

# AS 20 — Earnings per share (EPS)

Earnings per

## I Basic

## II Diluted

1. Formula
2. Partly paid up shares
3. Shares with diff nominal values
4. Bonus
5. Right shares

1. Potential Eq Share
2. Formula
3. Conv Deb
4. Conv Pref Sh
5. Share Intarrants / options
6. Negative EPS
7. Multiple PES

## I] Basic EPS

1. Formula =  $\frac{\text{Earnings available for Equity Share holders}}{\text{Weighted Average No. of equity shares}}$ 
  - Refer Note (A)
  - Refer Note (B)

### Note A: Earnings Available for Eq Sh. Holders

Revenue (Total Income)	xxx
(-) Total expenses (Int on)	(xx)
Profit Before Tax (PBT)	xx
(-) Tax	(xx)
Profit After Tax (PAT)	xx
(-) Pref div	
<b>Cumulative</b> (deduct whether it is declared or not)	

Int paid on deb	
(Tax Benefit is available)	
eg 100	
Int (10)	
90	→ Tax 94 pe
	lagaga
<b>pref div</b>	

**Non-Cumulative** deduct only when it is declared  
**Earnings Available for FSH** xxx  
 Do not deduct eq div

(Tax Benefit is NOT available)  
 eg 100 — tax 10% pe  
 prof Div 1L — lagega  
 9L

**Cumulative 10% Pref Share**  
 url 482  
 10% x 18% = 5

**Non-Cumulative 10% Pref Sh**  
 url 482  
 10% x 10%  
 curl waala pay karne ka there is no obligat

**Note B: Weighted Average No. of eq shares (WANES)**

Quest

Eg: Assume Dec Yr end

	No. of shares
01/01/11 Balance @ the Begn of the Year	1800
31/05/11 New shares issued	600
01/11/11 Buy Back	300

Calculates WANES

Alternative 1:

$$1800 \times \frac{12}{12} \quad (+) \quad 600 \times \frac{7m}{12m} \quad (-) \quad 300 \times \frac{2m}{12m}$$

= 2100 shares

OR

Alternative 2:



$$1800 \times \frac{5m}{12m} \quad (+) \quad 2400 \times \frac{5m}{12m} \quad (+) \quad 2100 \times \frac{2m}{12m}$$

= 2100 shares

2. Partly paid up shares

→ They are treated as a fraction of fully paid up equivalent shares.

eg: Dec 4 end

01/01/01 → 1800 shares

01/01/01 → 1000 shares

Face value

£10

£10

Paid up value

£10

£5

(Partly paid up shares)

Calculate W.A.V.E.S #

$$1800 \times \frac{12m}{12m} + 500 \times \frac{12m}{12m}$$

= 2300 shares

#

No. of shares × Paid up value  
Nathan.PE =  $\frac{\text{face value}}{h}$

$$1000 \times \frac{£5}{£10} = 500 \text{ shares}$$

## Ques 2

WANES

$$1800 \text{ shares} \times \frac{12m}{12m} + 600 \text{ shares} \times \frac{75}{10} \times \frac{12m}{12m}$$

$$= 1850 \text{ shares}$$

### 3. Shares with different nominal values

→ when an enterprise has equity shares with different nominal values, the no. of eq shares is calculated by converting all such equity shares into equivalent no. of shares of the same nominal value.

Eg: Earnings Available for eq sh holders (EAFESH) = 10,00,000

	No. of shares	Face Value	Paid up
01/01/21 Bal at the begin of the year	18000	₹ 10	₹ 10
01/01/21 New Issue	4000	₹ 5	₹ 5

These are 2 diff class of shares as they have different face values.

Calculate EPS for both class of shares

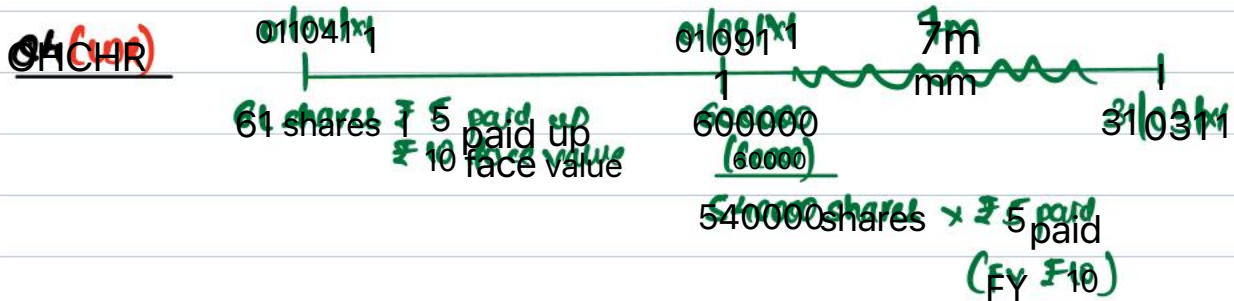
Sol<sup>n</sup>: Basic EPS =  $\frac{\text{EAFESH}}{\text{WANES}}$

$$= \frac{10,00,000}{1850}$$

$$\frac{18000 \times 12m + 4000 \times 75 \times 12m}{12m \times 12m}$$

$$\text{EPS} = \frac{250}{\text{Face Value } ₹10}$$

$$\text{EPS} = \frac{725}{\text{Face Value } ₹5}$$



Basic EPS:  $\frac{\text{EAFESH}}{\text{WAMES}}$

WAMES

$$= \frac{2196000}{467500 \text{ shares}}$$

$$\frac{60000 \text{ shares} \times \frac{₹5}{₹10} \times \frac{12m}{12m} + 540000 \times \frac{₹5}{₹10} \times \frac{7m}{12m}}$$

$$= \frac{₹2196000}{467500 \text{ shares}}$$

467500 shares

$$= ₹4.8 \text{ per share}$$

10 share ₹10

1 share ₹100

#### 4. Bonus shares / Share split / Shares consolidation

→ In case of Bonus shares, they are issued to existing shareholders for no additional consideration. ∴ the no. of shares outstanding is increased without any increase in cash resources.

→ Therefore in case of Bonus, the date of issue of Bonus shares is irrelevant. ∴ Bonus shares are assumed to be o/s from the earliest reporting period (i.e. take the effect of Bonus in 6-y. & P.Y. Both)

→ Just like Bonus, same treatment is also applicable to share split / share consolidation

Eg:	2011	20x2
EAFESH	£10L	£10L
WANES	5L shares	5L shares + 5L shares Bonu (1:1 ratio)

Basic EPS	2011	20x2
	£2 per share (original)	£1

$$\begin{aligned}
 \text{Basic EPS of PY (Restated)} &= \frac{\text{EAFESH}}{\text{WANES (incl Bonus)}} \\
 \text{(including the effect of Bonus in PY)} &= \frac{10L}{10L \text{ shares (5L shares PY + 5L Bonu)}} \\
 &= \text{£1 per share}
 \end{aligned}$$

If there is Bonus remove 3 EPs (for 2 years)

P.y	C.y
① Original	① Original
② Restated	

$$\underline{05} \text{ EPS for the year } 20x2 \text{ (C.y.)} = \frac{\text{EAFESH}}{\text{WANES}}$$

$$= \frac{760,000,000}{20,000,000 \text{ shares} + 81,000,000 \text{ Bonus (2:1)} \times \frac{3}{12}}$$

No months weight in Bonus

$$= \text{£1 per share.}$$

$$\text{EPS for } 20x1 \text{ (Original)} = \frac{\text{EAFESH}}{\text{WANES}}$$

$$= \frac{1800000}{20,000,000 \text{ shares}}$$

$$= \text{£0.9 per share}$$

$$\text{EPS for } 20x1 \text{ (Restated)} = \frac{\text{EAFESH}}{\text{WANES (incl. Bonus)}}$$

$$= \frac{1800,000}{20 \text{ shares} + 40 \text{ shares}}$$

$$= \text{£0.3 per share.}$$

## Q6 (LDR)

E.g. (x1-x2)

$$\text{Basic EPS} = \frac{\text{EAFESH (WN1)}}{\text{WANES (WN2)}} = \frac{82,00,000}{15,54,000} = 5.28 \text{ per share}$$

Conte	EAFESH	WN2	WANES
PAT	90,00,000	Opn Bal	$10,00,000 \times \frac{12}{12} = 10,00,000$
less: Prefdix (1 cr x 8%)	(8,00,000)	Bonus (+)	$5,00,000 \times (101 \times \frac{1}{2}) = 5,00,000$
EAFESH	82,00,000	New CH Issue	$2,00,000 \times \frac{3}{12} = 50,000$
			15,50,000

By (20x0-x1) = Original EPS = 62.30 per share.

←  
EAFESH? Basic EPS =  $\frac{\text{EAFESH}}{\text{WANES}}$

$$62.30 = \frac{\text{EAFESH}}{10,00,000}$$

$$\text{EAFESH} = 6,23,00,000$$

EPS p.is (Restated) =  $\frac{\text{EAFESH}}{\text{WANES (incl. Bonus)}}$

$$= \frac{6,23,00,000}{10,00,000 + 5,00,000}$$

share      share

$$= ₹41.53 \text{ per share}$$

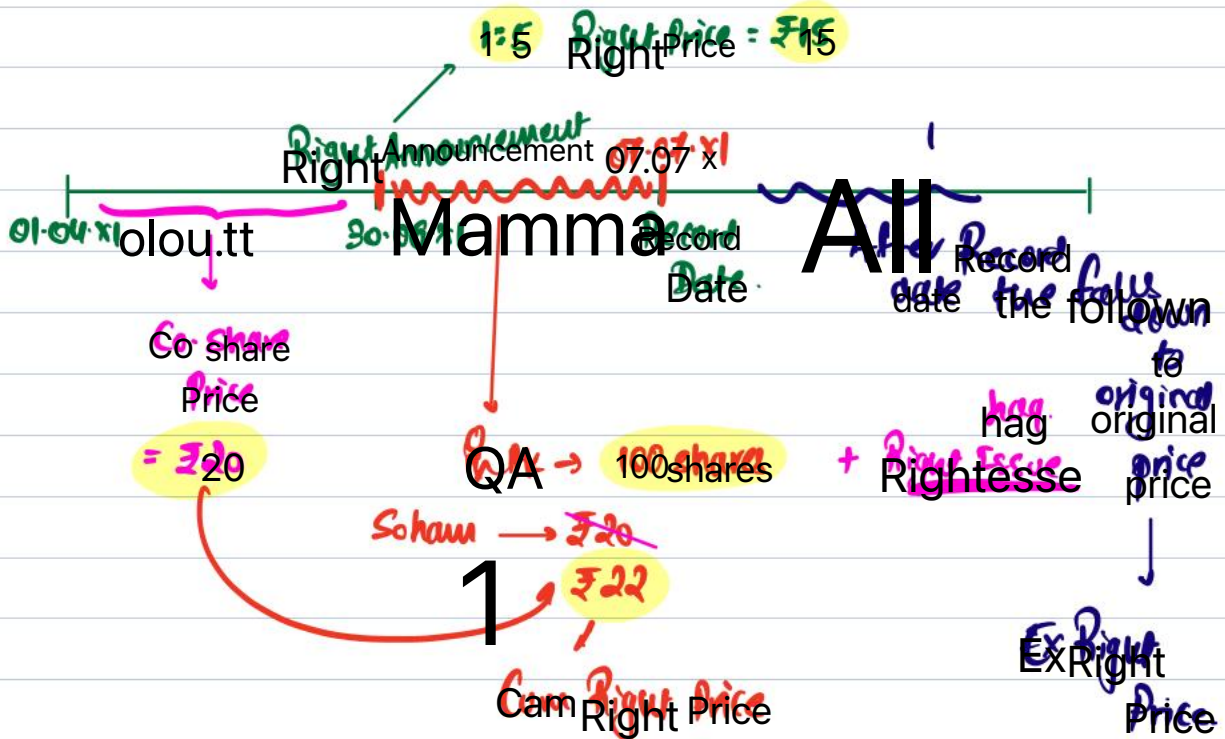
ii) Refer Q. B.

5. Time of inclusion in calculation of weighted average no. of shares

When shares are issued	When to include in denominator
<p>1. Shares issued for cash</p> <p>eg: New shares issue announced → 01/07            Cash receivable on new issue → 01/08</p>	<p>When cash is receivable</p>
<p>2. Issued for conversion of debentures</p>	<p>Date of conversion</p>
<p>3. Shares given against interest or princ. repayment of loan</p>	<p>Date when interest or princ. ceases to accrue.</p>
<p>4. Shares given for settlement of a liab</p>	<p>Date of settlement</p>
<p>5. Shares given for acquisition of asset</p>	<p>Date when acquired asset is recognised</p>
<p>6. Shares to be issued for services rendered.</p>	<p>Date when services are rendered.</p>

**IWH**  
**6. Right shares**

Existing SH are given shares @ lower price



Right shares are generally issued at less than fair value ∴ it means that there is a Bonus element in right shares also.

Steps to solve

**Step ① Calculate theoretical Ex-Right Price**

$$= \frac{\text{Fair value of shares of Before Right Issue} + \text{Amount Rec'd in Right shares}}{\text{Total No. of shares after Right Issue}}$$

Total No. of shares after Right Issue

**Step ② Bifurcate the shares issued under right into Bonus element**

## Shares issued for consideration

Note: Under Right Issue also if 2 years are given, then 3 EPS will be calculated  
(C<sub>2</sub> → original  
P<sub>Y</sub> → original (+) Restated)

Ques 8

Right shares

Step 1 Compute theoretical Ex-Right Price

Fair value of shares of Before Right Issue (₹) Amount Rec'd in Right shares

Total No of shares after Right Issue.

$$= \frac{(500000 \times ₹21) + (100000 \times ₹15)}{5,00,000 + 100,000}$$

$$\frac{5,00,000 + 100,000}{\text{shares} \quad \text{shares}}$$

$$= ₹20 \text{ per share (Ex Right Price)}$$

$$\text{Funds raised through right issue} = ₹15,00,000$$

(100000 shares × ₹15)

$$\text{No. of shares to be issued @ ₹20 to raise ₹15,00,000} = \frac{1500000}{20} = 75000 \text{ shares}$$

Step 2 Right Shares Distribution

① Bonus Shares = 25000 shares → No time weights

(11 - 75k)  
shares

② Issued for consideration = 75000 shares → time weight applies.

Basic EPS (C.J.) =  $\frac{EAFESH}{WANES}$

=  $\frac{15,00,000}{5,99,250}$

$\frac{500000 \times 12m}{12m} + \frac{25000 \text{ shares Bonus} \times 12m}{12m} + \frac{75000 \times 10m}{1,07m}$

=  $\frac{15,00,000}{5,87,500 \text{ shares}}$

= ₹ 2.55 per share.

Basic EPS (P.Y) 20x4 (Original) =  $\frac{EAFESH}{WANES}$

=  $\frac{11,00,000}{5,00,000 \text{ shares}}$

= ₹ 2.2 per share.

Basic EPS (P.Y) (Restated) =  $\frac{EAFESH}{WANES}$

Effstine Bonus

$$= \frac{11,00,000}{500,000 \text{ shares} + 250,000 \text{ shares}}$$

$$= ₹ 2.00 \text{ per share.}$$

eg (CDR)

Right shares

Step ① Compute Theoretical Ex Right Price

Fair value of shares of Before Right Issue (+) Amount Rec'd in Right shares

Total No. of shares after Right Issue.

$$\frac{10,00,000 \text{ shares} \times ₹ 25 \quad (+) \quad 250,000 \text{ shares} \times ₹ 20}{12,50,000 \text{ shares}}$$

12,50,000 shares

$$= ₹ 24 \text{ (Ex Right Price)}$$

Funds raised through right issue = ₹ 50,00,000

No. of shares to be issued @ Ex Right Price (i.e. ₹ 24) to raise ₹ 50L

$$= \frac{50,00,000}{₹ 24} = 208333 \text{ shares}$$

Step 2 Right shares bifurcation (250000)

- (a) Issued for consideration = 208333 shares → Time weight applies
- (b) Bonu (Bf) = 41667 shares → no time weight

$$\begin{aligned} \text{Basic EPS (C.Y.)} &= \frac{\text{EAFESH}}{20 \times 2} \\ &= \frac{30,00,000}{\frac{10,00,000 \times 12}{\text{shares}} + \frac{41667 \times 12}{12} + \frac{208333 \times 9}{12}} \\ &= ₹ 2.50 \text{ per share.} \end{aligned}$$

$$\begin{aligned} \text{Basic EPS B.Y. (Original)} &= \frac{\text{EAFESH}}{20 \times 1} \\ &= \frac{20,00,000}{10,00,000 \text{ shares}} \\ &= ₹ 2 \text{ per share.} \end{aligned}$$

$$\begin{aligned} \text{Basic EPS B.Y. (Restated)} &= \frac{\text{EAFESH}}{\text{WANES (incl Bonus)}} \\ &= \frac{20,00,000}{\frac{10,00,000}{\text{shares}} + \frac{41667}{\text{shares}}} \\ &= ₹ 1.92 \text{ per share} \end{aligned}$$

Extra Part (06) Right shares calculation as per ICAI.

Step ① Ex Right Price = ₹ 24

Step ② Adjustment factor =  $\frac{\text{Cum Right Price}}{\text{Ex Right Price}} = \frac{₹ 25}{₹ 24} = 1.04$

Step ③ Calculate EPS

Basic EPS (Cg) =  $\frac{\text{EAFESH}}{\text{WANES}}$   
 = 30,00,000

3m  
 01/01/22  
 31/03/22  
 3m  
 01/04/22  
 31/03/23  
 Right Issue  
 2.52  
 12.52

$10,00,000 \times 1.04 \times \frac{3}{12} + 12,50,000 \times \frac{9}{12}$   
 shares  
 Aug  
 Bones

=  $\frac{30,00,000}{11,97,500} = ₹ 2.50 \text{ per share}$

## Ques 10

Step ① Calculation of Ex Right Price

$$= \frac{\text{Fair value of shares of Before Right Issue (+) Amount rec'd in Right Issue}}{\text{Total No of shares after Right Issue}}$$

$$= \frac{10,00,000 \times 32 + 20,00,000 \times 25}{12,00,000 \text{ shares}}$$

$$= \text{£ } 30.83 \text{ per share.}$$

Funds raised through right issue = £ 50,00,000

$$\text{Shares to be issued @ £ } 30.83 \text{ to raise £ } 50,00,000 = \frac{50,00,000}{50.83}$$

$$= 162180 \text{ shares}$$

Step ② Right shares Distribution (20000 shares)

① Issued for consideration = 162180 shares → Time weight applies

② Bon (Blf) = 37820 shares → no time weight

$$\text{Basic EPS } \text{£} = \frac{\text{EAFESH}}{\text{UFNES}}$$

$$20 \times 3 - 74$$

$$= \frac{30,00,000}{12}$$

$$10,00,000 \times \frac{12}{12} + 37820 \times \frac{12}{12} + 162180 \times \frac{8}{12}$$

$$= \text{£ } 2.62 \text{ per share.}$$

$$\begin{aligned}
 \text{P/E (original)} &= \frac{22000000}{2012-13} \\
 &= \frac{22000000}{2194} \\
 &= \text{£ } 2.2 \text{ per share}
 \end{aligned}$$

$$\begin{aligned}
 \text{P/E (restated)} &= \frac{22000000}{2012-13} \\
 &= \frac{22000000}{100000 + 37820} \\
 &= \frac{22000000}{137820} \\
 &= \text{£ } 2.12 \text{ per share}
 \end{aligned}$$

## II] Diluted EPS

### 1. Potential Eq Shares

→ Potential Eq share are instruments which entitles the holder the right to acquire equity shares in future (future mein equity share banega)

Examples: Convertible Debentures

Convertible Pref shares

ESOPs

Share Warrants (It is a instrument that gives the holder, right to purchase the shares of a company at a pre-determined lower price which is set on Day 0)

Formula for diluted EPS =  $\frac{\text{EAFESH} \pm \text{Effect of Potential Eq Shares}}{\text{WANES} \pm \text{Effect of Potential Eq Shares}}$

### Eg ① Basic EPS

$$\frac{\text{EAFESH} = 100}{\text{WANES} \quad 1 \text{ shares}} = ₹10 \text{ per share}$$

8% Conv Deb of ₹100 each. [5000 Deb] outstanding for the whole year. These Conv Deb will be converted into Eq Shares where each Deb will be allotted 10 eq shares after 5 years. Tax Rate = 30%.

Compute Diluted EPS.

$$5000 \times 100 \times 8\% = \text{HOT} \\ \times 70\% \quad 28000$$

Sol<sup>n</sup>: Diluted EPS = EAFESH (+) Effect of Pot Eq Share → WMI  
 conservatism WANES (+) Effect of Potential Eq Share → WN 2

= 10.28.000  
 150000 shares

= 76.85 per share  
 per share → Basic se kam gaya  
 i.e. it is Diluted EPS (Reported)  
 → Basic se zyada gaya then it is  
 anti-dilutive (not Reported)

WN 1

EAFESH	=	1000,000	
(+) Effect of Pot Eq Share		28000	(5000 Deb x 2100 x 8%) x 70%
(Savings in Int)			= 40,000 - 28,000
net of tax		<u>10.28,000</u>	

WN 2

WANES	100000
(+) Effect of Potential	50,000 shares
Eq Shares	<u>150000 shares</u>

Q12

\* PES = Potential Eq. Share

BASIC EPS = ₹2 per share (GIVEN)

Diluted EPS =  $\frac{EAFESH + \text{Effect of PES}}{WANES + \text{Effect of PES}}$  → CUMI

→ WME

$$= \frac{1,08,40,000}{60,00,000}$$

$$= ₹1.81 \text{ per share}$$

WII

EAFESH 1,00,00,000

71 Savings in Jul

(IL Deb x 70% x 12) 840,000

x 70%

OR

1,08,40,000

12L 4 3.61

↓ Tax on Int  
Jul Exp

UNI WANES = 59,00,000

(+ Effect of PES = 10,00,000)

69,00,000

Q14 (USA)

$$i) \text{ Basic EPS} = \frac{\text{EAFESH}}{\text{NAMES}}$$

$$= \frac{754}{101 \text{ shares}}$$

$$= 7.5 \text{ per share}$$

$$ii) \text{ Diluted EPS} = \frac{\text{EAFESH} (+ \text{Effect of PES})}{\text{NAMES} + \text{Effect of PES}}$$

$$= \frac{8060000}{11,10,000 \text{ shares}}$$

$$= 7.26 \text{ per share. (Dilutive since it is less than Basic EPS)}$$

WN ①

EAFESH 75,00,000

(+) Savings in Int 500,000

(1475100 × 8%) × 70%

8060,000

WN ②

NAMES 10,00,000

(+) Effect of PES 110,000

11,10,000

Eq 2 (WR) (Deb issued during the year)

$$\text{Basic EPS} = \frac{\text{EAFESH}}{\text{WANES}} = \frac{£10,000,000}{10,000,000 \text{ shares}} = £1 \text{ per share}$$

On 01-07-1x1 issue of 10% Conv Deb of £700,000 (FV £100), they are convertible into 10,000 equity shares after 5 years.

Tax Rate = 30%

Compute Basic to Diluted EPS for x1-x2.

Sol<sup>n</sup>: Basic EPS = £1 per share.

$$\text{Diluted EPS} = \frac{\text{EAFESH (+) Effect of PES} \rightarrow \text{WN1}}{\text{WANES (+) Effect of PES} \rightarrow \text{WN2}}$$

$$= \frac{10,36,750}{10,07,500} - 10030 \rightarrow \text{this is more than Basic EPS}$$

∴ it is anti dilutive.

(Here Basic EPS = Diluted = 1)

WN1		WN2	
EAFESH	10,00,000	WANES	10,00,000 shares
(+) Savings in Int	36,750	(+) Effect of PES	7,500 shares
(700,000 × 10% × 9m) × 70%	91	(10,000 shares × 9m / 12m)	
	<u>10,36,750</u>		<u>10,07,500 shares</u>

Eg 3 (CDR)

EAFESH = 1,000,000 } Basic EPS = £2  
 WANES = 50,000,000 shares }

No of 12% Conv Deb of £100 each = 1,00,000 Deb  
 Each Deb is convertible into 10 equity shares

Interest Exp for current year = £900,000

Tax Rate = 30%

Compute Basic & Diluted EPS

Sol<sup>n</sup>: Hidden Adj

Deb Int for 12 Months = 12,00,000 → 12m  
 Int Exp in ques = 900,000 → ? 9m

This means Conv Deb was there only for 9 months in C.Y.

$$\text{Diluted EPS} = \frac{\text{EAFESH} + \text{Effect of PES}}{\text{WANES} + \text{Effect of PES}} = \frac{1,06,30,000}{57,50,000} = \text{£1.85 per share}$$

It is less than Basic EPS reported

SUN ①

EAFESH	1,00,00,000
(+) Effect of PES (Savings in Int)	630,000
900,000 (9m) x 70%	
	<u>1,06,30,000</u>

SUN ② WANES = 50,00,000 shares

(+) Effect of PES (100,000 Deb x 10 share) x 9/12	750,000 shares
	<u>57,50,000 shares</u>

## \* Convertible Pref Share

Eg: Basic EPS =  $\frac{100}{11 \text{ shares}}$  = ₹ 10 per share.

8% Conv Pref shares of ₹ 100 each (5000 Pref shares) outstanding for whole year

These conv Pref share will be converted into 10 eq shares for each

pref share. Tax Rate = 30%  
Compute Diluted EPS

Irrelevant for Pref shares

as Pref div has no tax impact

Diluted EPS =  $\frac{\text{EAFESH} + \text{Effect of PES}}{\text{WANES} + \text{Effect of PES}}$  → WN1

→ WN2

= ₹ 10,40,000

150000 shares

= ₹ 6.93 per share

WN1

EAFESH 10,00,000

(+) Saving in Div (Net tax) 40,000

(5000 Pref × ₹ 100 × 8%)  
shares

₹ 10,40,000

WN2

WANES 1,00,000

(+) Effect of PES 50,000 shares

(5000 Pref × 10 eq)  
share shares

150000 shares

## \* Share Warrants/ESOPs

Eg: EAFESH = £20,00,000

WANES = 5,00,000 shares

No. of options/warrants granted = 2,00,000 warrants against which 20,00,000 shares will be issued after 3 years.

Market price during current year 20x1 = ₹40.

Exercise price for one share = ₹30.

$$\left. \begin{array}{l} \text{Market price during current year 20x1} = ₹40 \\ \text{Exercise price for one share} = ₹30 \end{array} \right\} \frac{21 \times 10}{40} = 50K$$

## Calculate Basic & Diluted EPS

Soln: Basic EPS =  $\frac{\text{EAFESH}}{\text{WANES}}$

$$= \frac{20,00,000}{5,00,000 \text{ shares}} = ₹4 \text{ per share}$$

Diluted EPS =  $\frac{\text{EAFESH} + \text{Effect of PES} \rightarrow \text{WN①}}$

$\frac{\text{WANES} + \text{Effect of PES} \rightarrow \text{WN②}}$

$$= \frac{20,00,000}{5,50,000 \text{ shares}} = ₹3.64$$

WML EAFESH → 20,00,000

\* Effect of PES → NIL  
due to warrants

WIL WANES 5,00,000

Effect of PES ~~200000 shares~~

(~~200000 shares~~ × ₹ 10) → Free comp

₹ 40

Mkt price

= 50000 shares

5,50,000 shares

logic

200000 share

Free comp

50000 shares

Consideration (BIF)

150000 shares

Impact on numerator  
NIL

i. Impact considered on Denominator

Impact on numerator

Cannot be measured

(Paisa aaya But usse Kitna Earnings kamaya cant measure)

∴ Ignore from both numerator & denominator.

Please Note: Warrants is neither right shares nor Bonus.

Q15

$$\begin{aligned} \text{i) Basic EPS} &= \frac{\text{EAFESH}}{\text{WANES}} \\ &= \frac{12,00,000}{5,00,000 \text{ shares}} \\ &= ₹ 2.4 \text{ per share.} \end{aligned}$$

$$\begin{aligned} \text{ii) Diluted EPS} &= \frac{\text{EAFESH} + \text{Effect of PES} \rightarrow \text{CUN1}}{\text{WANES} + \text{Effect of PES} \rightarrow \text{WN 2}} \\ &= \frac{12,00,000}{5,25,000 \text{ shares}} \\ &= ₹ 2.29 \text{ per share.} \end{aligned}$$

CUN1

$$\text{EAFESH} = 12,00,000$$

$$\begin{array}{r} \text{(1) Effect of PES} \quad \underline{\text{NIL}} \\ 12,00,000 \end{array}$$

CAN2 WANES 5,00,000

$$\text{(1) Effect of PES} \quad 25,000 \text{ shares}$$

$$(10,000 \times 5 \rightarrow \text{Free})$$

$$20 \rightarrow \text{Mkt price}$$

$$\underline{\hspace{2cm}} \\ 5,25,000 \text{ shares}$$

Q16 (CDR)

i) Basic EPS = EAFESH

WANES

(PAT) £1 Pref div

01/04/23  
01194

01/07/23

9m

1000EUM

50000

Paid up 80

(10000)

40000 → 720 paid up

$$= \frac{344000 - 160000}{}$$

$$\frac{50000 \times 80 \times 12}{18 \times 12} + \frac{40000 \times 20 \times 9}{40000 \times 18 \times 12}$$

$$= \frac{184000}{46000}$$

$$= 4$$

$$= \text{£4 per share}$$

ii) Diluted EPS = EAFESH (H) Effect of PES

WANES (A) Effect of PES

$$= \frac{268000}{76000 \text{ shares}}$$

$$= \text{£3.53 per share}$$

(It is less than Basic ∴ it is diluted)

CUN ①

EAFESH 184000

(+) Savings in Int (net of tax) 84000

$(104 \times 12\%) \times 70\%$

$$\underline{268000}$$

CAN ② WANES

46000 shares

(+) Effect of PES

30000 shares

(10000 Deb x 3 shares)

76000 shares

## 2. EPS in case of negative earnings

Eg	Basic	Diluted EPS	
	10	7	→ Dilutive
	(10)	(7)	→ Anti-Dilutive
	(10)	(12)	→ Dilutive

## 3. EPS in case of continued & discontinued operations

In case of companies where profit/loss for continued & discontinued both are given, in such case whether Pot. Eq shares are dilutive or not would be calculated only on profit/loss from continuing operations.

Eg	Profit from continuing op	100000
	loss from disc op	(25000)

$$WANES = 10,000$$

Pot Eq Shares (warrants) only free component given = 2000 shares

Check whether PES are dilutive or not.

$$\text{Sol}^n: \text{Basic EPS} = \frac{\text{EAFESH (only cont op)}}{WANES}$$

$$= \frac{100000}{10000 \text{ shares}} = ₹10 \text{ per share.}$$

Diluted EPS =  $\frac{100000 + \text{NIL}}{10000 + 2000}$   
 (only consider count op)  
 =  $\frac{100000}{12000 \text{ shares}}$   
 = ₹ 8.33 (It is less than Basic ∴ Dilutive)

Q17 (CDR)

	Separate FS of x12	Consolidated FS of x12
Basic EPS = $\frac{\text{EAFESH}}{\text{WAMES}}$	$\frac{40L}{50000 \text{ shares}}$ = ₹ 40 per share	$\frac{40L}{50000 \text{ shares}}$ = ₹ 8 per share
Diluted EPS = $\frac{\text{EAFESH} + \text{Effect of FS}}{\text{WAMES} + \text{Effect of FS}}$	$\frac{(2L) + \text{NIL}}{50000 \text{ shares} + 10000 \text{ shares}}$ = ₹ 33.33 per share At dilutive	$\frac{40L}{50000 \text{ shares} + 10000 \text{ shares}}$ = ₹ 6.67 per share ↓ Dilative.
∴ Basic EPS = Diluted EPS = ₹ 40 per share (Separate FS)		

Q18

$$\begin{aligned} \text{i) Basic Control (out of)} &= \frac{\text{EAFESH}}{\text{Effects}} \\ &= \frac{240000}{1000 \text{ shares}} \\ &= \text{£}240 \text{ per share} \end{aligned}$$

$$\begin{aligned} \text{ii) Dilutive (out of)} &= \frac{\text{EAFESH} + \text{Effect of PES}}{\text{WAMES @ 1}} \\ &= \frac{240000 + \text{NIL}}{1000 \text{ shares} + 200 \text{ shares}} \\ &= \text{£}200 \text{ per share} \quad \text{(Less than Basic :- Dilutive)} \end{aligned}$$

Extra Combine Profit (out + Disc) = (120000)  
of the (364)

$$\begin{aligned} \text{Basic EPs} &= \frac{(120000)}{1000 \text{ shares}} \\ &= \text{£}120 \end{aligned}$$

$$\begin{aligned} \text{Diluted EPs} &= \frac{(120000)}{1200 \text{ shares}} \\ &= \text{£}100 \end{aligned}$$

Report this even if it is anti dilutive as cont op Basic & Diluted both are reported

#### 4. Multiple Potential Eq. Shares (Calculation of Diluted EPS)

(LDP)

Ex: AK Ltd has the following info for the year ended 31.3.20.

EAFFSH = 950000

Shares on 01/04/21 → 50,000 shares

New Issue on 01/07/21 → 30,000 shares

i) AK Ltd has also issued 40000 share warrants options, which will be allotted shares after 3 years (Mkt price = £20, Exercise price = £15)

ii) AK Ltd has also issued 12% Conv Deb of £6,00000 which will be converted into 1000 eq shares.

iii) It has also issued 10% Conv Pref Shares of £5500000 to be converted into 10000 eq shares.

Tax Rate = 30%. Compute Basic & Diluted EPS.

Sol: i) Basic EPS =  $\frac{EAFFSH}{WANES}$

=  $\frac{950000}{50000}$

$\frac{50000}{Shares} + \frac{30000 \times 9m}{30000 \times 9m}$

=  $\frac{950000}{72500}$

72500 shares

= £ 13.10 per share

ii) Diluted EPS =  $\frac{\text{EAFESH (+) Effect of PES}}{\text{WANES (+) Effect of PES}}$   $\rightarrow$  WN ①  
 $\rightarrow$  WN ②

$$= \frac{1050400}{93500 \text{ shares}} = \text{£ } 11.23 \text{ per share.}$$

WN ① Numerator

EAFESH = £ 950000

(+) Impact of warrants NIL

(+) Impact of Conv Deb

(Savings in Int net of tax) 50400

$(600000 \times 12\%) \times 70\%$

(+) Impact of pref Sh 50000

(Savings in Div)

$(500000 \times 10\%)$

1050400

WN ② Denominator

WANES = 72,500 shares

(+) Impact of warrants = 10000 shares

(+) Impact of

$(40000 \times \frac{7.5}{7.5})$

(+) Impact of = 1000 shares

Conv Deb

(+) Impact of = 10000 shares

Conv Pref Shares

93500 shares

**Why kattappa?** Because there are more than 1 class of PES.

i. we will have to evaluate each class separately

**Follow Below steps**

Step 1 Calculate incremental EPS for each PES.  
 calculate incremental EPS for each PES.  
 =  $\frac{\text{Incremental Effect on Numerator}}{\text{Incremental Effect on Denominator}}$

(lowest to highest)

Step 2 Ranking

① Warrants =  $\frac{0}{10000 \text{ shares}}$  = 0

I

② Conv Deb =  $\frac{50400}{1000 \text{ shares}}$  = ₹ 50.40

III

③ Conv Pref Share =  $\frac{50000}{10000 \text{ shares}}$  = ₹ 5 per share

II

Step 3 Conclusion (Dilutive / Antidilutive)  
 steps

Particulars	Numerator	Denominator	EPS	Conclusion
Basic EPS	950000	72500	13.10	-
(+) Warrants (Rank I)	0	10000		
	950000	82500	11.52	Dilutive
(+) Conv Pref Share (Rank II)	50000	10000		
	10,00,000	92500	10.81	Dilutive
(+) Conv Deb (Rank III)	50400	1000		
	1050400	93500	11.23	Anti Dil

Dilutive

Dilutive

Anti Dil

Not be considered in diluted EPS as it is anti dilutive

Jaise he anti dilutive top

$$\begin{aligned} \text{Diluted EPS} &= \frac{950000 + 8 + 50000}{72500 + 10000 + 10000} \\ &= 10.81 \\ &\text{Reported} \end{aligned}$$

(consider only PES which are dilutive)

warrants Pref

**Question 1**

(a) XYZ Limited has provided you the following information as on 31<sup>st</sup> March, 2024:

Particulars	₹
Net profit (After Tax) / EAFESH	₹ 31,20,000
No. of shares outstanding as on 31-3-2024 of ₹ 10 each	8,00,000
Average fair value of one equity share during the year 2023-24	₹ 25
Weighted average no. of shares under option during the year 2023-24	80,000
Exercise price for shares under option during the year 2023-24	₹ 20
12% Debentures of ₹ 100 each	₹ 30,00,000
(Each debenture is convertible into 4 equity shares)	
Tax rate	30%

PES

PES

The company issued one equity share as bonus for every 5 equity shares outstanding as on 1<sup>st</sup> October, 2023. It further issued 2,00,000 equity shares of ₹ 10 each as on 1<sup>st</sup> January, 2024. The Financial Year of the company ends on 31<sup>st</sup> March each year.

You are required to calculate Basic and Diluted earnings per share as on 31<sup>st</sup> March, 2024 (round off your answer to 2 decimal places). **(5 Marks)**

op  
BOM  
SBOUS  
New  
Issue

Sol<sup>n</sup>: 022 (LDR)  
 SH

No. of shares outstanding on 31/03/24 = 8,00,000 (It includes New Issue & Bonus Shares)

<sup>4</sup> Q10  
 Q10 Calculation of shares on Day 1, Bonus shares New Issue.

Total shares on Yr end	800000	
+ New Issue (Given)	(200000)	
Opn Shares + Bonus	600000	$\frac{6}{1}$
(-) Bonus	(100000)	
Opn shares	500000	5

1) Basic EPS = 3120000

$$\frac{51 \times 12 + 11 \times 12 + 24 \times 3}{650000 \text{ shares}}$$

Opn apr shares
Bone
new Issue

$$= \frac{3120000}{650000 \text{ shares}} = 4.8 \text{ per share}$$

## ii) Diluted EPS (Multiple PES)

Step ① Incremental EPS =  $\frac{\text{Impact on Num}}{\text{Impact on Den}}$

Step ② Ranking

i) Warrants =  $\frac{0}{16000} = 0$   
 →  $\frac{80000 \times 5}{25}$

I

ii) Conv. Deb =  $\frac{252000}{120000 \text{ shares}} = 2.1$   
 →  $304 \times 121 \times 701 = 2.1$   
 →  $30000 \text{ Deb} \times 4 \text{ eq share}$

II

Step ③ Conclusion

Particulars	Numerator	Denominator	EPS	Conclusion
i) Basic EPS	3120000	650000	4.8	-
(+) Warrants	0	16000		
	3120000	666,000	4.68	Dilutive
(+) Conv. Deb	252000	120000		
	3372000	786000	4.29	Dilutive.

Diluted EPS = 4.29