# CALCULATION OF EFFICIENCY AND VARIABILITY OF DEPOSITS

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# **INTRODUCTION :**

An off shoot of National Movement, Andhra Bank has a long and rich patriotic background. Its founder, Dr.Bhogaraju Pattabhi Sitaramayya was an ardent freedom fighter, a great intellectual and multi -faceted genius. As a veteran Gandhian, he was committed to the rejuvenation of Indias villages. He realised that political freedom – if not combined with economic prosperity would mean nothing to the toiling millions of India. He, therefore, conceived the idea of establishing a bank to give credit support to the farming and trading communities as well as to artisans and craftsmen in rural Andhra. Thus, Andhra Bank came into existence. It was registered on November 20, 1923 and commenced business on November 28, with a paid up capital of Just 1.00 lakh rupees and an authorised capital of Rs.10.00 lakhs in an old building in a residential locality at Machilipatnam – a port town in coastal Andhra. The Andhra Bank was started first with 16 members of Board of Directors drawn from different walks of life. One of the members of the Board of Directors, Dr. Pattabhi was elected Managing Director of Bank. Every one of them was a prominent person standing in his own profession or vocation. The Bank passed through its gestation period and within a short span of time, started growing by leaps and bounds. From the beginning, the Bank's main objective was to mobilise the surplus from the agriculture and savings from the house holds and deploy them fruitfully for rural uplift and promotion of Industries.

# ANALYSIS OF DEPOSIT MOBILISATION OF ANDHRA BANK DURING THE SEVEN YEARS FROM 1-4-2011 TO 31-3-2018.

# To use statistical tool C.V and to find the efficient and stable Deposit mobilisation of Andhra Bank

**USE OF CO - EFFICENT OF VARIATION** 

1) To find Variability in Deposits

- 2) To find stability of Deposits
- 3) To find efficiency of Deposits

### FORMULA OF CO – EFFICENT OF VARIATION

Coefficient of Variation = (Standard Deviation / Mean) \* 100.

 $CV = \frac{\sigma}{\bar{x}} * 100$ 

 $Mean(\overline{X}) = \Sigma x_i/n$ 

Variance 
$$(\sigma^2) = \frac{\sum (\mathbf{x} - \mathbf{x})^2}{n}$$

Standard Deviation (
$$\sigma$$
) =  $\sqrt{\frac{\sum (\mathbf{x} - \mathbf{x})^2}{n}}$ 

# To find out the co-efficient variation for Demand Deposits

Year	Demand deposits(x)	$(X - \bar{\mathbf{x}})^2$
2011-12	63690032	322767541695023.0
2012-13	70286264	129265539995286.0
2013-14	74931663	45213540021716.4
2014-15	97060405	237302951134903.0
2015-16	75411378	38992361869327.1
2016-17	86604626	24491230853162.4
2017-18	103605983	481812095333488.0
Total	571590351	1279845260902910.0

**TABLE: 4.20** 

$$C.V. = \frac{\sigma}{\bar{x}} * 100$$

**Coefficient of variation = 16.56** 

### To find out the co-efficient variation for Saving Deposits

Year	Saving deposits	( <i>X</i> − <b>x</b> ) <sup>2</sup>		
2011-12	215782923	18990255468605600		
2012-13	247302586	11296601740466500		
2013-14	276927801	5876795134723630		
2014-15	326958050	709157371731507		
2015-16	379238894	657965343526035		
2016-17	486546463	17677937232215300		
2017-18	542359695	35634730612051200		
Total	2475116412	90843442903319800		
<b>TABLE: 4.21</b>				

$$C.V. = \frac{\sigma}{\bar{x}} * 100$$

**Coefficient of Variation = 32.22** 

Year	Term deposits	( <i>X</i> − <b>x</b> ) <sup>2</sup>
2011-12	779039226	131997435148819000
2012-13	920366959	49278130367918800
2013-14	1066591774	5739875297368660
2014-15	1126103991	264054300777930
2015-16	1288373751	21321843987920200
2016-17	1381261362	57076852464028800
2017-18	1434739108	85489204172343600
Total	7996476171	351167395739177000

To find out the co-efficient variation for Term Deposits

**TABLE: 4.22** 

$$C.V. = \frac{\sigma}{\bar{x}} * 100$$

#### **Coefficient of Variation = 19.61**

Interpretation:

**To Find Variability in Deposits** 

#### **Rule:**

#### In general if greater is the Co-Efficient of variation, greater is the Variability.

During the period of study, the saving deposits are more variable because its co-efficient of variation is 32.22. Whereas the co-efficient of variation of demand deposits 16.56 and co-efficient of variation of the term deposits is 19.61.

By the Coefficient of variation factor the saving deposits more varying compare to term deposits and demand deposits.

#### To Find Stability and efficiency in Deposits

#### **RULE:-**

#### Lower the Co-Efficient Variation greater the stability and efficiency.

During the study period the demand deposits are stable compare to saving deposits and term deposits as co –efficient of variation of demand deposits are low i.e., 16.56.

Compare to saving deposits the term deposits are also stable with 19.61 co-efficient of variatio

## **FINDINGS:**

- The demand deposits were increasing trend till 2014-15 but during the period 2015-16 it was decreasing trend and for the period 2016-17 to 2017-18 there is an increase in demand deposits
- The saving deposits for the period 2011-12 to 2017-18 in positive trend. That shows a continuous increase in saving deposits.
- The term deposits during the period 2011-12 to 2017-18 are continuously increased which shows a positive trend in term deposits.
- The total deposits are continuously increased from the period 2011-12 to 2017-18.
- By the Coefficient of variation factor the saving deposits more varying compare to term deposits and demand deposits.
- During the study period the demand deposits are stable compare to saving deposits and term deposits as co –efficient of variation of demand deposits are low i.e., 16.56.
- The trend values are higher than the original values that shows the organization has to improve its performance