Chapter 2
REVIEW OF LITERATURE

The Review of literature has been studied into eight sections. It also revealed the potential gaps that have been considered in the present study. These sections are categories in the following way:

- Financial inclusion and economic growth
- Studies related to financial awareness
- Studies related to financial accessibility
- Role of technology in promoting financial inclusion
- Impact on socio-economic status
- Rural based studies
- Summary of review

2.1 Financial Inclusion and Economic Growth

The International Monetary Fund (IMF) has released a series of Financial Access Surveys (FAS). The FAS has been conducted annually with the financial aid provided by the Netherlands, the Bills & Gates Foundation, and International Development Agency of Australia. FAS is the worldwide supply side source data collected from the resident households and non-financial organisations on the access to, and usage of main consumer financial services across countries. Studies revealed that the importance of access issues for the overall development of the economy is to expanding the accessibility to the formal financial services remains a main challenge to grab the attention of social scientists and policymakers (Beck & Demirguc-Kunt, 2008).Financial inclusion is useful to facilitate inclusive growth in India where large section of society is not able to actively participate in financial system.

The world most wide-ranging Global Findex Database measuring financial inclusion covering 150000 people from more than 140 countries, providing an inclusive data on how individuals are managing their risks, saving and borrowing money and making payments. As compare to 2011, the percent of world adult population has been up
from 51 to 62. The data between 2011 to 2014 shows that 700 million adults worldwide became account holders (Kunt A.-D. , Klapper, Singer, & Oudheusden, 2014).

Now a day, the main strategies opted to promote the financial inclusion is penetration of banking industry in unbanked areas and backward areas through facilitating the intermediaries such as non-profit organizations (NGO), micro-finance institutions and agents in form of business correspondents (BC). In addition to this, Gwalani and Parkhi (2014) have mentioned different models used by the government and non-government bodies to provide the financial and banking services to all section of the society whether residing in the urban, rural and metro-centers by adopting the integrated approach. However, these models are lead bank scheme, correspondent banking, and mobile banking and micro-financing model. In addition to this, the study was also concluded that the way to make financial system inclusive is to take over the co-operatives banks (Gwalani & Parkhi, 2014). Apart from these models, Self-Help Group-Bank Linkage Programme has been introduced to serve the poor households (Dev, 2006).

The more emphasis is made on the technology to extend the reach of financial inclusion. Access to safe, affordable and easy credit and other formal financial services by vulnerable groups and disadvantaged areas is recognized as a precondition to speed up growth and reducing poverty and income inequalities. Financial inclusion is not only the philanthropic activity to meet legal obligations but also the opportunity for the business on a large scale because still more than 140 million rural households are unbanked under organized financial system (Bansal S. , 2011; Bansal S. , 2014). The priority sector lending by banks and financial sector reforms has a positive and significant impact on the inclusive growth (Swamy, 2010). The developed countries were able to achieve high financial penetration without any subsidy because they have adopted brilliant social, regulatory and legal institutions lowering the cost to financial service providers and better transport facilities, technology and high population density results in less physical distance to point of service and hence which mean lowering non-priced costs to the customer. (Honohan & King, 2009).
There are two approaches in financial inclusion. First, the supply side mechanism and other one demand side elements of financial inclusion. The supply side related with giving advisory services to the poor, training support to the borrowers and also bring changes in the attitude of the banking industry personnel. With regard this, provision of capacity building and infrastructure is also important. The several factors includes in the demand side of the financial inclusion are the low productivity, poor market conditions, risk involved with agriculture activity and no risk alleviation system to deal with it and non-friendly market for marginal farmers to sell what they produce (Dasgupta, 2009).

From the supply side, the various attempts has been made to measure the financial inclusion by using the available information. But, these efforts could not analyze the full picture about financial inclusion. There is need to be done from the consumer perspective, specifically from the small enterprises and low-income households which can be measured by the demand side of financial inclusion because supply side data covers only the prevalence of financial services in financial market and it is provided by central banks or regulatory bodies on the number of accounts and ATMs across country but not give enough detail to provide how access and usage of formal financial services which varies by region, income level, literacy and other variables or tell us about why individuals do or do not use formal financial services. (Triki & Issa, 2013).

A multidimensional index of financial inclusion focused on the three main basic dimensions such as banking penetration, availability of banking services and the usage of these banking services. In India, the index of financial inclusion is 0.2 which is low (i.e. range of index values varies from 0 to 1, in which 0 indicates complete financial exclusion and 1 indicates complete financial inclusion) (Mandira, Index of Financial Inclusion, 2008). This index is further used for the cross-country empirical analysis to see the relationship between financial inclusion and development. Results showed that as the level of income is higher, the level of financial inclusion also increases both at country and individual level. The study also revealed that income inequality had an inverse impact on the financial inclusion because the Gini-coefficient (It indicates the income inequality) found to be negative. However, the study concluded that to make our societies totally financial inclusive the attempts are required such as reduce the income inequality, promote financial literacy and improvement is needed in the communication infrastructure whereas interest rate sound not associated with financial inclusion(Mandira & Jesmin, 2008).
A high level of committee on financial inclusion headed by C. Rangarajan would also considered wide range of financial products and services, including microfinance and insurance products should be available and to get maximum out of these services consumer education also as important as availability to stimulate demand for the same (Ali, 2012). The two major aspects which plays an important in economy growth. First, social banking played an important role to nurture the level of financial inclusion. Second, the overall economic development which is measured on the basis of state per capita income is significantly linked with the level of financial inclusion of the state (Chakravarty & Pal, 2013). The case of Andhra Pradesh” finding suggested that the success of financial inclusion requires an approach that is localized and also dependent on the customization of products and services, rather than the present approach that attempt to centralize and standardize the whole process. Here, banks have to look at efforts to expand financial inclusion by considering it as a long term investment in the future (Ananth & Oncu, 2013). Beck, Kunt and Peria (2007) developed new index of barriers around the world by using information provided by 209 banks in 62 countries. The authors documented the level of barriers are concern with the three main banking services which involves savings, borrowings and remittance services through three parameters (i.e. Physical access, eligibility and affordability) in 58 countries by conducting the survey of 193 banks. The characteristics of these parameters in context to various services are following:

### 2.1.1 Deposit Services
- Physical access (Location of the bank where customers open an account),
- Eligibility (Documents required to open an account)
- And affordability (How much balance is required to open a saving account and checking account).

These services include all types of deposits such as saving deposits, fixed short term and long term deposits, transferable deposits and sight deposits (Amidzic, Massara, & Mialou, 2014)

### 2.1.2 Credit Services
- Physical access (Location to submit the loan application).
- Eligibility (number of days the bank takes to process the loan application).
- Affordability (minimum amount for consumer loan to GDP Per capita, for SME Loans).
2.1.3 Payment Services

The main parameters to measure the payment services is the affordability which is related to the cost of transfer money internationally and the fees implied on the use of ATMs cards. Apart from above mentioned parameters, strict requirements of documents and long processing time to get faster loan can exclude the households to avail banking services. In the same way, the size of bank, ownership pattern in banking and the degree of competition, openness and transparency and regulatory framework are the suggestive evidence creating the variation among the barriers of banking services. (Beck, Demirguc-Kunt, & MSM, Banking Services for Everyone? Barriers to Bank Access and Use around the World, 2007)(Beck, Demirguc-Kunt, & MSM, , 2005).

2.2 Studies Related to Financial Awareness

In recent years, financial inclusion act as a war against the poverty not only in India but in more than sixty developing countries. The concept of financial inclusion is related to growth of vulnerable groups (i.e. low income people and weaker section groups) which are still not aware how to access financial services. Financial inclusion, therefore is a big integral part for the uplifting these above mentioned five categories. As a trend is moving towards globalization, liberalization and competitive market in a country like India, there is still up to 72% population that belongs to the rural areas. By taking this perspective into consideration, our banking and financial markets have undergone various reforms from last decades. Many reforms are taken to remove poverty. But still our banking and financial sector are underdeveloped to make the accessibility of financial services to the rural people at an affordable cost. The major area also has been identified on which public policies aim to satisfy rural needs These needs are generally divided into five main categories are (1)financial literacy,(2)women empowerment,(3) pensioners,(4) entrepreneur (5)and farmers. These five categories mainly belong from the tribal and rural areas.

Financial inclusion not only mean opening an account or providing financial access to the vulnerable people but it also implies the creation of awareness about the different financial products and services. Lack of financial literacy leads towards
the number of poor financial decisions. To make the right financial decision, individual should be financial literate. Therefore, worldwide governments are trying to make attempt to improve financial literacy level of their population. In many countries, the governments have already created national strategy to promote the financial education in order to provide learning opportunities to those individuals which usually has limited knowledge and skills to deal with financial intermediaries on matters of personal financial decisions. Financial literacy is an important connects which makes households able to take better financial decisions (Cole, Sampson, & Zia, 2009). There are several potential roles that government is playing to improve financial outcomes of the people. Firstly, the government has to solve public goods problems that leading towards underinvestment in financial education. Secondly, government has to regulate proper disclosure about product fees, terms and pricing linked with financial transactions. And finally, government would ensure that the information providing to general public is unbiased (Hasting, Madrian, & Skimmyhorn, 2013). Therefore, government engagement is also the key to ensure consumer protection and put legal weight to transparency. Financial education is an important tool to deal with equation of consumer protection so, that the consumers can carry out their roles and responsibilities. Informed consumers can make demands for institutions, create pressure for good customer support and they ensure clear contracts and transparent pricing (Cohen & Nelson, 2011). RBI has asked commercial banks to start promotional strategies by campaigns in all regions across the country to spread 100 percent financial inclusion. The results of these campaigns performed excellent in the states like Himachal Pradesh and Kerala with 100 percent financial inclusion (Baag & Kandpal, 2015).

Friedline and Rauktis (2014) mentioned in their study that Advisory Council on Financial Capability established by President which operates through US Department of Treasury to expand the basic financial services and to spread the knowledge to use these products. The Financial literacy and Education Commission under the same Treasury with aim to promote financial literacy (Friedline & Rauktis, Young People Are the Front Lines of Financial Inclusion: A Review of 45 Years of Research, 2014).

Research revealed that the level of financial literacy is very low in the developed as well as developing countries. The organization for Economic Co-operation and Development has defined financial literacy as, “A combination of
awareness, knowledge, skill, attitude and behavior necessary to make sound financial decisions and ultimately achieve individual financial wellbeing” (International Network on financial Education, 2016). To have good learning outcomes, a good quality of education is needed, which in turn leads to inclusive growth. In context to rural India, the quality of education in rural areas is very poor because the majority of children are still facing the constraint like parental illiteracy, poor infrastructure, poverty and lack of parental support. Generally, literacy refers to individual’s ability to read and write. In the broader sense, literacy consists of knowledge of words, symbols and arithmetic operations and then, how to use this knowledge in practical.

Sandra J. Huston (2010) has proposed an approach to measure financial literacy that is based on already defined concepts, methods and various empirical evidence from personal finance literature. The concept of financial literacy is based on two dimensions (i.e. Knowledge dimension and Application dimension). Knowledge dimension is related to financial knowledge which consists of stock of knowledge that has been acquired by person through education and experience particularly in term of personal finance concepts and products. Application dimension on the other hand related to applicability of acquired knowledge by confidently applying this knowledge related to personal finance concepts and products. Financial knowledge is an integral part of financial literacy because to mitigate financial problems that individuals and households face, there is need for creating financial education programmes which will further enhance financial literacy. (Huston, 2010). One of the study that is based on household dataset indicated that financial literacy and schooling are strongly positively associated with wealth accumulation (Behrman, Mitchell, Soo, & Brava, 2012). The awareness level of household also affected by demographic characteristics with respect to formal financial institutions. Campero and Kaiser (2013) found in their which was conducted in Mexico that schooling, type of employment and age of the households effect the awareness level of the households (Campero & Kaiser, Access to Credit: Awareness and Use of Formal and Informal Credit Insitutions, 2013). Results suggested that approximately there is equal level of achievement of education by gender and financial decision making is also approximately equal by gender. The financial awareness level of person is positive relative to the spouse (Fonseca, Mullen, Zamarro, & Zissimoulos, 2012).
The banking sector plays an important role in financial inclusion. The main objective of this financial inclusion is to give financial assistance to large number of groups that are excluded from the possibilities and services provided by the institutional players (like commercial banks, cooperative banks and others regional rural banks. In the rural areas where banking premises are missing, RBI has permitted all banks to appoint Business Correspondents as agents to facilitate baking services and at the same time special awareness should be conducted to ensure that all account holders are able to handle banking transactions (Ministry of Rural development Government of India, 2013). The first step to capture the accounts of disadvantage people there is need to create awareness and knowledge in their doorstep by providing them proper training. In addition to this, RBI has prepared a comprehensive Financial Literacy Guide for trainers containing material related to financial literacy and how to conduct financial literacy camps. The objective of this guide is to promoting financial awareness and educate layman on management of money, advantages of savings with banks, benefits of borrowing from banks and basic facilities provided by banks. The financial dairy has been prepared to allot the target audience with the purpose to empowering them to keep their income and expenditure which results in better financial planning (Reserve Bank of India, 2013). In the survey conducted by Cole, Sampson and Zia (2009) in India and Indonesia found that training programmes increased the share of opening an account among unbanked households by approximately 5 percent points (Cole, Sampson, & Zia, 2009).

Awareness regarding financial institutions, either formal or informal, is an essential for the proper use of financial services. From the demand side approach of financial inclusion, individuals could not ask for the loan from any organization until they don’t know about credit institutions. Due to less awareness about formal financial institutions, households are more participating in informal financial institutions. Loans from family and friends are considered main source of borrowings in case of emergency (Besley, 1995). On the other side, there is negative relationship between income and use of informal financial services. (Campero & Karen, Access to credit: Awareness and use of formal and informal credit institutions, 2013). Swamy (2014), studied the impact of financial inclusion on poor households in context of gender dimension. Results found that the awareness level of women were largely impacted by the financial inclusion programmes. Another study with purpose to investigate basic financial and product awareness among youth in Malaysia revealed
that the level of education influences the basic financial awareness regarding various products and services. Also, women were found to have a less level of financial awareness compared to men (Nga, Yong, & Sellappan, 2010).

2.3 Studies Related to Financial Accessibility

The concept of financial accessibility becomes important to examine in rural areas after the All-India Credit Survey that was held during 1950s. The outcomes of the survey revealed that poor households and marginal farmers are heavily relied to meet their credit needs on the money lenders in year 1951-1952. Access to finance refers to the availability of formal financial services at affordable costs. Better financial access leads economy to produce more and equal distribution of wealth and income. With poor accessibility to credit the opportunity of self-employment is reduced. As a result the poor community is doubly cursed. Hence, the ease to access to credit allows people with talent to get necessary resources to give practical shape to their ideas. In addition, the greater access to other financial services like savings, borrowings and other remittance services helps individual to secure themselves against the unexpected fluctuations of income (Basu, 2006). The supply-side indicators of financial system is not easy to document, and doesn’t accurately provide the exact measures of ease to access. Recently, the world bank have released the most comprehensive database on financial inclusion by taking interviews of 150,000 adults from 140 countries. This data has been showing a great progress in the expansion of the financial inclusion. The number of people having account has been increased by 700 million during period of 2011 to 2014.

The percentage of world’s adult population having account has been also increased by 11 percent because in 2011 the percent is 52 and in 2014 it is 62 percent (Kunt D., Klapper, Singer, & Oudheauden, 2015). Braverman and Guasch (1986) has mentioned that only 5 percent of farms in Africa and 15 percent farms in Latin America and Asia have had access to formal system to avail credit. Policies that were framed to provide credit to marginal farmers have benefited larger landholders by allocated huge credit to their accounts. This is because credit allocation policies of commercial banks and other specialized farm credit institutions tend to be based on the observable ability to provide collateral. Therefore, the marginal and small farmers are screened out and large landholders those having wealth got credit facilities
Traders and contract farming firm’s likely parties to become financial intermediaries to help farmers by lending money in exchange of process a farmer’s harvest. These parties also provide other services like technical assistance and farm input sales. The main characteristic of this type of lending is that in loan contract farmer need not to deposit any collateral similar like banks, they only need to give crop pledge. (Conning, 2007). Over the period of 1985-1999, in India there was 5 to 10 percent increase in agricultural lending by public banks during election years and private lending were crowd out. But this lending has dropped after election. It shows that politicians induce banks to write of loans at the time of elections (Cole S. A., 2004).

In one of speech given by Reserve Bank of India, Deputy Governor delivered that merely half of Indian Population doesn’t have access to formal financial services. Therefore, access to deposit and credit facilities and timely using other remittance facilities also equally important to boost financial inclusion (Ali, 2012). According to the RBI (Reserve Bank of India) Act, there is a provision under sec54 related to the rural credit and banking. A major mandatory initiative in this relation was taken with the sponsorship of All India Rural credit Survey in 1951-52. The accessibility to financial services in rural areas is limited in compare to urban areas. In villages the majority of people are taking money from local money lenders at higher rates as compare to bank rates which further make a poorer more poor. There is a strong need to make these people aware how to use banking and financial services in a satisfactory way that will reduce the difference between poor (Sangwan, 2014).

In India, around 41 percent of rural households have a bank accounts with formal financial network, wide difference exist between large and small famers with respect to access to formal financial services. Most deprived segment in terms of access to formal account is marginalized farmer households (Basu, 2006). As per the direction of RBI, basic banking with no frill accounts and low minimum balance, as well as with no charges were introduced to vast sections of the population. Upto June 2011, banks have opened outlets in 1.07 villages from just 54258 as on March 2010. Out of these, through bricks & mortar branches 22870 villages has been covered, 84274 through Business Correspondents (BC) outlets and 460 through other forms like mobile bans etc (Swamy, 2010). Due to financial inclusion programmes, the women are largely impacted and their access to instruments of economic progress is
also increased. (Swamy, Financial Inclusion Gender Dimension and Economic Impact on Poor Households, 2014).

2.4 Studies Related to Usage of Financial Services

Only having account ownership is not sufficient proper usage also matters. From the survey of 150000 people around the World, approximately 65 percent of world adults used their accounts at least thrice in a month, to save and make payments directly from account rest 1.3 billion adults are still paying through cash in developing countries. It has been found that only 26 percent of adults use their savings in case of financial crisis (Kunt A.-D., Klapper, Singer, & Oudheusden, 2014). Respondents from survey of Egypt bank customers shown that while using internet for banking transactions, lack of awareness and cost of hardware and internet connection may not be affordable excepting few socio-economic section of the society (Kamel & Hassan, 2003).

If we talk about the savings mobilization, commercial banks and state-funded institutions have not much mobilized savings in rural areas. The higher estimates upon savings came from farmers’ cooperative efforts chit funds, rotating savings and credit associations and other forms of forced savings programs (Braverman & Guasch, 1986). In the one of the survey based on household data from India and Indonesia, they have reported that 53 percent use bank account for security, 42 percent for fulfillment of future needs, 37 percent to transfer money and 31 percent said they use for emergency needs. Only half (54 percent) of household reported that they were saving in the banks and those who said “no”, the reason being they don’t have enough money and irregular income for savings (Cole, Sampson, & Zia, 2009).

In Gulbarga, Ramji, M (2009), highlighted some critical issues such as high transaction cost involves in operating a banks account, so there is a need to explore various other alternatives which would help to improve the financial accessibility to formal financial system for the weaker sections of the society. Access to bank doesn’t mean the usage, merely opening account without the training it simply results in increasing the cost to banking, so there call to promote the financial awareness and proper guidance to accompany the initiatives of financial inclusion drive (Ramji, 2009).
2.5 Role of Technology in Promoting Financial Inclusion

Indian banks have passed through by gigantic transformation over the past two and half decades. Since the 1990s, the working of banking industry has been completely changed by way of number of innovations as compare to traditional way of working. The race to compete with fast growing and competitive banking industry, banks has shifted to encourage new strategies by adopting innovative channels of distribution to delivery formal financial services in best suitable way. After invention of ICT (Information Communication and Technology) in the banking industry, the transaction becomes speedy, the error of omission and commission by the employees have reduced and banks are working in a more efficient way. Research reveals that how the ICT acting as a driving forces to extend the financial services in an innovative and accessible manner. Shashank Bansal (2014) in his study perspectives of technology in achieving financial inclusion in rural India defined how the financial excluded people get benefited with the use of ICT for sustainable and inclusive financial system. Further, the author also identified the various strategies adopted by the banks so that banks are able to bring the especially rural potential customers in the mainstream of the financial system by using data is accessed from the already work done and information also retrieved from the regulatory bodies like RBI and IMF. The results from the study highlights that various initiatives are taken by the RBI and other regulatory bodies to overcome from the problem financial accessibility, for an appropriate delivery of financial products that satisfy the financial need of weaker section of the society. Some of the banking technologies adapted to expansive formal financial sector such as mobile banking through GIS (Geographical Information System) and Global Positioning System, web based technology carries the details of every transactions held in a bank branches. The concept of Core banking solution works on the theory of anywhere, anytime-banking for the comfort of the customer (Bansal S., 2014). The author also recommends mobile phone is the key to extend the financial inclusion for the large unbanked population because more than 1.2 billion people, only 200 million people have access to the bank account whereas more than 811 million people have mobile phone. So, it is clear the mobile banking is less expensive tool to strengthen the availability of financial services; it cut the infrastructural cost for the banks. The study also shows the contribution of electronic transaction has significantly increasing gradually than the transaction based on the
paper. The average of electronic transactions from 2008-11 is 87.3 percent as compare to the average of paper transactions is 12.7 (Bansal S., 2011).

H.K Singh and Amar E. Tigga in their article on impact of information technology on Indian Banking Services discussed about the bank transformation and information technology, Benefits of IT, major issues IT in banking services. The authors concluded in the study that the virtual banking system involves various ATMs (Automated Teller Machines), remote banking services, smart cards, internet banking etc. These virtual financial services are largely mentioned as below diagram:

**Figure 2.1: Classification of Virtual Financial Services**

![Virtual Financial Services Diagram](image)

Source: (Singh & Tigga, 2012).

2.5.1 ATMs: Cash withdraw facility, mini statement, deposit facilities and payments to third party etc.

2.5.2 Remote Banking Services: Recent balance enquiry, fund transfer facility to third party and between customers’ different accounts etc.

**Smart Cards:** Giving electronic purse facilities at National as well as International level, deposit and credit facilities, ATM cards and charge cards etc.

2.5.3 Internet Banking:

The importance of digital financial system, it opened a new platform to unlock the limited access to financial services. The adoption of technology in the formal financial system offerings convenient ways to make payments, save money and manage their financial needs. Digital payments are indeed in future at slower tempo but hoped in many places. Digital financial services allows the underprivileged people to help themselves and give support to each other for having access to formal financial services, through which they feel more connected within their communities.
and outside world to avail the wide range of online services by just having the access to technology (Mas & Porteous, 2014). The wealthy households enjoying the benefits of digital financial inclusion by making the cheap and easy to send and receive payments just only by one click of button but the poor and the weaker section of the society is suffering from the cost to make their financial transactions by dealing in the physical form. So, this makes the transactions more costly and inconvenient for them, which leads to inequalities in the financial lives of households. Thus, we need to build way which lowers the cost that enable poor people to convert their physical form of cash into the plastic money which also integrate the poor people with formal financial institutions to meet their financial needs in digital form (Radcliffe & Voorhies, 2012).

Digital financial inclusion gives the integrated platform through which the poor households will experience the benefits through the several channels which offers connected payments platforms, enhanced access to financial services (Digital Savings, credit and insurance services). In survey conducted in Punjab, the villagers wished to open an account in core banking system to acquire facilities related to ATMs, SMSs and online banking, 95 percent of villagers were aware of ATMs and 64 percent were aware SMSs (Sangwan, 2014). In developing countries, more than half a billion adults with an account pay school fees in cash and about 1.3 billion pay their utility bills in cash. So, there is large scope to shift these cash payments into digital payments to ensure easy, convenient and secure mechanism for sending and receiving payments at affordable cost (Kunt D., Klapper, Singer, & Oudheauden, 2015). Apart from above reason among the most states of Indian economy, the category of agriculture labor is most financially excluded. Thus, there is need to develop technology which take care the needs of migrant population also. In state like Andhra Pradesh, the technology is playing an important role to integrate financial inclusion with public schemes like National Rural Employemnt Guarantee Act (NREGA) by making payments of their earned wages through NREGA directly into worker’s bank accounts (Kamath, Mukherji, & Maria, 2010). Figures from household survey, where 491 households of Nanowal and Dhanola villages of Khamanon district of Punjab studied, it has found that the thrust of the financial inclusion plans of 2010-13 and the DBT which resulting in 51 percent males and 65 percent females has opened an account in April 2010 to September 2013 which shows increase if we relate these figures with the aril 2010- March 2013 i.e. 32 percent male and 35 percent female. The DBT is the most important factor promoting financial inclusion by giving
benefits of scholarship of students, LPG subsidy and social security pensions (Sangwan, 2014).

ICT acts as a magnificent tool to achieve sustainable and inclusive financial system. Mobile banking and ATM are two encouraging options to provide banking services to the rural people (Bansal S., 2011). Smart phones a piece of technology in the customer hands act as key to the financial inclusion because of its affordability (Mas & Porteous, 2014). The efforts for mobile banking has been accepted in different countries like South Africa, Indonesia, Thailand, Bangladesh and South Africa as an innovative and cost saving way for improving the financial reach in the backward areas. The idea of mobile banking involves extending the banking services to the rural people through the equipped mobile van (Kibaara, 2006). In Africa; mobile money has achieved great success. In the past 12 months 14 percent adults have used mobile money (Demirguc-Kunt & Klapper, 2013). In Sub-Saharan Africa, the mobile money and electronic payments are driving financial inclusion (Kunt A.-D., Klapper, Singer, & Oudheusden, 2014). In Egypt, technology evolution affected the delivery systems by adapting the technologies like ATMs, mobile banking, internet banking and electronic cash and how it replaces the traditional banking system especially focusing on the retail banking. To ensure the bank customers will use more and more technology-based delivery channels, trust have to build up. In a survey of Egypt bank customers, 70 percent customers felt that Egypt banks have provided them necessary support and assistance in terms of how to use different technology-based electronic delivery channels instead of traditional banking system. In a survey of 200 bank customers, trust and security is of highest priority, 47 percent of customer’s ranked trust as the most important feature while using electronic banking followed by 31 percent for easy use and 23 percent for usefulness (Kamel & Hassan, 2003).

RBI provided the detailed guidelines for the growth of internet banking in India. With regard to this the IT Act 2000, also highlights the legal recognition for the formation, transmission and the maintenance of the electronic data. To make the electronic data in safe hands the Institute for Development and Research in Banking Technology as a documentation authority for making digital signatures (Singh & Tigga, 2012).

### 2.6 Impact on Socio-Economic Status
Financial inclusion initiatives have played a significant contribution to steady economic growth since 1970s. The various aspects to study the socio economic status of rural households includes types of housing, landholding, education status, occupation, possession of assets, income, saving pattern, expenditure etc (Singh, et al., 2014) (Sarma, 2010). Based on the survey conducted at the household level panel data on demographics aspects, education, occupation, economic activities and income of households for El Salvador during 1995-2001, to study the effect of remittances on financial inclusion and to see effect of remittances on the growth of the economy, poverty, education, inequality and health. The results from the study reflect that the adult’s average education has a significant influence on the probability of getting loan. One side, the remittances services have a positive impact that household has a deposit account but on the other side remittances services have negative impact to request and receive loan from formal financial institution because remittances help to meet households credit needs, by reducing demand for credit (Anzotegui & Kunt-Demriguc, 2013).

Socio-economic characteristics still play an important role to facilitate young people’s saving through financial inclusion. Household income remains major predictors of saving outcomes (Friedline & Rauktis, Young People Are the Front Lines of Financial Inclusion: A Review of 45 Years of Research, 2014). Socio-economic development is used as an indicator to measure per capita economic growth in real terms. Socio-economic characteristics with reference to socio-economic welfare of citizens includes factor like health, education, social inclusion, gender equality, freedom, people’s democratic participation and investments in infrastructure, energy, science and technology (Jacobs & Slaus, 2010). Results from the study established that women use financial resources in such a way which improves their family well-being and also increased their household’s level of savings. Further, this increase is largely influenced their financial decision making (Swamy, Financial Inclusion Gender Dimension and Economic Impact on Poor Households, 2014).

Ray (2008) studied that socio-economic impact of Swarnojayanti Gram Swarozgar Yojana (SGSY) in Orissa. Women revealed that under SGSY, the membership of Self-Help Group (SHG) helped them to protect their part of income from men’s control and also increased their access to financial resources. Further, this membership enlarged their ability to raise fund on their own to raise emergency funds.
The household consumption pattern has also improved by 58 percent and the percentage of expansion of public networks and relationships also developed from 16 percent to 100 percent. Hence, the overall socio-economic impact empowered the women by making them self-independent in household’s decision making and increased their participation in financial and non-financial transactions (Ray, 2008).

2.7 Rural Based Studies

The mission of one of the World Bank Groups is to make this world poverty free in more than 145 client countries. As per the World Bank Staff estimates based on United Nations, the rural population of India has declined from 82 percent to 67 percent from the period of 1960-2016 (The World Bank Group, 2016). A large part of the poor population lives in rural areas and has a low education rate, mostly engaged in agriculture sector and among them maximum are under 18 years of age. Over past decades, reduction in poverty has been marked, as per recent estimates by World Bank in 2013, still 767 million people were on less than 1.90 US dollar a day compared to 881 million in 2012 and 1.85 billion in 1990 (Leary, 2016). In rural areas, poverty among agricultural labour is the highest in various occupational groups (Tewari, 2015). Therefore giving rise to a need to make such efforts which reduce the poverty as well as gender discrimination. To ensure the overall development, multitude of innovative programmes has been introduced by the government of the day to reduce poverty especially in rural areas. Asserts that rural development be likely to suffer if the banking system in rural areas do take an elastic approach to rural credit (Shivamaggi, 2000). One of the emerging models for rural financing in Kenya are Community Owned Rural Model, Government driven Rural Financing Model, Private Commercial Bank Led Model, Credit Guarantee- Input Supply Model and Beach Banking Model, by facing the problems like poor infrastructure, lack of regulatory and supervisory policies and management issues. The banks have given the feasible operating balance to maintain their deposit account, ease to open an account with no maintenance fees. With these efforts the number of bank accounts in Kenya has increased by 55 percent in 2006 as compare to 31 percent in 2005 and 20 percent in 2004. The rural households are basically willing in other financial services rather than only credit/loans and if avail loans that are of short term loans for dairy,

Enormous wide-ranging objectives have been made to fulfill the aim of rural development. These objectives include increasing agricultural productivity, bringing the optimal rate of new technology, reducing poverty, improving income distribution and increasing rural employment (Braverman & Guasch, 1986).

Yunus has discovered the Grameen Bank as a pilot project in 1976, and later it transformed into the first bank of the world to fight poverty in 1983 by started as revolution in the banking industry. Before Yunus, few organizations have provided the business loans to poor people but for the first time he initiated the idea to offer little loan starting from amount $40 and $60, over the time the amount would grew from hundreds to thousands of dollars in Bangladesh (Counts, 2008). In India, about 70 percent of population is residing in rural areas as per the Census of India’s 2011. Out of 121 crore Indians, 83.3 crore reside in rural area while 37.7 core live in urban areas. The distribution of rural-urban is 68.84 percent and 31.16 percent respectively (The Hindu, 2011). So, there is a need to understand which section of rural population in rural areas of among states are financially excluded (Kamath, Mukherji, & Maria, 2010).

Financial inclusion in rural areas faces several challenges from supply as well as demand side. The supply side challenges to the commercial banks during 1990s are contraction in the number of bank branches in the rural India, decline in the credit-deposit ratio for the rural people, and also political interventions in the loan waivers resulted in sickness in the formal rural credit intermediaries. There is need to address this problem of supply side to promote the financial inclusion at the grass roots levels. On the other hand, demand side hindering factors in the way of financial inclusion are the unskilled labors, low productivity and the poor connectivity with the market and low financial literacy (Dev, 2006).

Inclusive financial system facilitates the wide range of financial services which will protect the unbanked people from informal sources to avail credit, those charge high rate of interest and often deal through unethical recovery practices. One of the interview based study mentioned that there are various factors which are acting as a impeding to access bank loans by micro entrepreneurs and rural people with low
education are limited income in order to make settlements, limited assets to be used as collaterals, inconvenience and less confidence to interact with bank personal regarding paper work and documentation to avail credit facility (Gitaharie & Soelistianingsih, 2014). As compared to the banking interest rate the money lenders charging 2 percent more interest. The prevailing bank interest rate is near about 9 percent but the studies revealed that the money lenders are charging 11 percent interest rate (Dogra & Ghuman, 2008). There is a need of new wave which helps to make the formal financial sector reachable to the large population which is still depends on the informal financial sector. The reason behind people is still relying on their family and friends, and other source to get credit. Only 8 percent people are taken loan from the formal financial institution (2007-11) in rural India (Bansal S. , 2014). In all sub-regions of Africa, borrowing from family and friends is most popular. In the last 12 months, 39 percent of adults have borrowed money from family and friends and 28 percent reported that this is the only source for them to borrow money (Demirguc-Kunt & Klapper, 2013). If the financial institutions are able to tap these unbanked people mainly residing in the rural areas it would be the win-win situation for the financial institutions as well as people (Chandran, Financial Inclusion Strategies for Inclusive Growth in India, 2011).

Out of India’s total population, 60 percent of population occupation is agriculture. It agriculture provides work to the more than half of the population. If we discuss about the rural economy, the fact is 65 percent of population is engaged in agriculture sector (Aggarwal, 2016). The evidence shows that the high level of institutional finance served households those are self-employed in non-agriculture more rather than those who are self-employed in agriculture in terms of providing credit. To actively participate in agriculture, need for various financial activities emerges to purchase seeds, investing in irrigation and other equipment’s and other inputs before output of crop is realized (Kamath, Mukherji, & Maria, 2010) . Hence, to fulfill these financial needs Ghosh (2013) has pointed out number of strategies that must be regulated to fulfill the progressive goals of financial inclusion for the upliftment of the poor and small producers those who have running the small enterprises. The potential financial inclusion into formal financial system will require some form of subsidy as well innovative way on the behalf of central bank and regulatory framework, to ensure that the banking industry reach the financially
excluded groups such as low-income people, self-employed workers, small and medium enterprises, women and marginal farmers with less land or without land (Ghosh, 2013). Low income level, gender discrimination, remote location, low level of financial literacy, unskilled labors, low productivity and poor connectivity with the market are main reasons for their financial exclusion (Triki & Issa, 2013; Dev, 2006). Kaur and Vohtra (2014) also suggested that low level of financial awareness is a serious problem for women. Hence, financial literacy programmes are needed to improve the financial education for women (Kaur & Vohra, 2014). Microfinance in form of SHGs helped rural poor especially women more independent in investment decisions. In Orissa, the study of women SHGs revealed that their independent source of income has increased from 24 percent to 94 percent. Their participation in financial transactions and in household economic transactions has gone up by 100 percent (Ray, 2008).

A survey was conducted in two villages of Punjab and concluded that the small branches of the commercial banks is the best option to fulfill the goals of financial inclusion because 80 percent villagers wanted bank branch near to their homes and also willing to avail loan. The survey also exposed the purpose of opening accounts for multiple purposes such as normal banking, to get loan, or in order to get payments and other Direct Benefit Transfers (DBT) (Sangwan, 2014). Mahatma Gandhi Rural Employment Guarantee Act 2006 has also contributed in the expansion of financial inclusion and DBT among rural households by introduction of payment of wages in MGNREGA worker account in the bank or in post office. This transformation of payment system ruled out the financial exclusion. MGNREGA not only provided guarantee for employment but also facilitated financial inclusion among most disadvantage rural people (Kumari, 2017).

Though the existing literature covers certain significant areas of financial inclusion yet there remain certain unanswered questions such as:

- What is the present status of financial inclusion in India?
- The geographical (rural and urban) aspects of financial inclusion are not covered.
- The gender related aspects from index of financial inclusion are not measured.
- What is the satisfaction level of rural population with regard to financial inclusion?
• Government schemes attached with the bank account of rural locale have not been adhered completely.

• What are the various difficulties faced by rural households to avail optimum usage of the banking system?

• Main dimensions of financial inclusion i.e. Banking penetration, availability of banking services and utility of banking services are not critically observed.

Many possible variables had been studied by various indices in developed and developing countries, but still doesn’t considered into account variables like gender, people with disabilities, and other costs incurred with respect to travelling cost or transaction costs associated with banking transactions, particularly in rural areas (Arora R. U., 2010; Aggarwal, 2016; Aggarwal, 2016). Hence, review of literature provided logical base for framing of hypothesis in the present study which are given in chapter 3.