Financial Inclusion in India Through Pradhan Mantri Jan Dhan Yojana: An Empirical Analysis of Statistical Evidence

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Abstract

Pradhan Mantri Jan Dhan Yojana (PMJDY) is one of the remarkable steps taken by the present Government of India towards financial inclusion. Through this policy, Reserve Bank of India relaxed banks' KYC norms and also extended zero balance facility along with accidental insurance facility on opening the saving bank account. However, merely opening the bank account is not effective financial inclusion unless a customer becomes financially literate and starts using different financial instruments like deposits or credit facility regularly. The aim of this study was to firstly investigate the spread of bank branches with respect to credit and deposits. Secondly, the study aimed to identify responsible factors leading to significant changes in deposits and credit disbursement, and thirdly, the study explored the efforts taken by banks for spreading financial literacy. Regression analysis model and Pair t-test were adopted to analyze the effectiveness of bank branches and interview responses of bank managers were also analyzed to ascertain the qualitative efforts made by banks for spreading financial literacy. After analysis, it was found that after implementation of the policy, the credit disbursement by banks and deposits in banks increased. The number of zero balance bank accounts opened in PMDJY, and the low efforts made by banks for spreading financial literacy are threats for this scheme and for increasing financial inclusion in India, which need to be taken care of at policy levels.

Keywords: Financial inclusion, financial literacy, Pradhan Mantri Jan Dhan Yojana, commercial banks

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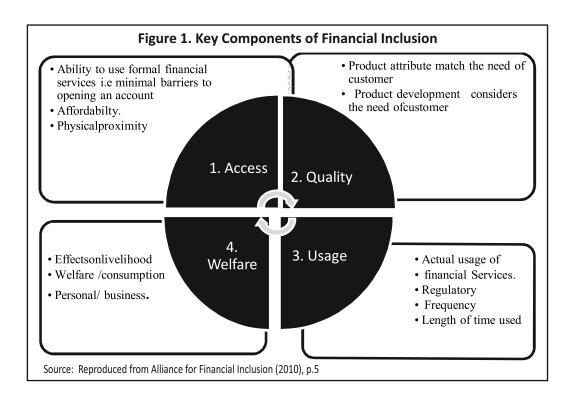
inancial inclusion can be defined as providing financial products and services to those people who are actually excluded. Some authors have defined financial inclusion as financial welfare of underprivileged people. Financial inclusion by itself is a multidimensional term. The components of financial inclusion are:

(i) Access: This component of financial inclusion highlights availability of financial services and products from organized institutions. This component helps to measure availability of basic services like bank branches, bank accounts, and reach of financial services. Through this component, policy makers can analyze the effectiveness of

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banking services and pattern of saving and deposits. As per Figure 1, it is clear that ability, affordability, and physical proximity are the main ingredients of access.

- (ii) Quality: It helps to measure the suitability of financial products for consumers. As given in the Figure 1, products should be designed in way to incorporate the needs of the customers.
- (iii) Usage: The Figure 1 depicts that the term is basically concerned with financial products' usage and frequency. Through this component, policy makers can analyze different barriers which create hurdle in financial inclusion. This component also helps to motivate individuals for financial inclusion.
- (iv) Welfare: Last but not the least, this component, as given in the Figure 1, helps to highlight the financial welfare of the marginalized people of the society.

Introduction to Pradhan Mantri Jan Dhan Yojana (PMJDY)

Under the mission of financial inclusion, Prime Minister of India, Shri Narendra Modi announced the Pradhan Mantri Jan Dhan Yojana on August 15, 2014. Formally, the scheme was launched on August 28, 2014 across the country with the development policy of 'Sabka Saath, Sabka Vikas'. PMJDY is a National Mission on Financial Inclusion encompassing an integrated approach to bring about comprehensive financial inclusion of all the households in the country. The plan envisages universal access to banking facilities with at least one basic banking account for every household, financial literacy, access to credit, insurance and pension facility. In addition, the beneficiaries would get Rupay debit card having inbuilt accident insurance cover of ₹ 1 lakh (Department of Financial Services, Ministry of Finance, n.d. a).

- (1) Basic Features of the Policy: The members will benefit from a range of financial products. As a first step, every account holder gets a Rupay debit card with a ₹ 1,00,000/- accident cover, life insurance cover of ₹ 30,000, after six months of satisfactory operation of bank account, an overdraft facility upto ₹ 5000/- is available in only one account per household, preferably in the name of the lady of the household. In addition, further pension scheme and other benefits will be added (Department of Financial Services, Ministry of Finance, n.d.b).
- (2) Pradhan Mantri Jan Dhan Yojana Implementation Phases:
- (i) Phase I (15 August 2014 to 14 August 2015): Open bank account, and provide Rupay credit card and inbuilt accident insurance cover of ₹1 lakh.
- (ii) Phase II (15 August 2015 14 August 2018) : Provide overdraft facility up to ₹ 5000/- after six months of satisfactory operation. Creation of Credit Guarantee Fund for coverage of defaults in A/Cs with overdraft limit up to ₹5,000/- and provide pension benefits (Department of Financial Services, Ministry of Finance, n.d. b.).
- (iii) Current Status of Financial Inclusion: Towards financial inclusion, different steps have been taken by the Government of India, Reserve Bank of India, and other financial entities. The Table 1 indicates various measures

Table 1. Major Steps Taken for Financial Inclusion

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Nationalization of banks	1969, 1980					
Establishment of Regional Rural Banks(RRBs)	1975, 1976					
Service area approach	1989					
Self help group bank linkage program	1989,1990					
Entry of Private banks	1994-95,2003-04,2013-14					
Pradhan Mantri Jan Dhan Yojana	28 August 2014					

Table 2. Progresses in Financial Inclusion Over Years from 2010 to 2013

SR.	Particular	Year Ended (million)	Year Ended (million)	Year Ended (million)	Year Ended (million)	Progress (million)
		March 2010	March 2010	March 2011	March 2012	April 2010- March 2013
1	Banking Outlets -Rural Branches	33378	34811	37471	40845	7467
2	Banking Outlets -BCs	34174	80802	141136	221341	187167
3	Banking Outlets -other modes	142	595	3146	8424	8282
4	Banking Outlets- Total	67694	116208	181753	270610	202916
5	Urban Location covered through -BCs	447	3771	5891	27124	26677
6	BSBD accounts (No. in Lakh)	734.53	1047.59	1385.04	1833.30	1098.77
7	OD facility availed in					
	BSBD ACCOUNTD (No. in lakh)	1.83	6.06	27.05	39.29	37.59
8	KCCs(N. in lakh)	243.07	271.12	302.35	337.87	82.43
9	GCC(No. in Lakh)	13.87	16.99	21.08	36.29	22.28
10	BC- ICT Accounts (No. in lakh)	132.65	316.30	573.01	810.38	677.73
11	ICT Accounts - BC-Total					
	transactions (No. in lakh)	265.15	841.64	1410.93	2546.51	4799.08

Source: Reserve Bank of India (2013)

Table 3. Select Indicators of Financial Inclusion: A Cross-country Comparison

Country	Number branches per (0.1 million adult)	Number of ATMs (per 0.1milion adults)	Bank Loan or credit	Bank deposits As per cent of GDP
India	10.64	8.90	51.75	68.43
Australia	29.61	166.92	128.75	107.10
Brazil	46.15	119.63	40.28	53.26
France	41.58	109.80	42.85	34.77
Mexico	14.86	45.77	18.81	22.65
United States	35.43	-	46.83	57.75
Korea	18.80	-	90.65	80.82
Philippines	8.07	17.70	21.39	41.93

Source: Reserve Bank of India (2012)

taken by the Government of India to strengthen financial inclusion and to increase the outreach. The Table 2 focuses upon different parameters to measure the level and progress of financial inclusion in India. As per the data given in the Table 2, it is clear that during the stipulated period, the growth is very attractive regarding financial inclusion in India. The Table 3 depicts that India is at the second place in terms of bank deposits after Korea due to the fact that Indians are great savers. The concern for India is regarding the number of branches, which are very less, despite the huge population. On the basis of the Tables, it is identified that the following demand and supply indicators are very important to measure the depth of financial inclusion in India:

Demand Side Indicators: Bank branches, ATMs, and bank loans or credit.

Supply Side Indicators: Deposits & savings of clients.

The above indicators and data show level of financial inclusion in India in comparison to other developed countries. This gap in financial exclusion needs to be fullfilled in a phased manner and PMJDY is one of the important steps towards financial inclusion.

Review of Literature

United Nations (2006) defined financial inclusion as a proper delivery of financial services to under privileged people of the society and Union Budget (2007-2008) also defined financial inclusion as a process through which it can be ensured that all financial services are available for poor people at a reasonable cost. However, Leeladhar (2005) said that financial inclusion can be categorized on the basis of degree of usage of financial products and services.

The Planning Commission (2009) highlighted that financial inclusion does not imply only opening a bank account, it includes usage of all available benefits of all financial services like insurance benefit, pension, and health insurance. Mohan (2006) discussed that if once a bank account of a client is opened, then it itself motivates the client to use other financial services; so, opening a bank account is an important step for financial inclusion. Ghosh (2007) discussed how branches of post offices and micro finance institutions can participate in financial inclusion. He suggested in his study that post offices and microfinance companies can fullfill the gap of financial inclusion of our country. According to Committee for Financial Sector Reforms (Raghuram Committee, 2008), the measurement of financial inclusion can be gauged by collecting data regarding how many branches exist with respect to the total population of the country.

Ravichandran and Alkhathlan (2009) highlighted different factors which affect the usage of financial services. According to them, the demand side factors are lack of alertness, low incomes, social exclusion and illiteracy, and the supply side factors are low penetration of bank branches, high transaction costs, and lengthy documentation processes, and so forth. Thingalaya, Moodithaya, and Shetty (2010) explained in his study that measurement of financial inclusion should be based on area specific conditions. Rachana (2011) stated that low expansion of financial inclusion in an economy is an opportunity for commercial banks to expand their businesses. Sumanthy (2013) highlighted the importance of financial inclusion and stated that inclusive growth cannot be achieved without the inclusion of poor and marginalized people of the economy in the financial framework. So there is need of serious efforts for financial inclusion.

Bhuvaneshwari and Pushpalatha (2013) stated that financial inclusion is important for reducing the exploitation of cunning money lenders, especially in rural areas. The authors also highlighted the importance of social banking through which a wide geographical area can be covered because in India, social banking exists in the form of cooperatives. Khuntia (2014) discussed that due to relaxation in KYC norms as well as other relaxations in the Pradhan Mantri Jan Dhan Yojana (PMJDY), underprivileged people will be able to open bank accounts. Patnaik, Satpathy, and Supkar (2014) discussed in their paper that PMJDY will bring remarkable changes in the area of financial inclusion, and people would receive access to proper banking services, which would subsequently help in economic development.

Skey Importance of Financial Inclusion: An underdeveloped financial system creates hurdles in different economic activities and strong financial system support is required for the inclusive growth of the economy (Reserve Bank of India, 2006). Through financial inclusion, proper delivery of credit facility will be helpful to provide financial resources to business entrepreneurs that will lead to the financial development of the economy (Mohan, 2006). According to Honohan (2008), financial inclusion alone is not the catalyst for development of the economy, but it is a most important factor which contributes in the development of the economy. Due to the contribution of financial inclusion in economic development, it is an important area of concern for policymakers (Kelkar, 2008). The importance of financial inclusion is not only for the country as a whole, but it also contributes for betterment in life of an individual through savings, deposits, as well through many other financial products and services (Chanana, 2007). Financial untouchability restricts people from accessing formal financial products that lead to their exploitation because people avail informal financial resources like local money lenders as in India, still, most of the population accesses informal sources of financial products. So, there is a need of strong efforts for elevation of financial untouchability (Verma & Garg, 2016).

Research Methodology

(1) Research Question

- (i) What is the key milestone of Pradhan Mantri Jan-Dhan Yojana that will lead to financial inclusion?
- (ii) Is the Pradhan Mantri Jan-Dhan Yojana an inclusive approach of socioeconomic empowerment?
- (iii) Will this Pradhan Mantri Jan-Dhan Yojana help in leading to financial literacy?

(2) Research Objective

- (i) To assess the effectiveness of Pradhan Mantri Jan Dhan Yojana (PMJDY) to improve financial inclusion.
- (ii) To evaluate critically the banking penetration achieved so far through Pradhan Mantri Jan Dhan Yojana.
- (iii) To analyze the problem and prospects of banking sector towards financial inclusion.
- (iv) To assess the existing banking services penetration and its effectiveness.
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Table 4. Collection of Primary Data for Structured Interviews

Phase	Period	Area	Responded	Sample size
1	January 1st Week 2015	Soraon ,Phaphamau Malaka Shivgarh in Allahabad District	Bank Branch Managers and Assistant Managers	10
2	February 1st week	Naini, Karchnna, Meza in Allahabad District	Bank Branch Managers and Assistant Managers	10
3	March 1st week	Handia,Hanumanganj and Saidabad in Allahabad District	Bank Branch Managers and Assistant Managers	10

(3) Research Plan

(i) Research Design: Experimental research deign before and after without control group.

The scheme was launched on August 28, 2014 and we would like to ascertain the impact of financial inclusion. Therefore, for the purpose of knowing the impact of the policy, we have taken the data before the launch of the scheme and after the launch of the scheme with an aim to analyze the change in financial inclusion pattern due to the said scheme (PMJDY). Experimental research design is the suitable research design in case of analyzing the particular treatment scheme on a group with or without the control group.

- (ii) Finite Population: For this study, the universe regarding institutional financing in India is finite in nature. However, we have selected some scheduled commercial banks.
- (iii) **Data Collection:** Secondary data of scheduled commercial bank deposits has been compiled for the period of seven months before the launch of the scheme and seven months after the launch of the scheme.
- **(iv) Sampling Method Purposive Sampling :** Primary data was taken from those banking personnel who were involved in this scheme either directly or indirectly.
- **(v) Sources of Data :** Secondary data from RBI monthly reports, Reports of Ministry of Finance, different periodical reports of PMJDY, and structured interviews of bank employees are the data sources.

Data Analysis and Results

(i) Regression Models: The regression equation is written as Y = a + bX + eY is the value of the dependent variable (Y), what is being predicted or explained as a or Alpha, a constant, which equals the value of Y when the value of X = 0b or Beta, the coefficient of X; the slope of the regression line; how much Y changes for each one-unit change in X.

$$1^{st}$$
 Model is $D = a + bBO + e(1)$

X is the value of the independent variable (X), what is predicting or explaining the value of Y. So here, (Y) is the dependent variable deposits (D), a is constant, b changes, and X is commercial bank branches (BO).

$$2^{\text{nd}}$$
 Model is $C = a + bBO + e$ (2)

X is the value of the independent variable (X), what is predicting or explaining the value of Y. So here, (Y) is the dependent variable credit c, a is constant, b is change, X is commercial bank branches (BO).

The following research hypotheses have been taken as the assumptions:

\$\to\$ H01: There is no significant relation between deposits and number of bank branches of commercial banks.

\$\to\$ HO2: There is no significant relation between credits and number of bank branches of commercial banks.

\$\,\begin{align*}\,\begin{alig implementation of Pradhan Mantri Jan Dhan Yojana.

The dependent variables are: Deposits of commercial banks, credit disbursed by commercial banks, and financial inclusion. The independent variables are: number of branches of commercial banks, zero balance accounts.

The number of bank branches and deposit variables were identified from the Report on Trend and Progress of Banking in India, Reserve Bank of India 2011-12. In the review, most of studies focused on welfare and components like SHGs and avoided quality and usage components; so, for different observations, the basis credit disbursed by commercial banks and zero balance accounts have been taken because these variables are important to adopt a holistic vision of financial inclusion. When PMJDY was started, the percentage of zero balance accounts was very high, which posed threats for this policy, but this trend declined after six months. Hence, there is a significant relation between deposits and number of bank branches of commercial banks. The Table 5 indicates deposits, credit disbursed, and number of commercial bank branches.

\$\to\$ H01: There is no significant relation between deposits and number of bank branches of commercial banks.

The Table 6 indicates R and R square values. R explains simple correlation, and the value is 0.995, which indicates a high degree of correlation between bank branches of commercial banks and bank deposits that clearly indicate that if bank branches will increase, then bank deposits will also increase, R square explains how much of the total variation is present in the dependent variable, Deposits, which can be explained by the independent variable, bank branches. In this, model is 0.999 (99%) and adjusted R^2 value is 0.988 (98%), which is very high. Here, the effects of bank branches on deposits could be explained properly. Sig F change is less than 0.5 at the significance level of 5 \%, which indicates that an increase or decrease in bank branches would affect deposits.

The Table 7 indicates that ANOVA (F test) is used to test the overall validity of the model or to test if any of the explanatory variables is having a linear relationship with the response variable. In this model, the sig value is less than 0.5 at a significance level of 5% which shows that the model is valid and (statistically) significantly predicts

Table 5. Data Regarding Bank Branches, Deposits, and Credit Disbursed

Year	Deposits (million)	Credit (million)	Number of Commercial Banks Offices
2006	21090.49	15070.77	69471
2007	21090.49	19311.89	71839
2008	21090.49	23619.14	76050
2009	21090.49	27755.49	80547
2010	21090.49	32447.88	85393
2011	21090.49	39420.82	90263
2012	21090.49	46118.52	98330
2013	21090.49	53931.58	105437
2014	21090.49	61390.45	117280

Source: Reserve Bank of India (2015)

Table 6. Model Summary^b (Regression Analysis between Number of Bank Branches and Deposits)

Model	R	R Square	Adjusted R	Std. Error of	Ch	Change Statistics				Durbin-
			Square	the Estimate	R Square Change	F Change	df1	df2	Sig. F Change	Watson
1	.995°	.990	.988	2127.08822	.990	681.742	1	7	.000	1.255

a. Predictors: (Constant), Number of branches of Commercial Banks

Significance level: .05

Table 7. ANOVAb

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	3.085E9	1	3.085E9	681.742	.000ª
	Residual	3.167E7	7	4524504.301		
	Total	3.116E9	8			

a. Predictors: (Constant), Number of branches of Commercial Banks

Significance level: .05

the outcome of the variable (normally called it is a good fit for the data), which implies that the relation of bank braches and deposits have a significant linear relationship. Hence, the H01 is rejected.

\$\to\$ H02: There is no significant relation between credit disbursed and number of bank branches of commercial banks.

The Table 8 indicates R and R square values. R explains simple correlation, and the value is 0.995, which indicates a high degree of correlation between bank branches of commercial banks and credit, that clearly indicates that if bank branches will increase, then credit disbursed will also increase. The R square explains how much of the total variation in the dependent variable, credit can be explained by the independent variable, bank branches. In this, model 0.991(99%) and adjusted R^2 value is 0.980 (98%), which is very high. Here, the effects of bank branches on credit could be explained properly. The Sig F change is less than 0.5 at significance level of 5%, which indicates that an increase or decrease in bank branches would affect credit disbursement by banks.

The Table 9 indicates that in this case, multiple linear regression analysis (ANOVA) (F test) is used to test the overall validity of the model. If any of the explanatory variables is having a linear relationship with the response variable in this model, the sig. value is less than 0.5 at a significance level of 5 % which shows that the model is valid and (statistically) significantly predicts the outcome of the variable (normally called it is a good fit for the data). It explains that the relation of bank branches and credit has a significant linear relationship. Hence, the hypothesis H02 is rejected.

Table 8. Model Summary (Regression Analysis between Number of Bank Branches and Credit

Model	R	R Square	Adjusted R	Std. Error of	Change Statistics				Durbin-	
			Square	the Estimate	R Square Change	F Change	df1	df2	Sig. F Change	Watson
1	.996°	.991	.990	1583.53366	.991	801.748	1	7	.000	1.608

Significance level: .05

b. Dependent Variable: Deposits of Commercial Banks

b. Dependent Variable: Deposits of Commercial Banks

a. Predictors: (Constant), Number of branches of Commercial Banks

b. Dependent Variable: Credit disbursed by Commercial Banks

Table 9. ANOVAb

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	2.010E9	1	2.010E9	801.748	.000ª
	Residual	1.755E7	7	2507578.844		
	Total	2.028E9	8			

Significance level: .05

\$\to\$ H03: There is no significant relationship between bank deposits of residents in commercial banks and implementation of Pradhan Mantri Jan Dhan Yojana.

The Table 10 is categorized by data of deposits by Indian residents in commercial banks during six months before implementation of PMJDY and six months after implementation of the scheme.

To understand the effectiveness of this policy, the deposits data of residents in commercial banks taken seven months before the implementation and after the implementation of the Pradhan Mantri Jan Dhan Yojana are analyzed. The Table 11 indicates that the mean value for Deposits before the policy implementation is 7.8919, standard deviation is 1788.93, and mean value of Deposits of the policy after the implementation of the scheme is 8.5976 and standard deviation is 2568.81042, which shows that there is a difference, which shows the relevancy and there is a positive variation, which show the positive impact of PMJDY scheme.

The Table 12 shows the correlation analysis. The value of correlation is 0.972, which is high and shows a positive correlation between pre and post policy deposits. As can be inferred from the Table 13, the sig value is less than 0.5 at degrees of freedom 5%; so statistically, the data is significant, and the hypothesis H03 is rejected,

Table 10. Deposits in Commercial Banks: Pre Policy Months and Post Policy Months

Month	Pre policy	Month	Post -policy(million)
Jan-14	76,341.7	Sep-14	82,001.8
Feb-14	76,842.3	14-Oct	83,034.4
Mar-14	78,268.6	14-Nov	86,144.7
Apr-14	79,549.6	Dec-14	86,443.6
May-14	80,252.6	23-Jan	87,198.0
Jun-14	80,440.7	Feb-15	87,952.9
Jul-14	80,744.7	Mar-15	89,057.0

Source: Reserve Bank of India. (n.d.).

Table 11. Pair T-Test Analysis of Deposits of Residents in Commercial Banks: Pre **Policy Months and Post Policy Months**

	Paired Samples Statistics									
		Mean	N	Std. Deviation	Std. Error Mean					
Pair 1	Deposits Before the Policy	7.8919E4	7	1788.93207	676.15277					
	Deposits After the Policy	8.5976E4	7	2568.81042	970.91908					

a. Predictors: (Constant), Number of branches of Commercial Banks

b. Dependent Variable: Credit disbursed by Commercial Banks

Table 12. Correlation Analysis of Deposits in Commercial Banks: Pre Policy Months and Post Policy Months

	N	Correlation	Sig.
Pair 1Deposits Before the Policy & Deposits After the Policy	7	.972	.000

Note: calculated by SPSS Version 1

Table 13. Pair T-Test Between Deposits Before Policy Launch and Deposits After Policy Launch

Paired Differences												
	95% Confidence Interval of the Difference											
	Mean	Std. Deviation	Std. Error Mea	n		t	df	Sig. (2-tailed)				
				Lower	Upper							
Deposits Before												
the Policy -												
Deposits After												
the Policy	-7.05614E	3 930.41575	351.66410	-7916.63391	-6195.65180	-20.065	6	.000				

Significance level: .05

which reveals that after implementation of the policy, the deposits made by residents in commercial banks increased.

(ii) Trend Analysis of Zero Balance Accounts which were Opened During PMJDY: The Table 14 presents the overall progress as on April 03, 2015 regarding number of accounts opened, number of Rupay debit cards issued, balances in A/c (in ₹), and number of accounts with zero balance. It is interpreted that despite a decreasing trend, large number of accounts with zero balance is the key issue before the policy makers.

There is a six-months open data of accounts opened in PMJDY to analyze the trend of zero balance accounts because there are provisions of No frill accounts, but actually, only opening a bank account does not imply financial inclusion. It is clear from the data available from PMJDY website that in the starting month, zero balance accounts were opened in huge numbers in all banks in regions where rural conditions are very poor. However, this trend of zero balance account decreased from 81.49% to 60.98%, which shows that the effectiveness of this policy towards financial inclusion improved, but was not at a satisfactory level because still, as on March 31, 2015, the number of zero balance accounts was 60.98%, which is not satisfactory because ultimately, the goal of financial inclusion should promote the use of financial instruments. These zero balance accounts are threats for the banking system. Hence, policy makers should take steps to resolve the zero balance accounts.

Structured Telephonic Interviews

(i) Interview Questions

\$\text{\text{What is your plan for financial literacy of clients?}}

\$\text{How many financial awareness programs have been conducted during PMJDY 1st phase? If financial awareness programs have been conducted, then what was the outcome? and if no, then what is the reason behind this?

\$\text{How is financial literacy a win - win policy for banks and clients?}

Table 14. Progress Report in Opening Bank Accounts

	Rural	Urban	Total Number	Number Of	Balance In	No Of Accounts	
	(No. of A/c)	(No. of A/c)	Of Accounts	Rupay Debit Card	Accounts(In Lacs)	With Zero Balance	
Public Sector Bank	62535017	52909928	115444945	108110088	1218505.25	66182945	
Rural Regional Bank	21711030	3900824	25611854	17822870	257711.10	15616869	
Private Banks	3598756	2507924	6106680	5549767	90813.06	3413520	
Grand Total	87844803	59318676	147163479	131482725	1567029.41	85213334	

Source: Department of Financial Services, Ministry of Finance. (n.d.c).

(ii) Interpretation of Answers

As per the telephonic interviews, most of the bank employees responded that there was no plan for financial literacy; basically, they conducted the campaign for opening bank accounts in which banks did canopy activities, so these activities are related to financial inclusion, not financial literacy. So, it can concluded that banks did not make any efforts for imparting financial literacy among the people.

During the PMJDY 1st phase, the government advertised about the lucrative advantages of this policy which motivated the people to come to the bank branches and achieved a milestone Guinness Book of World Record for opening 18,096,130 bank accounts in one week (23 - 29 August, 2014).

Lack of awareness about financial products is a major factor for financial exclusion. Financial literacy among clients helps them to avail smooth banking services and it also helps bank employees to provide smooth banking service processes.

Findings and Discussion

- \$\forall \text{ If bank branches of commercial banks increase, then deposits in commercial banks also increase. So reach of bank branches is one of the essential factors of financial inclusion (Agrawal, Sahoo, & Dash, 2009).
- Bank branches also positively affect credit disbursed by commercial banks. The banking system can effectively disburse credit through the penetration of bank branches.
- Deposits after policy implementation had increased, which shows the positive impact on deposits. It can be inferred that if bank accounts of people are opened, then that will improve savings and deposits.
- Initially, the percentage of zero bank accounts was very high, but after six months of launch of the policy, the trend decreased, but still, 60.98% accounts opened were zero balance accounts, which is a threat and needs to be tackled for the successful implementation of the policy.
- \$\footnote{\text{Financial literacy is one of the important pillars of financial inclusion. Without financial literacy, the status of financial inclusion cannot improve, but as observed from the interviews with bank personnel, policy efforts of banks for spreading financial literacy were not satisfactory.

Implications and Conclusion

Expansion of bank branches will increase deposits. It will help the poor to manage volatility in cash. Research on developing countries in South Asia and India has proved that availability of bank branches has a positive impact

on accessing financial instruments like savings and deposits. Therefore, expansion and infrastructural development should also be an important parameter to achieve sound financial inclusion.

- The number of bank branches also positively affect the availability of credit facility for the people. Increment in organized credit facilities will be helpful to reduce the unorganized sources of money like local moneylenders, etc., which would be helpful in reducing exploitation of poor people because normally, poor people borrow money from unorganized sources of credit. Poor people would also be benefited from insurance facility given in these bank accounts - the amount of ₹ 1 lakh may be small amount, but it is a good amount for poor people who are unable to save such an amount for unforeseen situations like death and disability.
- Awareness about financial products and making people financially literate are important aspects towards financial inclusion because ultimately, good financial inclusion is only possible if people are financially literate, then only demand side (people and clients) defects can be eliminated.
- \$\text{Status of deposits after pre & post analysis show a significant improvement, which reveals that PMJDY increased the depth of financial inclusion. These deposits and savings would be helpful to improve the socioeconomic status of the whole economy as well as of the marginalized people of the society.
- \$\text{ Credit facility will be helpful in entrepreneurship to those people who want run their businesses.}

Recommendations and Suggestions

- So, post-offices have a good reach in remote areas in comparison to bank branches. So, post offices can be used to solve the problem of bank offices. In this policy, post offices also can be integrated with banks for implementation of the policy at a large scale.
- \$\text{\text{Effective direct transfer benefit (DBT) can solve the problem of zero balance accounts.}
- \$\text{The constraints of expansion of banking offices and infrastructure can be solved through effective banking correspondents model implementation. The model of Brazil can be examined as banking services delivery depends on BCs in Brazil.

\$For financial literacy, there is a need of implementation of a village, block, and ward level or district level financial literacy program in a phased manner to make awareness regarding financial products.

Limitations of Study and Scope for Further Research

This study is confined only to an analysis of increase/ decrease in responsible factors towards financial inclusion with respect to PMDJY. The impact study is a short run analysis only because the before and after period is less than one year. The primary data is subject to bias response of the respondents and is confined to Allahabad district

This study may act as a critical review for future research regarding analyzing the impact of the scheme on a national level. Further, this study will be helpful to those researchers who would like to measure the intensity /degree of financial inclusion.

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