 1000 per bond. The terms of bond require annual payments in perpetuity at a stated interest rate of 8 per cent applied to the principal amount of CU 1000. Assuming 8 per cent to be the market rate of interest for the instrument when it was issued, the issuer assumes a contractual obligation to make a stream of future interest payments having a fair value (present value) of CU1,000 on initial recognition. Evaluate the financial instrument in the hands of both the holder and the issuer.

PRACTICAL SUMS

1).

Contract for exchange on unfavorable conditions

A Ltd. (the 'Company') makes a borrowing for ₹10 lacs from RBC Bank, with annual installments of ₹10 lacs and an annual interest rate of 12% per annum. Now, Company defaults at the end of 5th year and consequently, a rescheduling of the payment schedule is made beginning 6th year onwards. The Company is required to pay ₹1,300,000 at the end of 6th year for one time settlement, in lieu of defaults in payments made earlier.

- (a) Does the above instrument meet definition of financial liability? Please explain.
- (b) Analyse the differential amount to be exchanged for one-time settlement.

2).

Written put option on own equity instruments

On 1st January 2011, Entity X writes a put option over 1,00,000 of its own equity shares for which it receives a premium of ₹5,00,000.

Under the terms of the option, Entity X may be obliged to take delivery of 1,00,000 of its own shares in one year's time and to pay the option exercise price of ₹22,000,000. The option can only be settled through physical delivery of the shares (gross physical settlement). Examine the nature of the financial instrument.

3).

Written put option over non-controlling interests

Parent P holds a 70% controlling interest in Subsidiary S. The remaining 30% is held by Entity Z. On 1st January 2011, P writes an option to Z which grants Z the right to sell its shares to Parent P on 31st December 2012 for ₹1,000. Parent P receives a payment of ₹100 for the option. The applicable discount rate for the put liability is determined to be 12%. State by which amount the financial instrument will be recognised and under which category.

4).

Optionally convertible redeemable preference shares

On 1st July 2011, D Ltd. issues preference shares to G Ltd. for a consideration of ₹10 lakhs. The holder has an option to convert these preference shares to a fixed number of equity instruments of the issuer anytime up to a period of 3 years. If the option is not exercised by the holder, the preference shares are redeemed at the end of 3 years. The preference shares carry a fixed coupon of 6% p.a. The prevailing market rate for similar preference shares, without the conversion feature, is 9% p.a.

Calculate the value of the liability and equity components.

5).

Optionally convertible debentures with issuer's redemption option

D Ltd. issues preference shares to G Ltd. for a consideration of ₹ 10 lakhs. The holder has an option to convert these preference shares to a fixed number of equity instruments of the issuer anytime up to a period of 3 years. If the option is not exercised by the holder, the preference shares are redeemed at the end of 3 years. The preference shares carry a coupon of RBI base rate plus 1% p.a.

The prevailing market rate for similar preference shares, without the conversion feature or issuer's redemption option, is RBI base rate plus 4% p.a. On the date of contract, RBI base rate is 9% p.a.

Calculate the value of the liability and equity components.

6).

Optionally convertible redeemable preference shares

The amortisation schedule of the instrument is set out below:

Dates	Cash flows	Finance cost at effective interest rate	Liability	Equity
1 July 2011	1,000,000	-	9,24,061	75,939
30 June 2012	(60,000)	83,165	9,47,226	75,939
30 June 2013	(60,000)	85,250	9,72,476	75,939
30 June 2014	(10,60,000)	87,524	-	75,939

Assume that D Ltd. has an early redemption option to prepay the instrument at ₹11 lakhs and on 30th June 2013, it exercises that option. At 30th June 2013, the interest rate has changed. At that time, D Ltd. could have issued a one-year (i.e. maturity 30th June 2014) non-convertible instrument at 5%.

Calculate the value of the liability and equity components.

7).

Loans with processing fee:

ABC Bank gave loans to a customer – Target Ltd. that carry fixed interest rate @ 10% per annum for a 5 year term and 12% per annum for a 3 year term. Additionally, the bank charges processing fees @ 1% of the principal amount borrowed. Target Ltd borrowed loans as follows:

- ₹10 lacs for a term of 5 years
- ₹8 lacs for a term of 3 years.

Compute the fair value upon initial recognition of the loan in books of Target Ltd. and how will loan processing fee be accounted?

8).

Deposits carrying off-market rate of interest:

Containers Ltd provides containers for use by customers for multiple purposes. The containers are returnable at the end of the service contract period (3 years) between Containers Ltd and its customers. In addition to the monthly charge, there is a security deposit that each customer makes with Containers Ltd for ₹10,000 per container and such deposit is refundable when the service contract terminates. Deposits do not carry any interest. Analyse the fair value upon initial recognition in books of customers leasing containers. Market rate of interest for 3 year loan is 7% per annum.

9).

Accounting for transaction costs on initial and subsequent measurement of a financial asset measured at fair value with changes through other comprehensive income:

An entity acquires a financial asset for CU100 plus a purchase commission of CU2. Initially, the entity recognises the asset at CU102. The reporting period ends one day later, when the quoted market price of the asset is CU100. If the asset were sold, a commission of CU3 would be paid. How would transaction costs be accounted in books of the entity?

10).

Use of cost v/s fair value determination for equity instruments

Silver Ltd. has made an investment in optionally convertible preference shares (OCPS) of a Company – Bronze Ltd. at ₹100 per share (face value ₹100 per share). Silver Ltd. has an option to convert these OCPS into equity shares in the ratio of 1:1 and if such option not exercised till end of 9 years, then the shares shall be redeemable at the end of 10 years at a premium of 20%.

Analyse the measurement of this investment in books of Silver Ltd.

11).

Accounting for assets at amortised cost

A Ltd has made a security deposit whose details are described below. Make necessary journal entries for accounting of the deposit. Assume market interest rate for a deposit for similar period to be 12% per annum.

Particulars	Details
Date of Security Deposit (Starting Date)	1-Apr-2011
Date of Security Deposit (Finishing Date)	31-Mar-2016
Description	Lease
Total Lease Period (Years)	5
Discount rate	12.00%
Security deposit (A)	10,00,000
Present value of deposit at beginning (B)	5,67,427
Prepaid lease payment at beginning (A-B)	4,32,573
Present value annuity factor	0.56743

12).

Accounting for assets at FVTPL

A Ltd. invested in equity shares of C Ltd. on 15th March for ₹10,000. Transaction costs were ₹500 in addition to the basic cost of ₹10,000. On 31 March, the fair value of the equity shares was ₹11,200 and market rate of interest is 10% per annum for a 10 year loan. Pass necessary journal entries. Analyse the measurement principal and pass necessary journal entries.

13).

Accounting for assets at FVOCI

Metallics Ltd. has made an investment in equity instrument of a company – Castor Ltd. for 19% equity stake. Significant influence not exercised. The investment was made for ₹5,00,000 for 10,000 equity shares on 01 April 2011. On 30 June 2011 the fair value per equity share is ₹45. The Company has taken an irrevocable option to measure such investment at fair value through other comprehensive income.

14).

Trade creditors at market terms

A Company purchases its raw materials from a vendor at a fixed price of ₹1,000 per tonne of steel. The payment terms provide for 45 days of credit period, after which an interest of 18% per annum shall be charged. How would the creditors be classified in books of the Company?

15).

Issue of variable number of shares against issue of CCPS

A Ltd. issued compulsorily convertible preference shares (CCPS) at ₹100 each (₹10 face value + ₹90 premium per share) for ₹10,00,000. These are convertible into equity shares at the end of 10 years, where the number of equity shares to be issued shall be determined based on fair value per equity share to be determined at the time of conversion.

Evaluate if this is financial liability or equity? What if the conversion ratio was fixed at the time of issue of such preference shares?

16).

Proportionate “pass through” arrangement

Entity A makes a five-year interest-bearing loan (the 'original asset') of ₹100 crores to Entity B. Entity A settles a Trust and transfers the loan to that Trust. The Trust issues participatory notes to an investor, Entity C, that entitle the investor to the cash flows from the asset.

As per Trust’s agreement with Entity C, in exchange for a cash payment of ₹90 crores, Trust will pass to Entity C 90% of all principal and interest payments collected from Entity B (as, when and if collected). Trust accepts no obligation to make any payments to Entity C other than 90% of exactly what has been received from Entity B. Trust provides no guarantee to Entity C about the performance of the loan and has no rights to retain 90% of the cash collected from Entity B nor any obligation to pay cash to Entity C if cash has not been received from Entity B.

Compute the amount to be derecognised.

17).

(a) Debt factoring with recourse – continuing involvement asset

Entity C agrees with factoring company D to enter into a debt factoring arrangement. Under the terms of the arrangement, the factoring company B agrees to pay ₹91.5 crores, less a servicing charge of ₹1.5 crores (net proceeds of ₹90 crores), in exchange for 100% of the cash flows from short-term receivables.

The receivables have a face value of ₹100 crores and carrying amount of ₹95 crores.

The customers will be instructed to pay the amounts owed into a bank account of the factoring company. Entity C also writes a guarantee to the factoring company under which it will reimburse any credit losses upto ₹5 crores, over and above the expected credit losses of ₹5 crores and losses of up to ₹15 crores are considered reasonably possible. The guarantee is estimated to have a fair value of ₹0.5 crores. Comment.

(b) Debt factoring with recourse – associated liability

Continuing illustration 17(a), the associated liability is recognised at ₹ 5.5 crores, as below:

- i. the guarantee amount (i.e. ₹ 5 crores) plus
- ii. the fair value of the guarantee (i.e. ₹ 0.5 crores). Comment

(c) Debt factoring with recourse – gain or loss on derecognition

Pass the necessary Journal Entry

18).

A Ltd issued redeemable preference shares to a Holding Company – Z Ltd. The terms of the instrument have been summarized below. Account for this in the books of Z Ltd.

Nature	Non-cumulative redeemable preference shares
Repayment:	Redeemable after 5 years
Date of Allotment:	1-Apr-2011
Date of repayment:	31-Mar-2016
Total period:	5.00 years
Value of preference shares issued:	100,000,000
Dividend rate	0.0001%
Market rate of interest	12.00% per annum
Present value factor	0.56743

19).

A Limited issues INR 1 crore convertible bonds on 1st July 2011. The bonds have a life of eight years and a face value of INR 10 each, and they offer interest, payable at the end of each financial year, at a rate of 6 per cent annum. The bonds are issued at their face value and each bond can be converted into one ordinary share in A Limited at any time in the next eight years. Companies of a similar risk profile have recently issued debt with similar terms, without the option for conversion, at a rate of 8 per cent per annum.

Required:

- Identify the present value of the bonds, and, allocating the difference between the present value and the issue price to the equity component, provide the appropriate accounting entries.
- Calculate the stream of interest expenses across the eight years of the life of the bonds.
- Provide the accounting entries if the holders of the option elect to convert the options to ordinary shares at the end of the third year.

20).

On 1st January 2011, SamCo. Ltd. agreed to purchase USD (\$) 20,000 from JT Bank in future on 31st December 2011 for a rate equal to ₹68 per USD. SamCo. Ltd. did not pay any amount upon entering into the contract. SamCo Ltd. is a listed company in India and prepares its financial statements on a quarterly basis.

Following the principles of recognition and measurement as laid down in Ind AS 109, you are required to record the entries for each quarter ended till the date of actual purchase of USD.

For the purposes of accounting, please use the following information representing marked to market fair value of forward contracts at each reporting date:

As at 31 st March 2011 –	₹ (25,000)
As at 30 th June 2011 -	₹ (15,000)
As at 30 th September 2011 -	₹ 12,000
Spot rate of USD on 31 st December 2011 -	₹ 66 per USD

21).

Entity A (an INR functional currency entity) enters into a USD 1,000,000 sale contract on 1st January 2011 with Entity B (an INR functional currency entity) to sell equipment on 30 June 2011.

Spot rate on 1 st January 2011: INR/USD	45
Spot rate on 31 st March 2011: INR/USD	57
Three month forward rate on 31 st March 2011: INR/USD	45
Six month forward rate on 1 st January 2011: INR/USD	55
Spot rate on 30 th June 2011: INR/USD	60

Let's assume that this contract has an embedded derivative that is not closely related and requires separation. Please provide detailed journal entries in the books of Entity A for accounting of such embedded derivative until sale is actually made.

22).

On 1st January 2011, SamCo. Ltd. entered into a written put option for USD (\$) 20,000 with JT Corp to be settled in future on 31st December 2011 for a rate equal to ₹68 per USD at the option of JT Corp. SamCo. Ltd. did not receive any amount upon entering into the contract. SamCo Ltd. is a listed company in India and prepares its financial statements on a quarterly basis.

Following the classification principles of recognition and measurement as laid down in Ind AS 109, you are required to record the entries for each quarter ended till the date of actual purchase of USD.

For the purposes of accounting, please use the following information representing marked to market fair value of put option contracts at each reporting date:

As at 31 st March 2011 –	₹(25,000)
As at 30 th June 2011 -	₹(15,000)
As at 30 th September 2011 -	₹NIL
Spot rate of USD on 31 st December 2011 -	₹66 per USD

23).

ABC Company issued 10,000 compulsory cumulative convertible preference shares (CCCPS) as on 1st April 2011 @ ₹150 each. The rate of dividend is 10% payable every year. The preference shares are convertible into 5,000 equity shares of the company at the end of 5th year from the date of allotment. When the CCCPS are issued, the prevailing market interest rate for similar debt without conversion options is 15% per annum. Transaction cost on the date of issuance is 2% of the value of the proceeds.

Key terms:

Date of Allotment	01-Apr-2011
Date of Conversion	01-Apr-2016
Number of Preference Shares	10,000
Face Value of Preference Shares	150
Total Proceeds	15,00,000
Rate Of dividend	10%
Market Rate for Similar Instrument	15%
Transaction Cost	30,000
Face value of equity share after conversion	10
Number of equity shares to be issued	5,000

24).

On 1st April 2011, an 8% convertible loan with a nominal value of ₹6,00,000 was issued at par. It is redeemable on 31st March 2015 also at par. Alternatively, it may be converted into equity shares on the basis of 100 new shares for each ₹ 200 worth of loan.

An equivalent loan without the conversion option would have carried interest at 10%.

Present value rates are as follows:

Year End	@ 8%	@ 10%
1	0.93	0.91
2	0.86	0.83
3	0.79	0.75
4	0.73	0.68

How will the Company present the above loan notes in the financial statements for the year ended 31st March 2012?

25).

Wheel Co. Limited borrowed ₹500,000,000 from a bank on 1st January 2011. The original terms of the loan were as follows:

- Interest rate: 11%
- Repayment of principal in 5 equal installments
- Payment of interest annually on accrual basis
- Upfront processing fee: ₹ 5,870,096

Effective interest rate on loan: 11.50%

On 31st December 2012, Wheel Co. Limited approached the bank citing liquidity issues in meeting the cash flows required for immediate installments and re-negotiated the terms of the loan with banks as follows:

- Interest rate 15%
- Repayment of outstanding principal in 10 equal installments starting 31st December 2013
- Payment of interest on an annual basis

Record journal entries in the books of Wheel Co. Limited till 31st December 2013, after giving effect of the changes in the terms of the loan on 31st December 2012

26).

As part of staff welfare measures, Y Co Ltd. has contracted to lend to its employees sums of money at 5% per annum rate of interest. The amounts lent are to be repaid along with the interest in five equal instalments. The market rate of interest is 10% per annum for comparable loans. Y lent ₹1,600,000 to its employees on 1st January 2011.

Following the principles of recognition and measurement as laid down in Ind AS 109, you are required to record the entries for the year ended 31 December 2011, for the transaction and also compute the value of loan initially to be recognised and amortised cost for all subsequent years.

For the purpose of calculation, following discount factors at interest rate of 10% per annum may be adopted –

At the end of year –

Year	Present value factor
1	.909
2	.827
3	.751
4	.683
5	.620

27).

K Ltd. issued 500,000, 6% convertible debentures@ ₹10 each on 01 April 2011. The debentures are due for redemption on 31 March 2015 at a premium of 10%, convertible into equity shares to the extent of 50% and balance to be settled in cash to the debenture holders. The interest rate on equivalent debentures without conversion rights was 10%.

You are required to separate the debt and equity components at the time of issue and show the accounting entries in Company's books at initial recognition. The following present values of Re 1 at 6% and at 10% are provided:

Interest rate	Year 1	Year 2	Year 3	Year 4
6%	0.94	0.89	0.84	0.79
10%	0.91	0.83	0.75	0.68

28).

Wheel Co. Limited has a policy of providing subsidized loans to its employees for the purpose of buying or building houses. Mr. X, who's executive assistant to the CEO of Wheel Co.

Limited, took a loan from the Company on the following terms:

- Principal amount: 1,000,000
- Interest rate: 4% for the first 400,000 and 7% for the next 600,000
- Start date: 1st January 2011
- Tenure: 5 years
- Pre-payment: Full or partial pre-payment at the option of the employee
- The principal amount of loan shall be recovered in 5 equal annual instalments and will be first applied to 7% interest bearing principal
- The accrued interest shall be paid on an annual basis
- Mr. X must remain in service till the term of the loan ends

The market rate of a comparable loan available to Mr. X, is 12% per annum.

Following table shows the contractually expected cash flows from the loan given to Mr. X:

(amount in ₹)					
Date	Outflows	Inflows			Principal outstanding
		Principal	Interest Income 7%	Interest Income 4%	
1-Jan-2011	(1,000,000)				1,000,000
31-Dec-2011		200,000	42,000	16,000	800,000
31-Dec-2012		200,000	28,000	16,000	600,000
31-Dec-2013		200,000	14,000	16,000	400,000
31-Dec-2014		200,000	-	16,000	200,000
31-Dec-2015		200,000	-	8,000	-

Mr. S, pre-pays ₹ 200,000 on 31st December 2012, reducing the outstanding principal as at that date to ₹400,000.

Following table shows the actual cash flows from the loan given to Mr. X, considering the pre-payment event on 31st December 2012:

(amount in ₹)					
Date	Outflows	Inflows			Principal outstanding
		Principal	Interest Income 7%	Interest Income 4%	
1-Jan-2011	(1,000,000)				1,000,000
31-Dec-2011		200,000	42,000	16,000	800,000
31-Dec-2012		400,000	28,000	16,000	600,000
31-Dec-2013		200,000	-	16,000	200,000
31-Dec-2014		200,000	-	8,000	-
31-Dec-2015		-	-	-	-

Record journal entries in the books of Wheel Co. Limited considering the requirements of Ind AS 109.