







- Financial Instruments is one of most complex
   Standards amongst all standards
- Requires three standards comprising of nearly 400 pages to cover the subject
- It is a copy paste of the Financial Instruments under IFRS (even examples are same)



- The Accounting Standards are constituted to bring out real profit or loss of an entity
   The financial engineering in various products are exposed and impact on profit and loss is correctly reflected
- Financial Instruments are complex in nature due to its creation out of fertile minds of financial wizards
- They are common in nature and found everywhere.
- Derivative is one of the most complicated aspect of this Standard



One may find such derivatives in many contracts. For example :

- Sale proceeds determined based on lease rentals
- Lease rentals linked to sales of tenants
- Technical consultancy kicker incentive by way of stock option
- Variable Interest rates in bank loans
- Convertible Preference Shares



IFRS is replacing IAS 39 with a new simplified standard IFRS 9. This is presently in draft exposure form and is expected to be implemented soon. With that it is likely that even our Standard will undergo change.





### Standards under discussion:

Description	Under Indian GAAP	Under IFRS
Financial Instruments – Recognition and Measurement	AS30	IAS 39
Financial Instruments – Presentation	AS31	IAS 32
Financial Instruments – Disclosures	AS32	IFRS 7



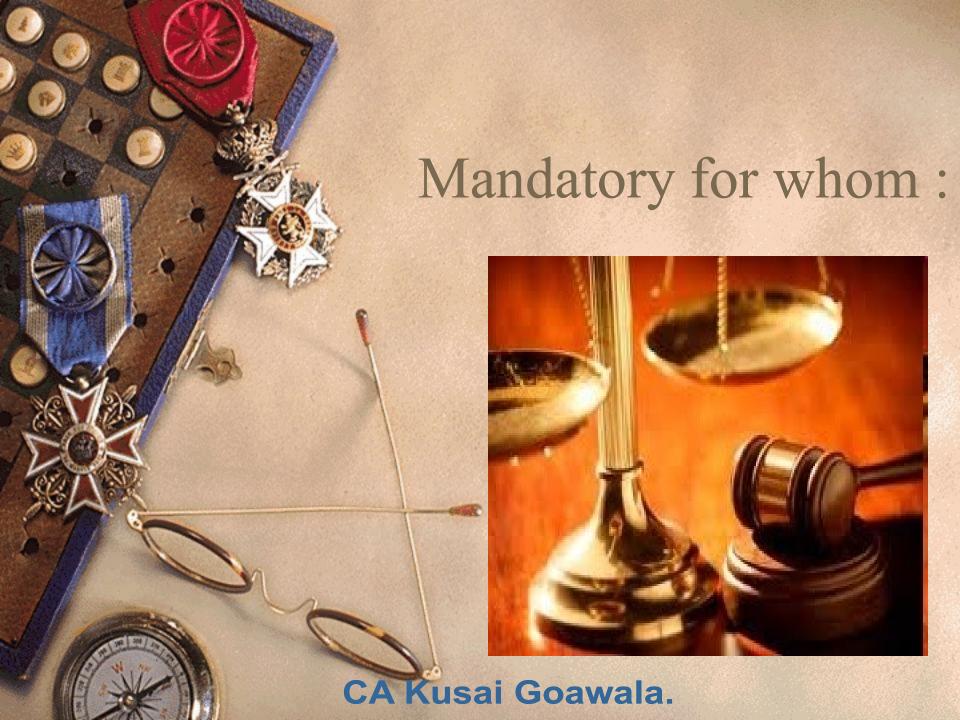


#### Effective from:

 The implementation is covered under original Indian GAAP and not under IFRS.

#### Effective from:

- As recommendatory 1.4.2009
- As mandatory initially planned from 1.4.2011. However, postponed due to changes expected in IFRS.





## Mandatory for whom:

- (a) Entities that are listed or are in process of listing in India or abroad
- (b)Banks
- (c) Financial Institutions
- (d)Insurance Companies
- (e)Entities having turnover of above Rs. 50 cr in preceding year
- (f) Entities having borrowings of above Rs.10 cr at any time during the preceding year
- (g) Subsidiaries or Holding companies of (a) to (f).



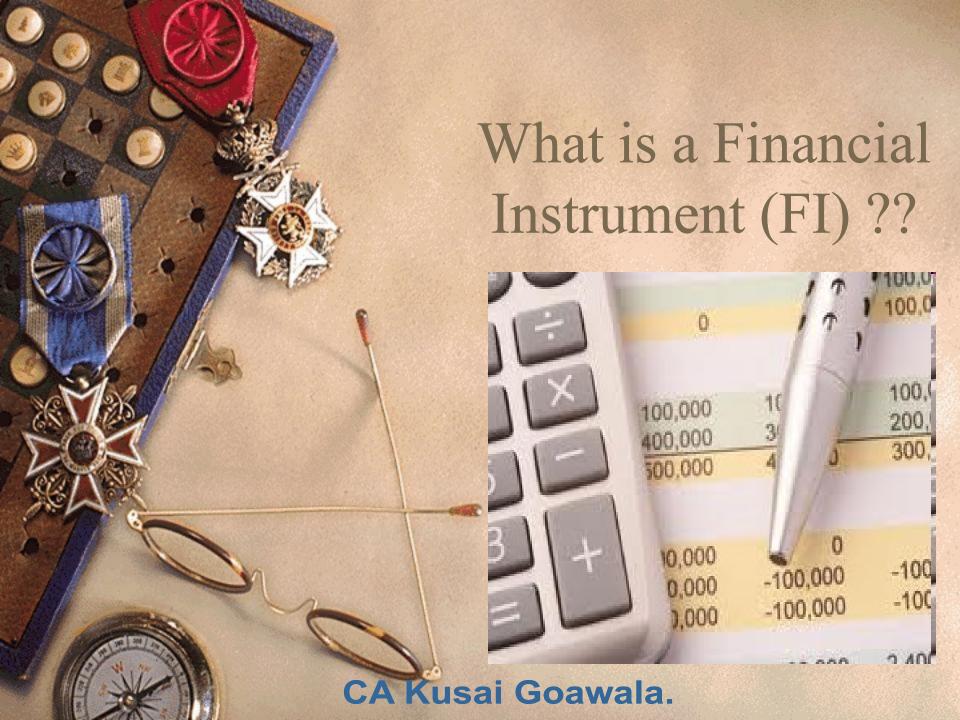
# Other Accounting Standards withdrawn for these entities:

- (a) AS4 Contingencies and Events after balance sheet date in respect of contingencies
- (b) AS11 The Effects of Changes in Foreign Exchange Rates in case of forward exchange contracts
- (c) AS13 except investment properties



- Although following are FA and FL separate standards apply to them:
- 1) Investment in Subsidiaries
- 2) Investment in Joint Ventures
- 3) Investment in Associates
- 4) Tax payments
- 5) Operating Lease rights
- 6) ESOP
- 7) Insurance Contract

(Out of the above, 1, 2 and 3 categories —are covered under AS 21, AS 27 and AS 23 respectively. They are to be tested for impairment.)





## Financial Instrument (FI)

Any contract:

 That creates a Financial Asset (FA) for one entity

And

 Creates Either a Financial Liability (FL) or Equity (E) for other entity

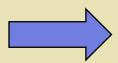


#### Example Financial Instrument (FI)

Entity A

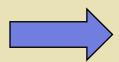
Entity B

Loan Given (FA)



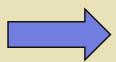
Loan Taken (FL)

Debtor (FA)



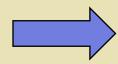
Creditor (FL)

Shares of B (FA)



Equities

Debentures (FA)



Debentures (FL)





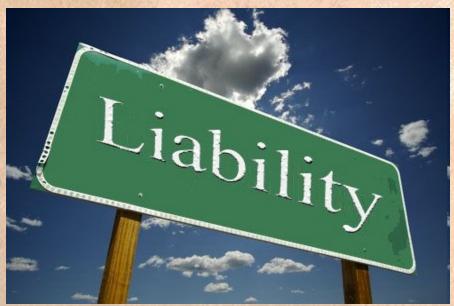
## Financial Asset (FA)

#### Any asset that is:

- (a) Cash
- (b) Equity of another entity
- (c) Right to receive cash or any other FA
- (d) Right to exchange FA or FL
- (e) Derivative



What is a
Financial Liability
(FL) ??





# Financial Liability (FL)

#### Any liability that is:

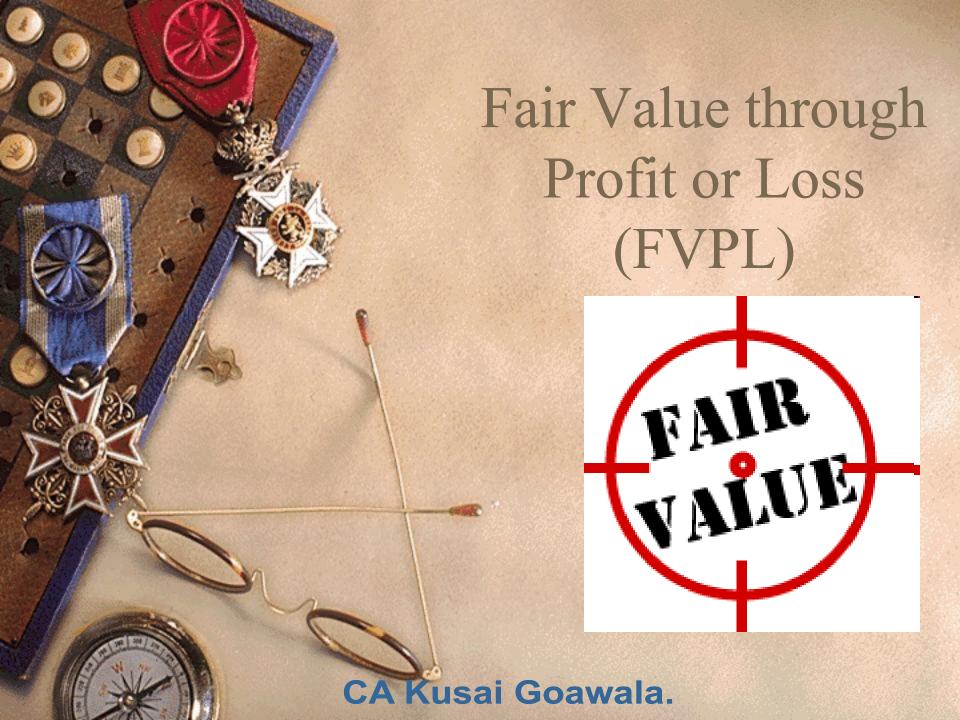
- (a) Contract to deliver cash or any FA of the entity
- (b) Exchange FA or FL with another entity
- (c) Contract to settle by issuing own variable numbers of equity (for e.g. Conversion of a liability to Equity)





#### Classification of FA and FL

- (a) Fair Value through Profit and Loss (FVPL)
- (b) Held to Maturity (HTM)
- (c) Loans and Receivables (LR)
- (d) Available for Sale (AFS)





# Fair Value through Profit or Loss (FVPL)

- (a) FA or FL acquired and held for trading (purchasing and selling in near term)
- (b) Derivatives other than hedge and Financial Guarantee contract

(All Derivatives will be classified under this category only)





# Held to Maturity (HTM)

Includes debt / assets acquired by entity to hold till maturity

- (a) Has positive intention and ability to hold till maturity
- (b) Has fixed maturity date
- (c) Has determinable repayment amount
- (d)Not sold more than insignificant amount of FA before maturity in last two years. (more than insignificant means 5%)



## Held to Maturity

Exception to above intention criteria:

- Sold so close to maturity (less than 3 months) that it has no impact on Fair Value
- After collecting all or substantial payments
- Isolated event

Accordingly, excluding the above three exceptional cases, the FA will be continued as HTM.

Pledge or providing this asset as security does not affect classification.



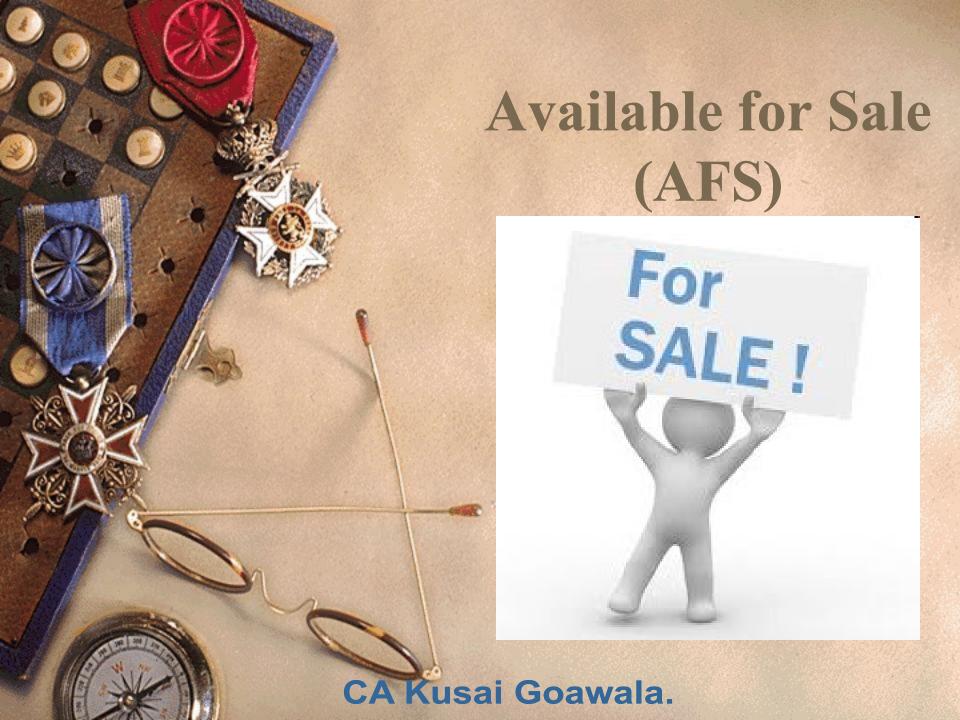
# Loans and Receivables (LR)





# Loans and Receivables: (Not quoted in active market)

- (a) Loans
- (b) Bank Deposits
- (c) Trade Receivables (Sundry Debtors)
- (d) Deposits
- (e) Investment in unquoted debt instruments





#### Available for Sale

- (a) Residual Category
- (b) Does not mean that the entity is ready to sell these FA

#### For example:

Shares of Private Limited Companies





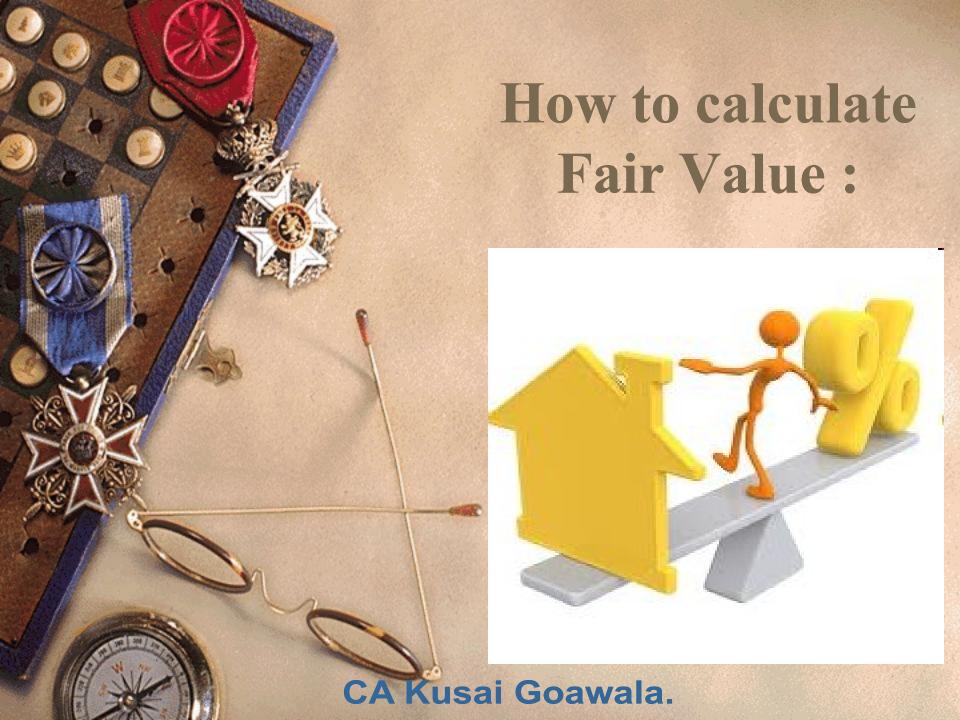
# Treatment in accounts for each of the above classification

	FVPL	HTM	LR	AFS	
Initial Recognition	Fair Value	Fair Value	Fair Value	Fair Value	
++ Unquoted shares				Cost	
++ Short term receivables			Invoice Value		
Subsequent	Fair Value	Amortised Cost	Amortised Cost	Fair Value	
++ Unquoted shares				Cost	



# Treatment in accounts for each of the above classification

	FVPL	HTM	LR	AFS
Difference	P&L	P&L as interest	P&L as interest	Revaluati on Reserve Under Equity
Test for impairment	No	Yes	Yes	Yes
Impairment Loss	NA	P&L	P&L	P&L
Transaction Cost	P&L	FA	FA	Reserve
Reclassification	No	To AFS	No	To HTM





### How to calculate Fair Value:

- (a) Active Market quoted price
- (b) Arm's length price
- (c) Non active market Valuation Techniques
  - i) Discounted Cash Flow Method
  - ii) Similar transactions of similar products
  - iii) Options Model pricing



#### How to calculate Fair Value:

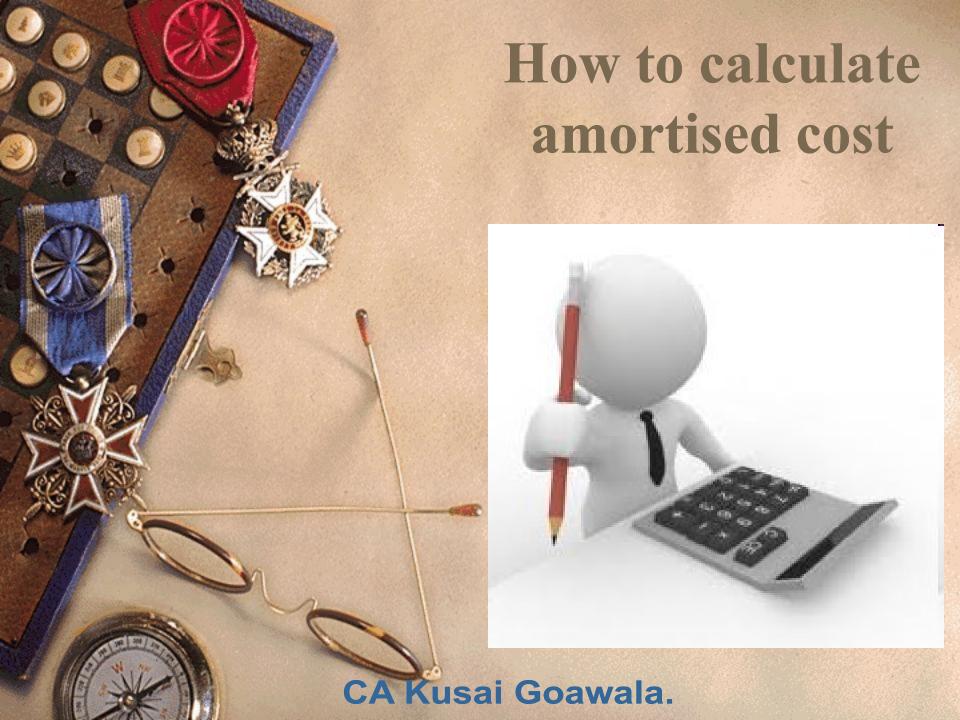
#### Options model pricing:

- Binomial Method
- Black Scholes Model
- Greeks Model (Delta, Gamma, Theta, Vega)
- Cost to carry model



## How to calculate Fair Value:

- Fair value of a loan given can be calculated by applying market rate of interest and discounting the cash flows from the same to the present value.
- This will determine the effective interest loaded in FA.





## How to calculate amortised cost

- The stream of cash flows including interest and other receivables or transaction cost payables from the FA/FL to be calculated in such a way that the net present value of the cash flows reduces to zero.
- The effective interest worked out as above will be carried to profit and loss and the actual interest received/paid will be considered as cash inflow/outflow for the said FA/FL



# What is a Derivative



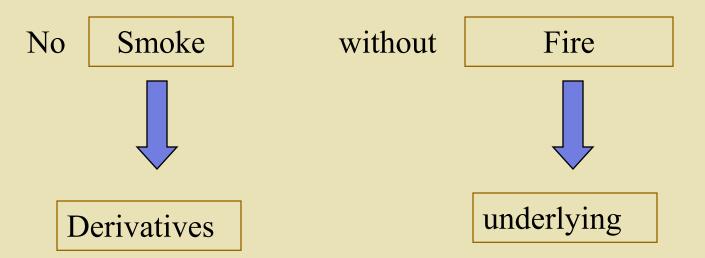


## What is a Derivative

A Financial instrument that meets all the following criteria:

- The fair value of the entire instrument changes with the changes in the value of that underlying asset
- 2) Net investment is zero or negligible compared to the total value
- 3) Settled in future







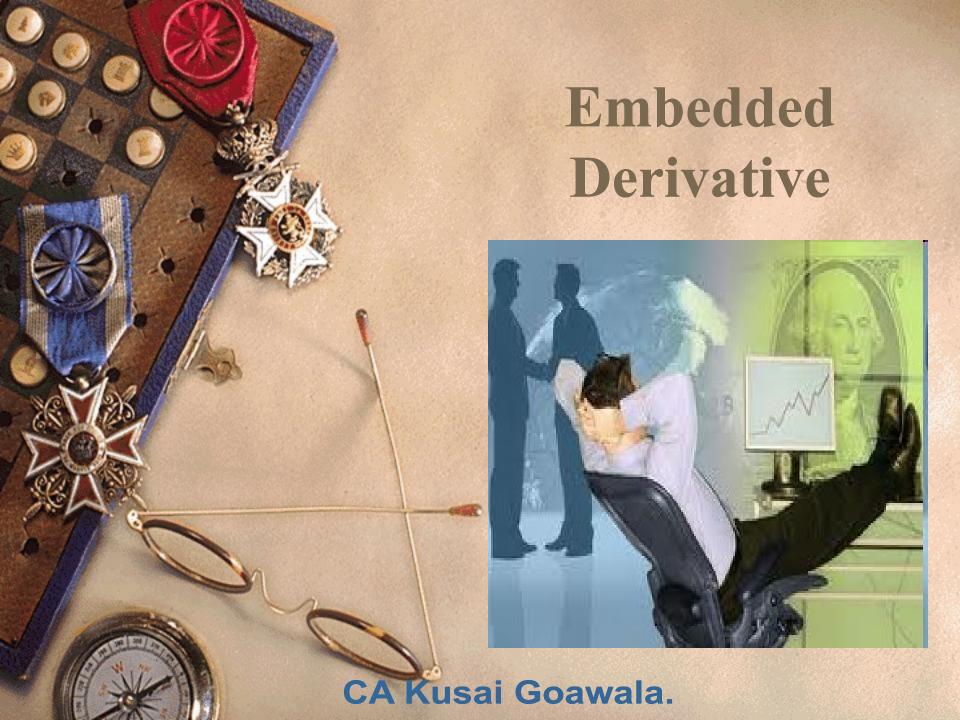
- ◆ Loan sanctioned @ 12% fixed rate —not yet availed
- Market rate goes up to 12.5%
- Embedded Derivative 0.5%



Derivative	Underlying	Mentioned Amount	Settlement Amount
Stock Option	Market Price of Shares	Number of Shares	(MP at settlement – stock price) * No. of Shares
Currency forward	Currency Rate	Number of Currency Units	(Spot rate at settlement – forward rate) * no. of currency units



Derivative	Underlying	Mentioned Amount	Settlement Amount
Interest Rate Swap	Interest Rate Index ( e.g. Receive 5% fixed and pay LIBOR)	No forward Amt. Amount in Currency	(Interest rate index- fixed rate )*amount in currency





# Embedded Derivatives v/s Compound Instruments

To explain in simple terms: any variable component of a contract which can impact the cash flows.



For Holder Embedded Derivatives



For Issuer Compound Instrument



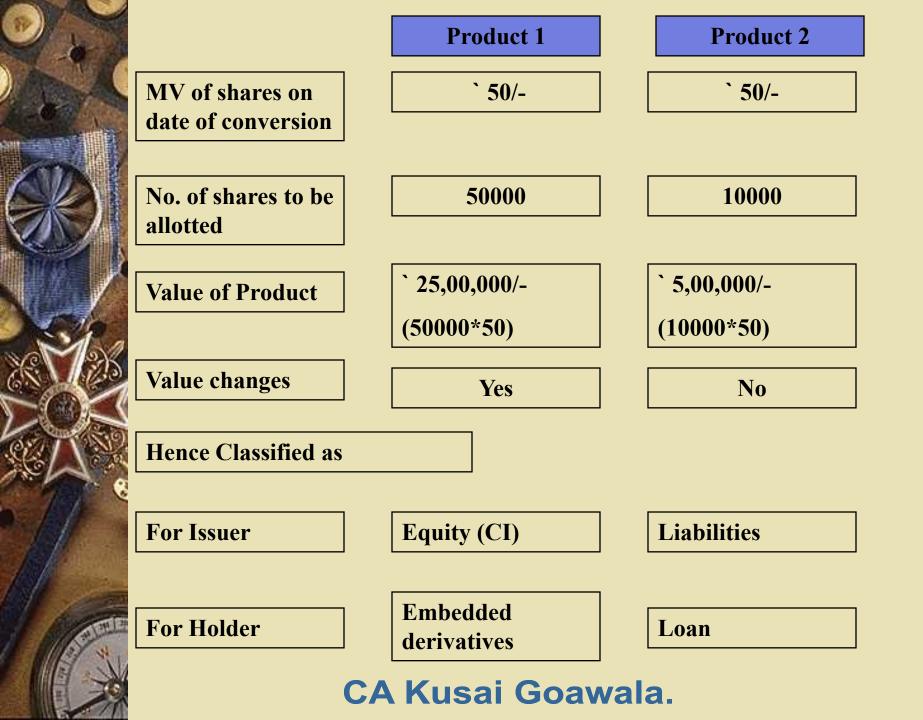
Deliberate Financial Engineering and intentional shifting of certain risks between parties

Causes modification to a contract's cash flow, based on changes in a specified variable.



X Ltd. Invest in following two products of A Ltd.

	Product 1	Product 2
Type	10% Convertible Debentures	10% Convertible Debentures
Numbers - Debentures	50000 @ ` 10/-	50000 @ ` 10/-
Conversion	1 equity share for each debentures	Such numbers of equity shares work out based on price on date of conversion
Amount Invested	` 5,00,000/-	` 5,00,000/-
Conversion Period	2 Yrs	2 Yrs





## Embedded Derivative:

- (a) Host agreement could be financial as well non financial instrument.
- (b) Derivative component

**Derivative Component:** 

- (a) Closely related (CR)
- (b) Not closely related (NCR)

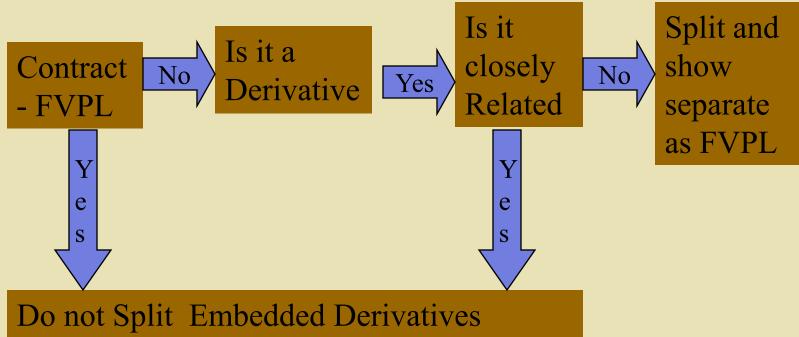


## Embedded Derivative:

- (a) If the entire FI is covered under FVPL, then it need not be separated irrespective whether CR or NCR.
- (b) If Derivative component is closely related no need to separate – account with the host component
- (c) If Derivative is NCR, then account the same separately at FV.
- (d) If Value of a Derivative cannot be computed, directly apply FV of total contract – FV of host contract



## **Embedded Derivative**

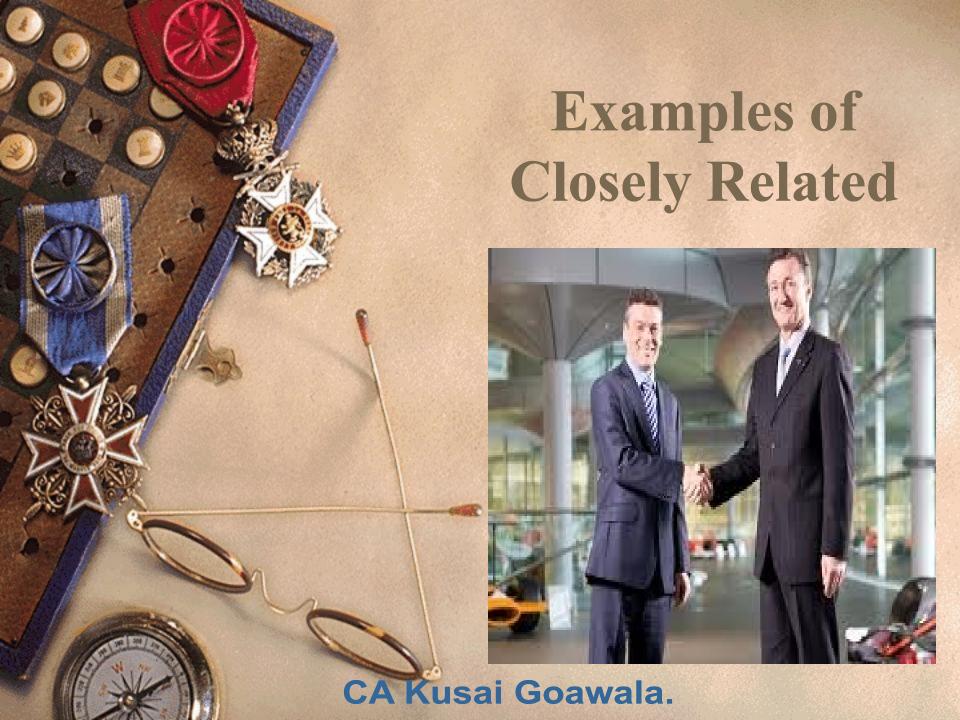




## Embedded Derivative

- Loan fixed rate contracts with an option to borrow, to repay the loan any time it chooses
- Embedded Derivatives

Embedded Derivative can be in Debtor /Equity Investments / lease / Normal Sale / Purchase / Service Agreements / Loan Agreements



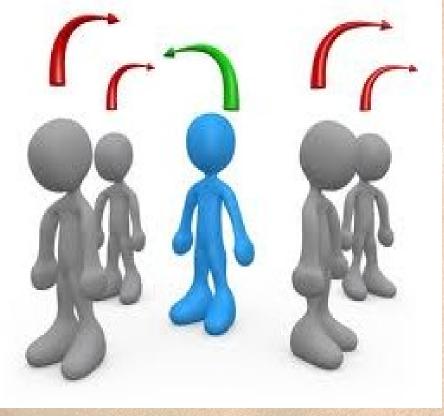


# Examples of Closely Related:

- Interest rate swap in a debt instrument
- Inflation indexed lease contracts
- Cap and floor in a sales and purchase agreements
- Forward forex contracts that are designated in either party's reporting currency
- Dual Currency Bonds
- Foreign Currency denominated debt



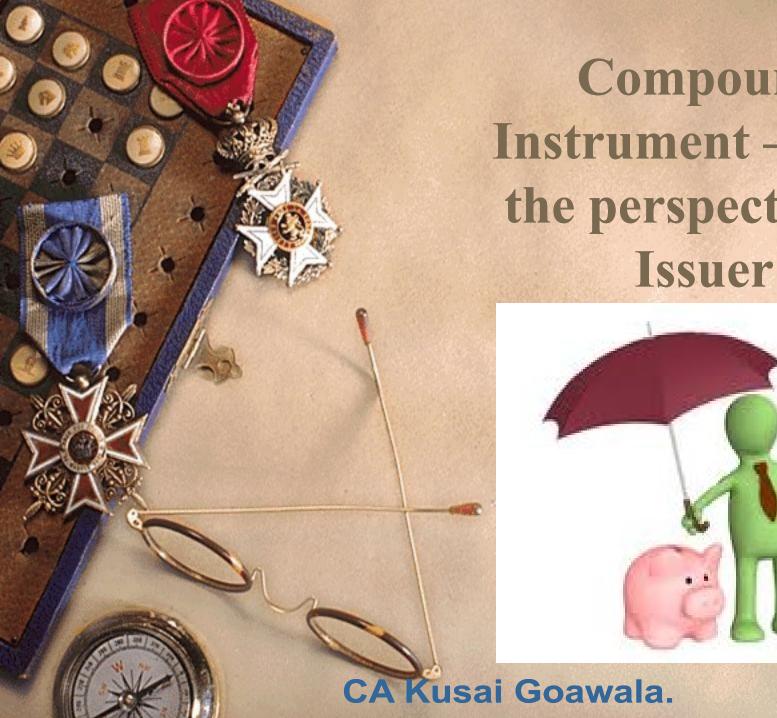
# **Not Closely** Related





# **Not Closely related:**

- Equity conversion option in Debt instrument
- Debt with interest or principal linked to equity or commodity index
- Sale or purchases in currency other than the currency of either party or commonly used currency



Compound Instrument – from the perspective of





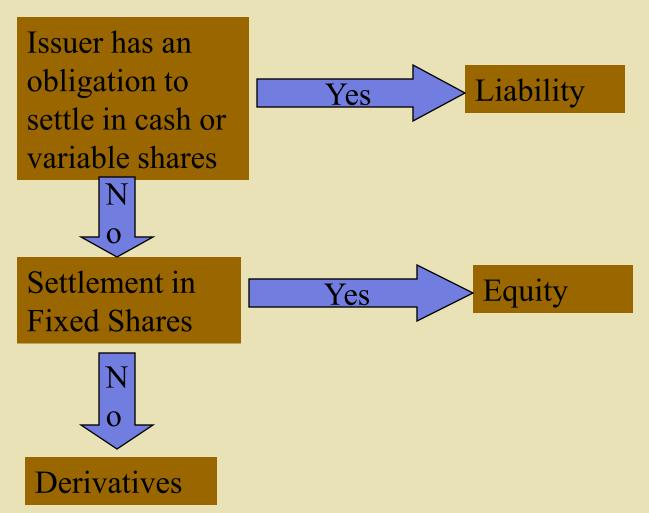
# Compound Instrument – from the perspective of Issuer

First identify whether:

- Liability
- Compound



# Equity or Liability Table





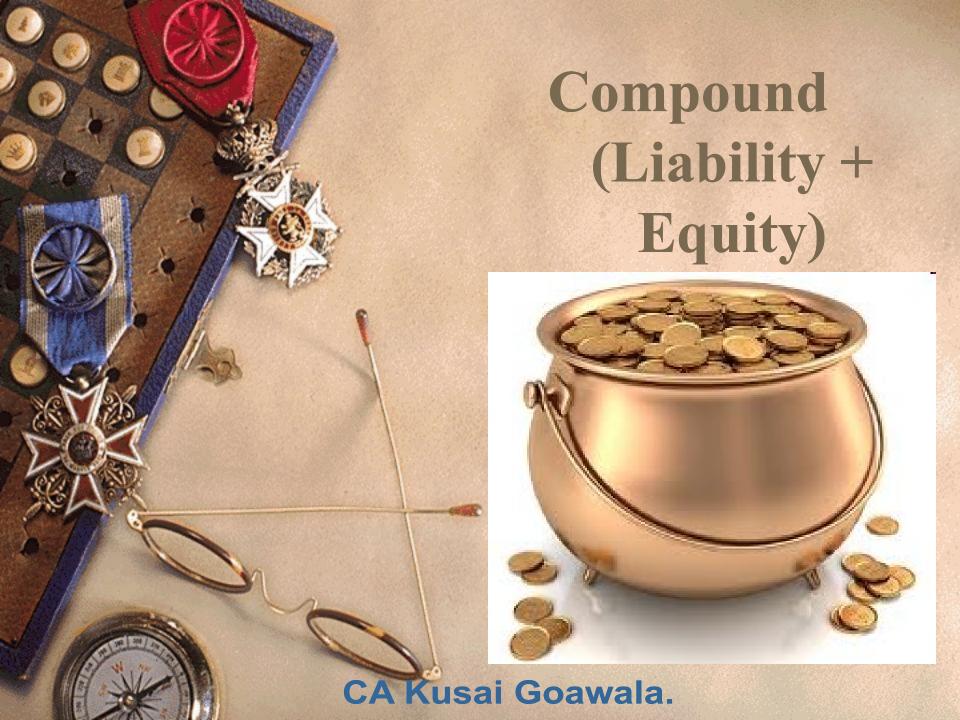


# Pure Liability:

Settlement by paying cash or issuing another FA

#### Examples:

- o Loans
- o Compulsorily redeemable Debentures
- o Compulsorily redeemable Preference Shares
- Option to the issuer to issue variable number of its shares



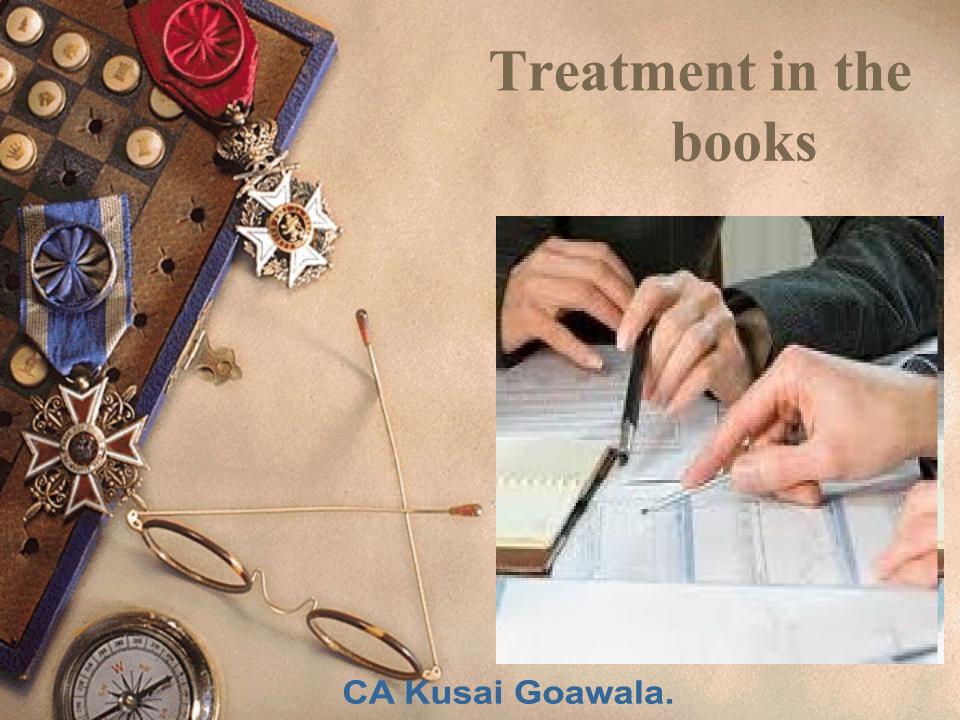


# Compound (Liability + Equity)

 The instrument provides for conversion option with fixed number of its shares for a fixed amount.

#### **Examples:**

o Convertible Debentures/Preference Shares with fixed number of shares





#### Treatment in the books of Issuer:

- (a) Split Equity and Liability by first working out PV of the cash flows discounted on market rate of Interest applicable to similar instruments without conversion options.
- (b) The remaining portion to be classified as equity



#### Treatment in the books of Holder:

- (a) If the entire instrument is classified as FVPL, then do not split
- (b) If not, then check whether the embedded derivative is closely related to the host or not
- (c) If risks of derivative closely related to the risks associated with host, do not split. Recognise the same together wherever the host is classified
- (d) If not closely related, then split by working out FV of derivative and classify the derivative component as FVPL and the remaining host wherever the same would have been classified
- (e) If fair value cannot be worked out classify the entire contract as FVPL.
  - (This is to prevent some companies to avoid classifying the Derivative at Fair Value for its negative impact in P&L)



#### Treatment of Financial Guarantee.

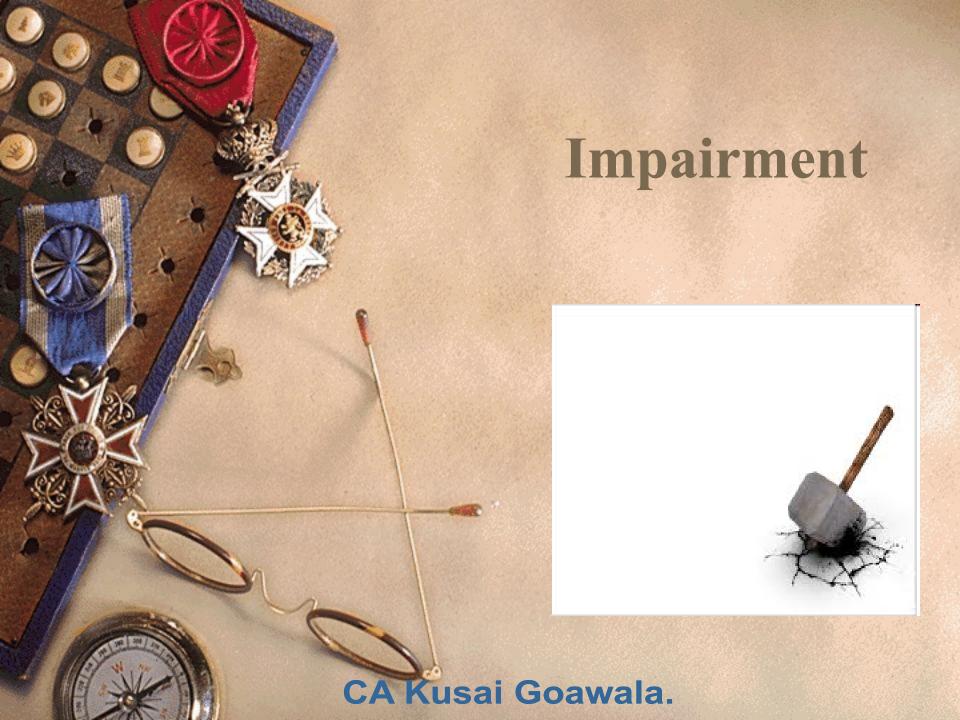
- (a) To recognize to the extent there is a probable outflow of resources.
- (b) For example Bills Discounted to be continued as debtors as well as liability to the discounter as the continued involvement is of the entity.





## Derecognition:

- If future cash flow ceases to exists
- If all substantial risks and rewards transferred
- If although substantial risks and reward not transferred but control transferred
- In case where the term of loan is changed substantially which changes the FV of the loan by 10% - derecognize the old loan and recognize the loan with revised term as new loan.





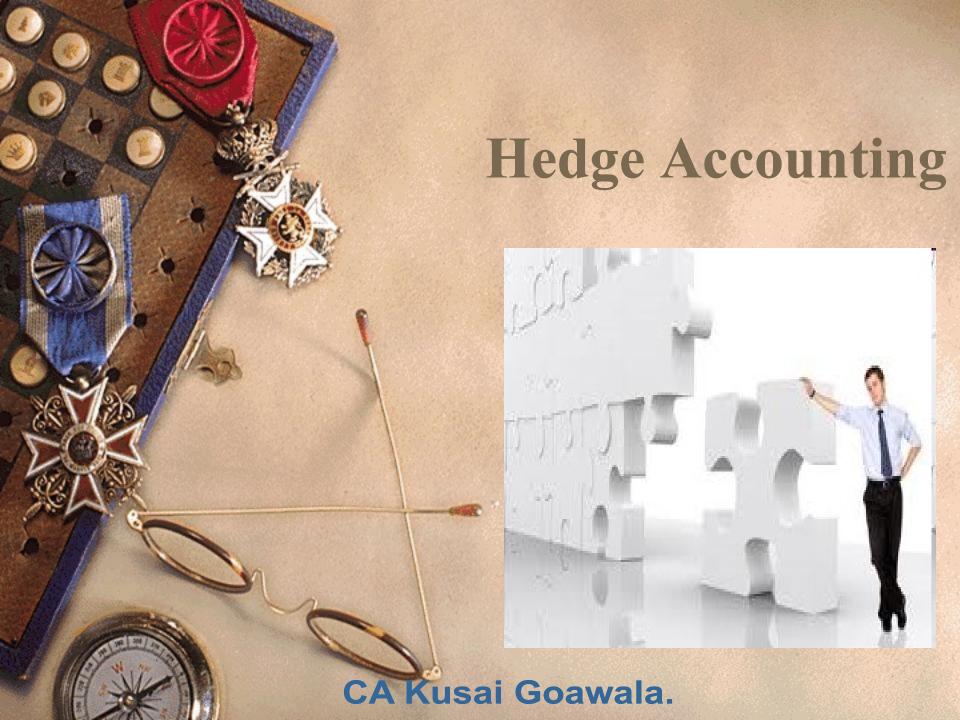
# Impairment of Financial Assets

- Assess at each balance sheet date for any objective evidence that a FA or group of FA is impaired and determine the amount
- Method for working impairment amount follow AS-28 Impairment of Assets



## Impairment of Financial Assets

- The objective evidence that FA is impaired includes but not restricted to following loss events.
  - a) Significant financial difficulties of the issuer or obligor
  - b) A breach of contract, such as default or delinquency in interest or principal payments
  - c) It becoming probable that the borrower will enter bankruptcy or other financial reorganization
- Collateral security will not affect the impairment of FA





# **Hedge Accounting**

Three types of Hedges:

(a) Fair Value Hedge (FVH)

(b) Cash Flow Hedge (CFH)

(c)Net investment in Non integrated foreign investment

Foreign currency hedge can either be FVH or CFH



# Fair Value Hedge

- (a) Recognised Asset or Liability for its changes in fair value
- (b) Unrecognised Firm Commitment



# Cash Flow Hedge

Highly probable forecast transaction



# Hedge

Firm Commitment

Non Cancelable PO

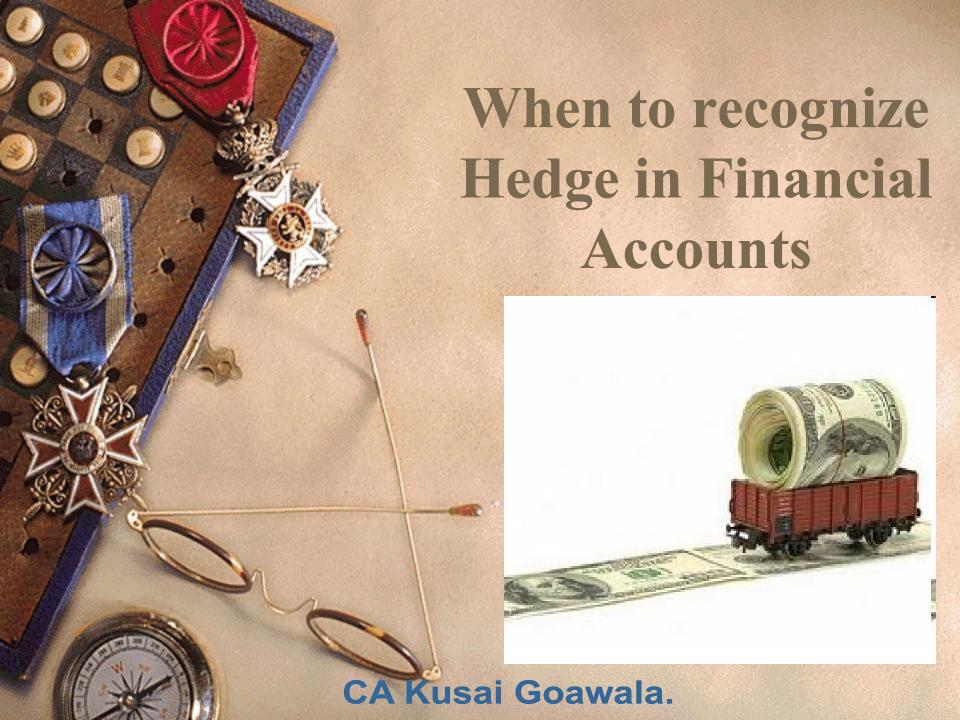
Forecast Transaction

Cancelable PO but transaction Possible



## How does FV Hedge works

- Contract 1 : \$ 100000 :- payable on 30/06/2011 (With Supplier)
- Contract 2 : Forward rate \$100000 @ `45:
  - buy on 30/06/2011.(with Bank)
- On Settlement- 30/06/2011-spot rate `48
   100000 \* 48 4800000



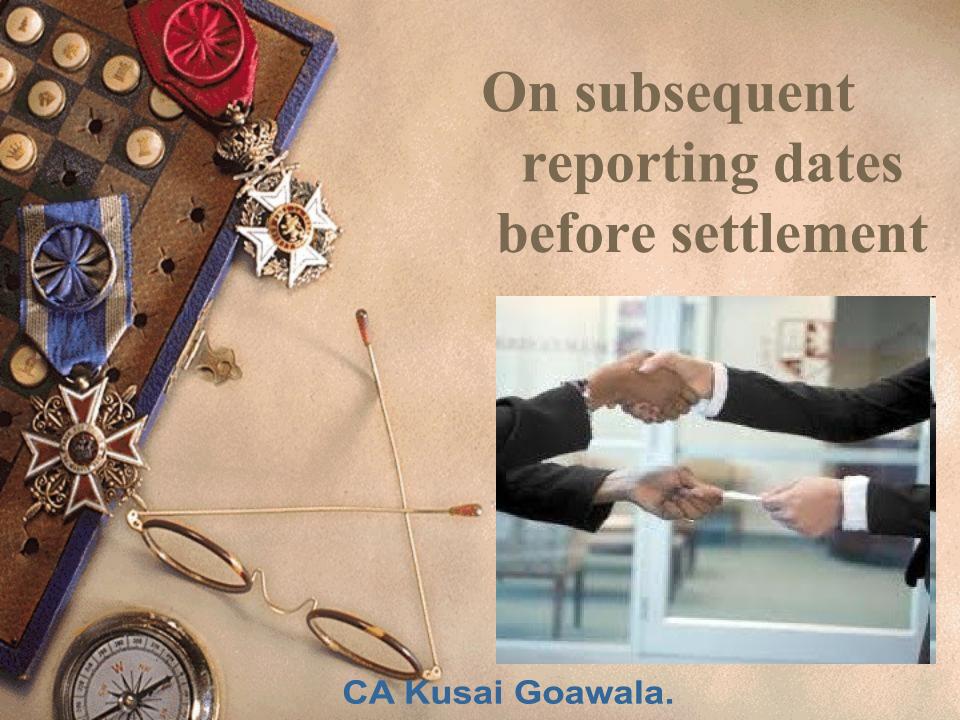


# When to recognize Hedge in Financial Accounts

- (a) A written agreement with third party
- (b) Hedge is effective

If the above conditions are met

The hedge is accounted at initial recognition at fair value – which will be zero.





# On subsequent reporting dates before settlement:

- (a) Fair Value the difference to the derivative asset and credit to firm commitment
- (b) Cash Flow Hedge to Hedge reserve account in equity and on settlement transfer to the respective account.





## Disclosures:

#### General Principles for disclosure:

 An entity should disclose information that enables users of its financial statements to evaluate the significance of financial instruments for its financial position and performance.

#### Specific principles:

- (a) Accounting policy for recognition of FA and FL
- (b) Classifications basis
- (c) Valuation techniques used and assumptions made
- (d)Reclassification
- (e) Derecognition



## Disclosures:

- (f) Collateral
- (g) Allowances account for credit losses (RDD)
- (h) Defaults and breaches
- (i) Financial assets that are either past due or impaired
- (j) Risk assessment strategy and policy
- (k) Credit Risk for debtors and receivables
- (I) Liquidity risk for liabilities



## Disclosures:

- (m) Market risk
- (n) Hedging policy and coverage
- (o) Impact of open exposures to variable risks.
- (p) Sensitivity analysis (impact on P&L if interest rate to go up by 0.5% basis on variable interest loan)
- (q) Quantitative and Qualitative Risk assessment



## **Stringent Disclosures**

- (a) Note on Interest income
- (b) Note on Financial Instruments Recognition and Measurement
- (c) Change in method due to implementation of Accounting Standard.
- (d) Credit Risk management of receivables
- (e) Risk on fluctuation of Interest Rates for variable interest loans



## Miscellaneous

- Regular way Purchase or Sale of financial assets
- Treasury Shares
- Offsetting FA and FL



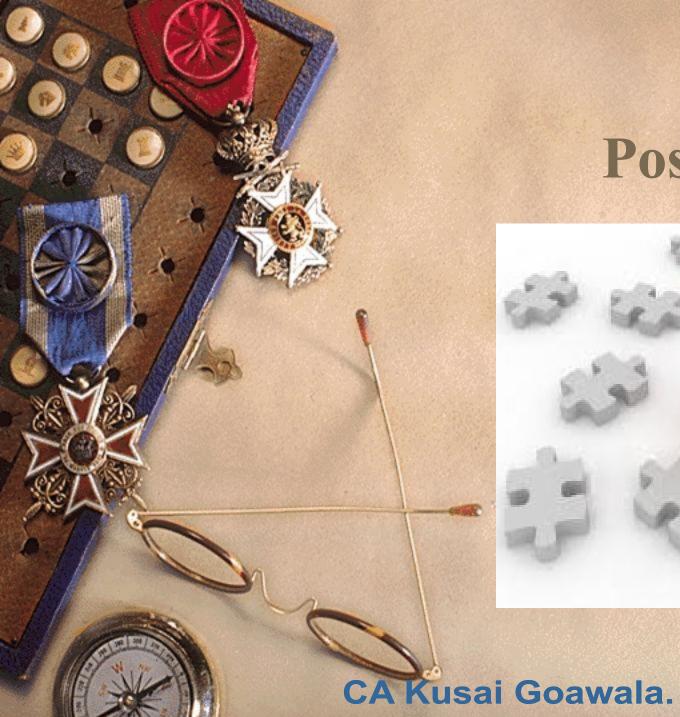
### Balance Sheet items - Applicability of Standard

Nature of Asset	Classification	Remarks
Investment in Sub/JV/Assoc	AS21/27/23	Test for impairment
Investment in Mutual Funds	AS30 – FVPL	Acquired for sale in short term
Investment in Other Current Inv	AS30 - AFS	Not actively quoted – at cost
Loans	AS30 - LR	Work out amortised cost
Income tax	AS22	Not applicable
Inventory	AS2	Not applicable
Debtors/Unbilled Revenue	AS30 – LR	Short term receivables at book value
Debtors – Retention	AS30 – LR	Discounted value
Cash and Bank	AS30 – LR	Book Value



### Balance Sheet Items - Applicability of Standard

Nature of Asset	Classification	Remarks
Creditors	AS30 – F Liability	Book Value
Creditors - retention	AS30 – F Liability	Discounted Value
Loan from banks/others	AS30 – F Liability	Amortised Cost
Share Capital	Not applicable	
Fixed Assets	AS10/6	Not applicable
Deferred Tax Assets/Liab	AS22	Not applicable
Guarantees	AS30 – Financial Commitments	At Fair Value



# Posers:





## Posers:

(a) Interest free loans given to Subsidiaries/JV/Associates whether covered under AS30 or their respective standards.

(b) Bills discounting – to continue to show the same as liability and not contingent liability

(c) ICD where terms of repayment is not specified.

