



## A STUDY ON ASSET AND LIABILITY MANAGEMENT IN ICICI BANK

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**Abstract:** *Assets and Liabilities Management (ALM) is a dynamic process of planning, organizing, coordinating and controlling the assets and liabilities – their mixes, volumes, maturities, yields and costs in order to achieve a specified Net Interest Income (NII). This paper examines management of asset-liability in ICICI bank. The main objective is, to understand the problems involved in maintaining and managing assets and liabilities. The present study has been conducted on the basis of secondary data and is descriptive in its nature. The study period was confined to a period of five financial years from 2008-09 to 2012-13. The required secondary data for the study was collected through different websites, annual reports of ICICI, different journals. To make the analysis meaningful advanced statistical tools like – Ratios and percentages were applied. To test hypotheses the correlation was applied with the help of SPSS.21 Software package. The major findings are: Capital turnover ratio of the bank was satisfactory. The cash ratio has not been maintained according to the standard, the cash has been maintained less than the standard which indicates that company should maintain more cash balance. The net profit has been maintained in the increasing rate which shows that the company has performing well during the study period. From the study it is clear that ICICI looks forward to generate a more favorable service in the near future. The balance sheet of the company has been consistent and gives a hint of growth and expansion.*

**Key Words:** *Assets, Borrowings, Correlation, Investments, Liabilities, Profitability and Ratio analysis.*

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## **1) INTRODUCTION**

Banking in India originated in the last decades of the 18th century. The first banks were Bank of Hindustan (1770-1829) and The General Bank of India, established 1786 and since defunct. The largest bank, and the oldest still in existence, is the State Bank of India, which originated in the Bank of Calcutta in June 1806, which almost immediately became the Bank of Bengal. This was one of the three presidency banks, the other two being the Bank of Bombay and the Bank of Madras, all three of which were established under charters from the British East India Company. The three banks merged in 1921 to form the Imperial Bank of India, which, upon India's independence, became the State Bank of India in 1955. For many years the presidency banks acted as quasi-central banks, as did their successors, until the Reserve Bank of India was established in 1935.

ICICI Bank was established by the Industrial Credit and Investment Corporation of India, an Indian financial institution, as a wholly owned subsidiary in 1955. The parent company was formed in 1955 as a joint-venture of the World Bank, India's public-sector banks and public-sector insurance companies to provide project financing to Indian industry. The bank was initially known as the Industrial Credit and Investment Corporation of India Bank, before it changed its name to the abbreviated ICICI Bank.

ICICI Bank is an Indian multinational banking and financial services company headquartered in Mumbai. It is the second largest bank in India by assets and by market capitalization, as of 2014. It offers a wide range of banking products and financial services to corporate and retail customers through a variety of delivery channels and through its specialized subsidiaries in the areas of investment banking, life, non-life insurance, venture capital and asset management. The Bank has a network of 3,539 branches and 11,162 ATMs in India, and has a presence in 19 countries.

## **2) ASSET AND LIABILITY MANAGEMENT**

ALM is managing infrastructure asset to minimize the total cost of owning and operating them while continuously delivering the service levels customers desire. It is a comprehensive and structured approach to the long term management of asset. It refers to a systematic process of effectively maintaining, upgrading and operating assets, combining engineering principles with sound business practice and economic rational and providing



the tools to facilitate a more organized and flexible approach for making decision necessary to achieve expectations of stake holders and the public. It involves the management of assets, such as investments or property. Liability management is the flip side of the coin the management of debts, loans and mortgages. For example:- Most people and indeed companies have a mixture of asset and liabilities in order to maximize their returns or wealth.

### **3) LITERATURE REVIEW**

**Amit Kumar Meena and JoydipDhar (2014)** research focused on the analysis and comparison of liquidity ratios and asset liability management practiced in top three banks from public, private and foreign sector in India. The analysis was based upon the liquidity ratios calculation and the determination of maturity gap profiles for the banks under study. The results of this study suggested that overall banks in India have very good short term liquidity position and all banks were financing their short term liabilities by their long term assets.

**Narayan Baser (2014)** study indicates that Asset-Liability Management (ALM) was a comprehensive and dynamic framework for measuring, monitoring and managing the market risk of a bank. The study attempted to evaluate the changing perspectives of the banks in identifying and facing the risks and maintaining Asset Quality so as to ensure profitability with the help of ALM techniques.

**Kanhaiya Singh (2013)** analyzed the impact of measures and strategies banks undertook to manage the composition of asset-liability and its impact on their performance in general and profitability in particular There are serious attempts by banks to minimize the asset liability mismatch since the implementation of RBI guidelines in 1997. The study suggested much scope for banks to improve profitability by monitoring and reducing short term liquidity.

**Prathap B N (2013)** as their research indicated ALM in Indian banking system was concerned, it is still in a nascent stage. Against this backdrop, the objective of the research was to study and analyze the status of ALM approach in the Indian banking system. The study also indicates a strong relationship between fixed assets and net worth for all groups of banks.



#### **4) OBJECTIVES OF THE STUDY**

1. To understand the problems involved in maintaining and managing assets and liabilities.
2. To determine the financing pattern of the assets at ICICI bank.
3. To enable the efficient utilization of the available funds and proper management of the assets and liabilities.
4. To analyze the correlation between the various assets and liabilities.

#### **5) NEED FOR THE STUDY**

1. The prime importance of the study is to analyze the maintenance of asset and liability.
2. To have practical knowledge of asset and liability management in the company.
3. The findings of the study can be used as secondary data for the various future study purposes.

#### **6) LIMITATIONS OF THE STUDY**

1. The published information used in the study may not be accurate and unbiased.
2. Not much information of the company was revealed as the executive personal wanted certain information to be confidential.
3. Only monetary aspects of the company have been taken into consideration.
4. The study is restricted to one profit center of the company, due to the time and geographical constraints.

#### **7) RESEARCH METHODOLOGY**

The present study has been conducted on the basis of secondary data and is descriptive in its nature. The study period is confined to a period of five financial years from 2008-09 to 2012-13. The required secondary data for the study was collected through different websites, annual reports of ICICI, different journals. The researcher selected ICICI limited for the study. To make the analysis meaningful advanced statistical tools like – Ratios, Mean and percentages were applied. To test hypothesized the correlation was applied with the help of SPSS.21 Software package.



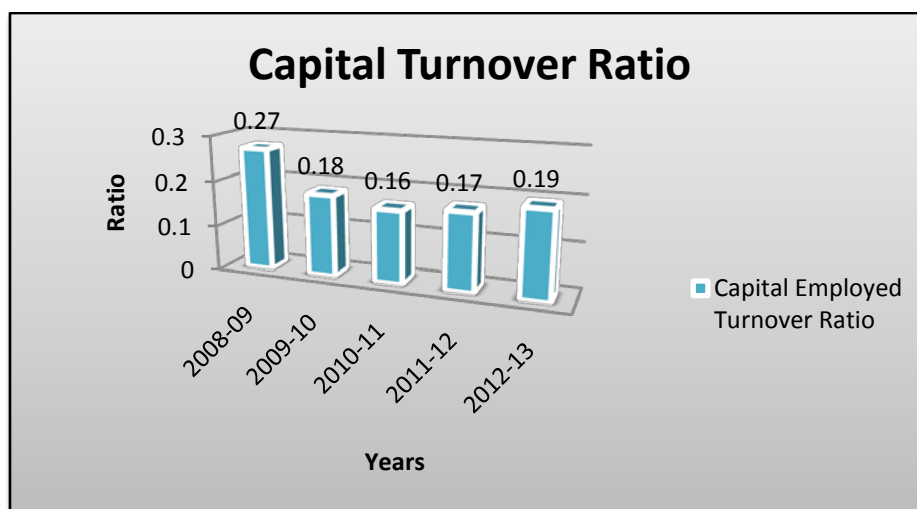
## 8) DATA ANALYSIS

**TABLE :1 SHOWING CAPITAL TURNOVER RATIO**  
(Rs in 000)

Years	Revenue	Capital Employed	Capital Employed Turnover Ratio
2008-09	310,925,484	117,206,7076	0.27
2009-10	257,069,331	145,881,9345	0.18
2010-11	259,740,528	164,644,9215	0.16
2011-12	335,426,522	200,567,7641	0.17
2012-13	400,755,969	212,042,9698	0.19

(Source: Annual Reports of ICICI Bank Ltd)

**GRAPH: 1**



### **INTERPRETATION:**

Table 1 shows the capital turnover ratio for the study period. It showed an increasing trend from the year 2010-11 to 2012-13. It represented that, there was an improvement in the capital employed.

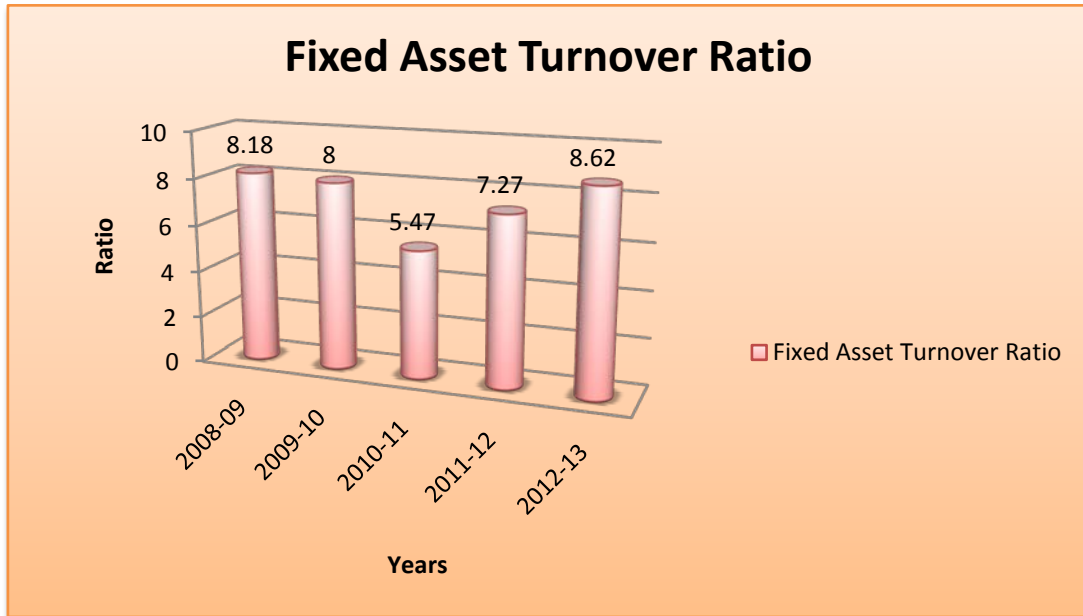
**TABLE: 2 SHOWING FIXED ASSET TURNOVER RATIO**  
(Rs in 000)

Years	Revenue	Fixed Asset	Fixed Asset Turnover Ratio
2008-09	310,925,484	38016209	8.18
2009-10	257,069,331	32126899	8.00
2010-11	259,740,528	47442551	5.47
2011-12	335,426,522	46146870	7.27
2012-13	400,755,969	46470587	8.62

(Source: Annual Reports of ICICI Bank Ltd)



GRAPH: 2



**INTERPRETATION:**

A higher ratio is the indicator off over trading of fixed assets, while a low reveals ideal capacity in ICICI. From the table 2 is seen that, the fixed asset turnover ratio is volatile during study period. In the year 2010-11 was showed there was no optimal utilization of fixed assets since the ratio is lowest compared to other years. The highest ratio in the year 2012-13 is 8.62 times.

**TABLE: 3 SHOWING TOTAL ASSET TURNOVER RATIO**

(Rs in 000)

Years	Revenue	Total Asset	Total Asset Turnover Ratio
2008-09	310,925,484	3793009623	0.08
2009-10	257,069,331	3633997151	0.07
2010-11	259,740,528	4062336688	0.06
2011-12	335,426,522	4736470902	0.07
2012-13	400,755,969	5367946811	0.07

(Source: Annual Reports of ICICI Bank Ltd)

**INTERPRETATION:**

Lower the Total assets turnover ratio, the performance is less advice versa table 3 showed the decreasing trend of total assets turnover ratioduring the study period with small fluctuations. The total assets turnover is less than 1 during the study period showed that the company is not utilized total assets.



**TABLE:4 SHOWING CURRENT ASSET TURNOVER RATIO**

(Rs in 000)

Years	Net Revenue	Current Asset	Current Asset Turnover Ratio
2008-09	386,962,755	2,724,410,334	0.14
2009-10	331,845,831	2,392,942,247	0.14
2010-11	326,219,453	2,668,034,507	0.12
2011-12	410,454,120	3,094,723,602	0.13
2012-13	484,212,981	3,607,540,231	0.13

(Source: Annual Reports of ICICI Bank Ltd)

**INTERPRETATION:**

The ratio should be high as far as possible is indication of favorable trend in the form of increase in sales with lesser current assets. It is inferred from the above table 4 that current assets turnover ratio for the years 2008-09 to 2012-13 are 0.14, 0.14, 0.12, 0.13 and 0.13 respectively. In the years 2008-09 it is recorded the highest point i.e., 0.14 times when compared to previous years. It reveals that the company performed well in the year 2012-13 and the firm is maintaining same trend in current asset turnover during the study period.

**TABLE:5 SHOWING CASH TURNOVER RATIO**

(Rs in 000)

Years	Net Revenue	Cash	Cash Turnover Ratio
2008-09	386,962,755	175,363,342	2.21
2009-10	331,845,831	275,142,920	1.21
2010-11	326,219,453	209,069,703	1.56
2011-12	410,454,120	204,612,935	2.01
2012-13	484,212,981	190,527,309	2.54

(Source: Annual Reports of ICICI Bank Ltd)

**INTERPRETATION:**

The standard or ideal cash turnover ratio is 10:1. It indicates the effective utilization of cash resources of the company from the above table5 found that, the company had not satisfied cash turnover ratio during study period. From the year 2009-10 to 2012-13 cash turnover ratio has been increasing gradually from 1.21 to 2.54 and which was less than the standard ratio. It is inferred that the company had to maintain more cash balance during the study period.



**TABLE: 6 SHOWING CURRENT RATIO**

(Rs in 000)

Years	Current Assets	Current Liabilities	Current Ratio
2008-09	2,724,410,334	437,464,298	6.23
2009-10	2,392,942,247	155,011,834	15.44
2010-11	2,668,034,507	159,863,467	16.69
2011-12	3,094,723,602	175,769,846	17.61
2012-13	3,607,540,231	321,336,021	11.23

(Source: Annual Reports of ICICI Bank Ltd)

**INTERPRETATION:**

Table 6 shows the current ratio for the study period. The company had recorded the increasing trend in current ratio during study period. But the first years 2008-09 was having low current ratio and from 2009-10 to 2010-11 the company had satisfactory ratio, during the study period and maintained sufficient current assets to meet the current assets up to standards. The company had maintained the good condition in the last year during the study period.

**TABLE:7 SHOWING NET PROFIT RATIO**

(Rs in 000)

Years	Net Profit	Net Revenue	Net Profit Ratio
2008-09	61,944,491	386,962,755	16.01
2009-10	68,346,339	331,845,831	20.60
2010-11	86,157,569	326,219,453	26.41
2011-12	114,834,409	410,454,120	27.98
2012-13	153,797,050	484,212,981	31.76

(Source: Annual Reports of ICICI Bank Ltd)

**INTERPRETATION:**

From the table 7 it is identified that there was an consistent increase in the net profit from the year 2008-09 to 2012-13. The Net profit ratio was high in the year 2012-13, which indicates that the company has performed well compared previous years. The profit showing 31.76 which shows the company has set up good position during the study period.





**TABLE:8 SHOWING CURRENT ASSET TO FIXED ASSET RATIO**

(Rs in 000)

Years	Current Asset	Fixed Asset	Current Asset to Fixed Asset Ratio
2008-09	2,724,410,334	38,016,209	71.66
2009-10	2,392,942,247	32,126,899	74.48
2010-11	2,668,034,507	47,442,551	56.24
2011-12	3,094,723,602	46,146,870	67.06
2012-13	3,607,540,231	46,470,587	77.63

(Source: Annual Reports of ICICI Bank Ltd)

**INTERPRETATION:**

Table 8 showed the Current assets to Fixed assets turnover for the study period from 2008-09 to 2012-13 is 71.66, 74.48, 56.24, 67.06 and 77.63 respectively. It was having sufficient current assets to run the banking business.

**HYPOTHESIS 1:**

**Null Hypothesis:** There is no actual correlation between Deposits and Advances of ICICI.

**Alternative hypothesis:** There is a correlation between Deposits and Advances of ICICI.

**INTERPRETATION:**

Null Hypothesis is Rejected as APPENDIX-1 Pearson Correlation is 0.986, and  $p = 0.002$  ( $p < 0.05$ ) at confidence level of 0.01. Since  $p < 0.05$ , indicates there is high positive correlation between Advances and Deposits. Hence **Alternative hypothesis** is accepted.

**HYPOTHESIS 2:**

**Null Hypothesis:** There is no actual correlation between Income and Expenditure of ICICI.

**Alternative hypothesis:** There is a correlation between Income and Expenditure of ICICI.

**INTERPRETATION:**

Null Hypothesis is Rejected as APPENDIX-2 Pearson Correlation is 0.916, and  $p = 0.029$  ( $p < 0.05$ ) at confidence level of 0.01. Since  $p < 0.05$ , indicates there is high positive correlation between Income and Expenditure. Hence **Alternative hypothesis** is accepted.

**HYPOTHESIS 3:**

**Null Hypothesis:** There is no actual correlation between Current Assets and Current Liabilities of ICICI.

**Alternative hypothesis:** There is correlation between Current Assets and Current Liabilities of ICICI.



#### **INTERPRETATION:**

Null Hypothesis is not Rejected as APPENDIX-3 Pearson Correlation is 0.307, and  $p = 0.616$  ( $p > 0.05$ ) at confidence level of 0.01. Since  $p > 0.05$ , indicates there is weak positive correlation between Current assets and Current liabilities. Hence **Null hypothesis** is accepted.

#### **HYPOTHESIS 4:**

**Null Hypothesis:** There is no actual correlation between Income and Profit of ICICI.

**Alternative hypothesis:** There is a correlation between Income and Profit of ICICI.

#### **INTERPRETATION:**

Null Hypothesis is Rejected as APPENDIX-4 Pearson Correlation is 0.893, and  $p = 0.041$  ( $p < 0.05$ ) at confidence level of 0.01. Since  $p < 0.05$ , indicates there is high positive correlation between Income and Profit. Hence **Alternative hypothesis** is accepted.

#### **HYPOTHESIS 5:**

**Null Hypothesis:** There is no actual correlation between Barrowings and Investments of ICICI.

**Alternative hypothesis:** There is a correlation between Barrowings and Investments of ICICI.

#### **INTERPRETATION:**

Null Hypothesis is Rejected as APPENDIX-5 Pearson Correlation is 0.993, and  $p = 0.001$  ( $p < 0.05$ ) at confidence level of 0.01. Since  $p < 0.05$ , indicates there is high positive correlation between Advances and Deposits. Hence **Alternative hypothesis** is accepted.

### **9) FINDINGS:**

- Capital turnover ratio of the company was satisfactory.
- The fixed asset turnover ratio tends to increase every year. From 2010-11 to 2012-13 this shows there is optimal utilization of fixed assets. The highest ratio in the year 2012-13 is 8.62 times.
- The current asset ratio has been in the increasing trend from the year 2011-12 to 2012-13 which shows the company has satisfactory level in managing current asset.
- The cash ratio has not been maintained according to the standard, the cash has been maintained less than the standard which indicates that company should maintain more cash balance.



- The current was maintained less in the year 2008-09 and later the company has been increased during the year 2009-10 to 2012-13 which shows that the company has maintained current asset more than the standard by this company maintained good position of current ratio.
- The net profit has been maintained in the increasing rate which shows that the company has performing well during the study period.
- The current asset to fixed assets has been maintained in satisfactory position which indicates that company has been maintained the standard to run the banking business.
- The fixed assets during the year 2008-09 was Rs 1,068,599,289 thousands it had been increased to Rs 1,760,406,580 thousands which indicate the investment had been made in the land, buildings and other assets, the investment has also made in opening new branches.
- The reserve and surplus during the year 2008-09 was Rs 484,197,292 thousands it has been raised to Rs 655,523,227 thousands which indicates the increased in the funds of the company.

#### **10) SUGGESTIONS:**

- It can be noticed that there is considerable increase in the growth of urban banking, hence it is suggested to expand over the rural banking which increases the company income and also expands the operating network.
- There should be increase in the amount of contribution to the reserve and surplus in order to maintain sound financial position of the company.
- There should be taken better management towards current assets and current liabilities which indicating week positive correlation.
- The cash has not been maintained according to standard ratio hence it is suggested that cash should be maintained as per the standard ratio.
- The net profit shows the increasing rate from all the year, which can be used for further development and expansion in rural banking.



## **11) CONCLUSION:**

From the study it is clear that ICICI looks forward to generate a more favorable service in the near future. The balance sheet of the company has been consistent and gives a hint of growth and expansion. The company is expected to increase its profitability by a higher margin through various ways to contribute to the development of the industry and economy. The initiative taken by the bank to serve the various segments of the society is very helpful in developing a better environment for the business.

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**APPENDIX-1**

Correlations			
		Deposits	Advances
<b>Deposits</b>	Pearson Correlation	1	.986**
	Sig. (2-tailed)		.002
	N	5	5
<b>Advances</b>	Pearson Correlation	.986**	1
	Sig. (2-tailed)	.002	
	N	5	5

\*\* . Correlation is significant at the 0.01 level (2-tailed).

**APPENDIX-2**

Correlations			
		Income	Expenditure
<b>Income</b>	Pearson Correlation	1	.916*
	Sig. (2-tailed)		.029
	N	5	5
<b>Expenditure</b>	Pearson Correlation	.916*	1
	Sig. (2-tailed)	.029	
	N	5	5

\*. Correlation is significant at the 0.05 level (2-tailed).



**APPENDIX-3**

Correlations			
		Current assets	Current liabilities
<b>Current assets</b>	Pearson Correlation	1	.307
	Sig. (2-tailed)		.616
	N	5	5
<b>Current liabilities</b>	Pearson Correlation	.307	1
	Sig. (2-tailed)	.616	
	N	5	5

**APPENDIX-4**

Correlations			
		Income	Profit
<b>Income</b>	Pearson Correlation	1	.893*
	Sig. (2-tailed)		.041
	N	5	5
<b>Profit</b>	Pearson Correlation	.893*	1
	Sig. (2-tailed)	.041	
	N	5	5

\*. Correlation is significant at the 0.05 level (2-tailed).

**APPENDIX-5**

Correlations			
		Barrowings	Investments
<b>Barrowings</b>	Pearson Correlation	1	.993**
	Sig. (2-tailed)		.001
	N	5	5
<b>Investments</b>	Pearson Correlation	.993**	1
	Sig. (2-tailed)	.001	
	N	5	5

\*\* . Correlation is significant at the 0.01 level (2-tailed).