Index of Financial Inclusion in Ahmednagar District (M.S.)

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Abstract

Financial inclusion has various dimensions like penetration, availability and usage. If we calculate these dimensions individually, it provides only partial information. In order to get a clear picture of extent of financial inclusion in various talukas of the district, a need for Index on Financial Inclusion was felt. IFI incorporates information about several dimensions of financial inclusion such as penetration of financial system, availability of financial services and usage of financial system. Major benefit of this index is that it is comparable across talukas. This comparison will help to determine the extent of financial inclusion in various talukas of Ahmednagar district, rank them according to the extent and then find out possible reasons and solution for exclusion.

An index has values between 0 and 1. 0 indicates complete financial exclusion and 1 indicates complete financial inclusion. For the purpose of study two banks- Central bank of India and Ahmednagar District Credit Co-operative Banks operating in Ahmednagar district are taken up for the study.

KEYWORDS: Index, Financial Inclusion (IFI), Availability, Usage, Access.

Introduction:

In the words of Mahatma Gandhi, "Just as the Universe is contained in the self, so is India contained in villages." Despite witnessing substantial progress in financial sector reforms in India, it is disheartening to note that nearly half of rural household's even today do not have access to any source of funds institutional or otherwise. The growth spree of 21st century has left some people behind the time. Handful of populace is languishing in the vicious circle of poverty and has been cast aside from the formal sources of financing. For economic growth, the *Aam Aadmi* should be dragged into the mainstream of growth. This is because poverty anywhere is a grave threat to prosperity somewhere. Hence it is necessary that each and every individual should be provided with affordable institutional financial services called "financial inclusion."

The concept of financial inclusion is not coined recently. In fact inclusive growth has been an important objective since 1991. About 238 million people in India live below the poverty line with the per capita income of less than one dollar per day1. The policy makers and practioners who have been trying to improve the lives of these poor and fight against poverty. This got reflected in the successive five-year plans, which had the objectives of 'growth with equality' and 'social justice'. Inclusive growth is not possible without finance and hence financial inclusion is important. The concept came into limelight from the philosophy of Grameen Bank put forward by Prof. Muhammad Yunus. Also the topic is much talked about this day as it has been mentioned int he budget as an important objective. According to Late Mr.C.K.Prahalad "the success lies with those

companies who see poor as their customer." This itself means inclusion. Hence it is time to move from Class banking to Mass banking.

Objective:

To study the extent of taluka level financial inclusion in Ahmednagar District

Methodology:

The study is based on primary data collected by the researcher by visiting Head Office of Central Bank of India (CBI), Ahmednagar and ADCC Bank, Ahmednagar and also by using secondary data collected from various books, working papers and journals.

Index of financial Inclusion- Methodology:

In this study an attempt has been made to calculate Index of Financial Inclusion (IFI) in various talukas of Ahemdnagar District. A multidimensional approach is followed for calculation of an index of Financial Inclusion which is similar to that used by Mandira Sarma.

First, the entire dimension index for each dimension of financial inclusion (availability, usage and penetration) is calculated. The IFI is then measured by the distance of this dimension index from an ideal point i.e., 1. The following formula is used for the calculation of the dimension index d_i for the ith dimension-

$$d_i = w_i \frac{Ai - mi}{Mi - mi}$$

where, w_i = weight attached to dimension i, $0 \leq w_i \leq 1$; Ai = actual value of dimension i, Mi = upper limit of dimension I, mi = lower limit of dimension i

By using the above formula, we can ensure that $0 \leq d_i \leq w_i$. higher the value of d_i, higher is a taluka's achievement in dimension i.

Once the dimensions are calculated, the IFI can be calculated by the following formula-

$$IFI = 1 - \frac{\sqrt{(wi - di)2 + (w2 - di2) \pm - - - - - + (wn - dn)}}{\sqrt{w1 + w2 + - - - + wn}}$$

In this study, researcher has followed a simple case where all dimensions are considered equally important and hence a common weight 1 is followed for all the dimensions. Hence, in this study, the formula IFI is-

$$IFI = 1 - \frac{\sqrt{(1 - di)2 + (1 - di2) \pm - - - - - + (1 - dn)}}{\sqrt{n}}$$

For calculation of above index, three dimensions are calculated:

Dimension 1: Banking Penetration: Banking penetration helps to find out "Size" of the banked population. This is indicated by number of bank accounts per 1000 adult population

Dimension 2: Availability of Banking System: Availability of banking system indicates the extent of the banking system's spread. This is indicated by number of bank branches per 100000 adult population.

Dimension 3: Usage of the Financial System: Usage of financial system indicates how much the banking system has been used by its users. This is indicated by the size of bank credit and bank deposits relative to the GDP.

The maximum value of this index is 1, which represents complete financial inclusion.

Depending on the value of the IFI, talukas are placed in one of the following three categories:

IFI Score	Level of Financial Inclusion
$0.5 \leq IFI \leq 1$	High Financial Inclusion
$0.3 \leq IFI \leq 0.5$	Medium Financial Inclusion
$0.0 \leq IFI \leq 0.3$	Low Financial Inclusion

Dimension wise index of Financial Inclusion score of talukas of Ahmednagar District is as follows:

Dimension 1:

Table 1: Availability of Bank branches of ADCC and CBI

Talukas	2014		2015	
	ADCC	CBI	ADCC	CBI
Ahmednagar	0.07	0.25	0.06	0.23
Akole	0.01	1.09	0.01	0.86
Jamkhed	0.52	1.3	0.53	1.25
Karjat	0.61	0.37	0.61	1.44
Kopargaon	0.22	0.41	0.22	0.36
Nevasa	0.81	0	0.8	0
Parner	1	0.84	1	0.69
Pathardi	0.7	1	0.7	0.86
Rahata	0.3	0.75	0.3	0.6
Rahuri	0.61	0.12	0.6	0.1
Sangamner	0.26	0.36	0.25	0.2
Shevgaon	0.82	0.65	0.82	0.6
Shrigonda	0.99	1.18	0.99	0.93
Shrirampur	0	0.34	1.44	0.32

Source: Calculated by using Bank's official data and Census Report, 2011

From the above table, it can be observed that:

1. Availability dimension of ADCC bank in Parner taluka is highest in both the years and that of CBI is highest in Karjat taluka in 2015
2. Availability of CBI has gobe down in shrigonda in 2015 due to closure of few bank branches.

3. Availability of bank branches of ADCC has shown a rising trend in Shrigonda and Shrirampur.

Dimension 2:

Table 2: Access to Bank branches of ADCC and CBI

Talukas	2014		2015	
	ADCC	CBI	ADCC	CBI
Ahmednagar	0	1	0.01	0.89
Akole	0.44	0.37	0.42	0
Jamkhed	0.02	0.45	0	0.07
Karjat	0.26	0.62	0.24	0.23
Kopargaon	0.46	0.44	0.44	0.56
Nevasa	0.48	0	0.54	0.28
Parner	1	1	1	0.97
Pathardi	0.3	0.61	0.29	0.22
Rahata	0.17	0.84	0.15	1
Rahuri	0.8	0.77	0.8	0.53
Sangamner	0.76	0.97	0.75	0.82
Shevgaon	0.7	0.9	0.69	0.49
Shrigonda	0.3	0.44	0.28	0.15
Shrirampur	0.08	0.58	0.05	0.47

Source: Calculated by using Bank's official data and Census Report, 2011

From the above table, it can be observed that:

1. Access dimension of ADCC has consistently shown the lowest performance in all the talukas. While in case of CBI a rising trend is seen in Rahata and Kopargaon.
2. Talukas such as Akole and Jamkhed have shown a falling trend.

Dimension 3:

Table 3: Usage- ADCC and CBI

Talukas	2014		2015	
	ADCC	CBI	ADCC	CBI
Ahmednagar	0.59	0.16	0.7	0.09
Akole	0.11	0.23	0.14	0.13
Jamkhed	0.01	0.17	0.1	0.1
Karjat	0.07	0.14	0.22	0.08
Kopargaon	0.37	0.19	0.48	0.11
Nevasa	0.84	0.41	0.99	0.24
Parner	0.07	0	0.2	0
Pathardi	0.48	0.31	0.51	0.18
Rahata	0.1	0.63	0	0.36
Rahuri	0.86	0.12	0.66	0.07
Sangamner	0.26	1.11	0.36	0.63

Shevgaon	0.46	0.5	0.42	0.28
Shrigonda	1	0.27	1	0.15
Shrirampur	0	0.68	0.14	0.38

Source: Calculated by using Bank's official data and Census Report, 2011

From the above table, it can be observed that:

1. There has been a rising trend in terms of usage dimension of ADCC in Jamkhed. While in all other talukas a mixed trend has been observed.
2. There has been a mixed trend in terms of usage dimension of CBI in almost all the talukas. None of the taluka has shown a consistent rise or consistent fall in terms of usage.
3. It can be concluded that even though access can be ensured by mandates of RBI, the quality parameters of access may be compromised in the process. This is evidenced from the low usage of the accounts.

Taluka Level Index of Financial Inclusion:

The following table shows taluka wise index of financial inclusion of ADCC bank and CBI of all the talukas of Ahmednagar district. Financial inclusion drive started in Ahmednagar district in the year 2007. Since then the progress of inclusion has been impressive. There has been rising trend in terms of inclusive growth in most of the districts since 2007. But none of the districts has achieved 100 per cent inclusion.

Table 4: Talukawise IFI Score of ADCC and CBI

Talukas	ADCC				CBI			
	2014		2015		2014		2015	
	IFI	Rank	IFI	Rank	IFI	Rank	IFI	Rank
Ahmednagar	0.18	10	0.19	10	0.41	9	0.33	6
Akole	0.17	12	0.17	12	0.42	5	0.26	11
Jamkhed	0.15	13	0.18	11	0.45	3	0.31	9
Karjat	0.28	9	0.33	9	0.42	5	0.36	4
Kopargaon	0.34	8	0.37	8	0.36	10	0.38	3
Nevasa	0.67	2	0.71	1	0.03	14	0.12	14
Parner	0.46	6	0.54	5	0.85	1	0.82	1
Pathardi	0.47	5	0.47	6	0.46	2	0.33	6
Rahata	0.18	10	0.14	13	0.42	5	0.40	2
Rahuri	0.73	1	0.68	2	0.36	10	0.31	9
Sangamner	0.38	7	0.41	7	0.31	12	0.25	12
Shevgaon	0.63	3	0.61	3	0.43	4	0.35	5
Shrigonda	0.60	4	0.58	4	0.42	5	0.32	8
Shrirampur	0.02	14	0.06	14	0.28	13	0.25	12

Source: Calculated by using Bank's official data and Census Report, 2011

From the above table, it can be observed that:

1. It can be seen that in case of ADCC Bank AKole, Karjat, Parner, Sangamner, Shrirampur and Kopargaon have shown a consistent rank throughout the study period.
2. Jamkhed has shown an improvement in terms of financial inclusion compared to 2014, its rank been shifted two positions upwards. Similarly the rank of Newasa has shifted upward and has reached 1st position in case of ADCC bank.
3. In case of CBI, Parner and Newasa have shown a consistent rank throughout the study period. Rest all other talukas have shown great variation in terms of IFI.
4. As compared to ranks of 2014, the ranks of talukas such as Ahmednagar, Karjat, Kopargaon, Rahata, Rahuri and Shrirampur have improved.

Conclusion:

So far financial inclusion index has been calculated at macro level. Hence, researcher has attempted to calculate IFI at micro level, i.e., taluka level. Two banks were taken up for the purpose of study- Central Bank of India (CBI) and Ahmednagar District Credit CO-operative Bank (ADCC). The level of financial inclusion reached in district is satisfactory still there is a long way to go to achieve 100 per cent financial inclusion.

References:

1. A. P. J. Abdul Kalam (2011), 'Target Three Billion: Innovative Solutions Towards Sustainable Development', Penguin Books
2. A. Rajmani Singh (2013), 'Financial Inclusion for Inclusive Growth', Concept Publishing Co.
3. Sarma Mandira (2008), 'Index of Financial Inclusion', working paper 215, Indian Council for Research on International Economic Relations (ICRIER), www.icrier.org