

Original Article

Green Banking: An Evolving Form of Sustainable Development in India

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Abstract: Green banking focuses on integrating the business and investment considerations of environmental factors with banking practices to facilitate environmentally friendly and sustainable development. It promotes sustainable development efforts through the use of environmentally friendly financial products and services to invest in a greener economy and achieve sustainable economic growth. The present study closely correlates the existing various Green Banking products and services provided in the Indian banking sector. The study, employing secondary data and a descriptive research technique, reveals that green banking in India is still at an initial stage where banks are slowly coming up with various environment-oriented financial products for customers. The sector, however, lacks a specific framework to ensure that these products are more appealing and adopted more broadly. The results indicate that improving consumer awareness is fundamental to the successful expansion and sustainability of green banking. Public awareness can be improved by mass media campaigns, newspapers, conferences and seminars to educate people about the importance of energy efficiency and environmental responsibility for future generations. Ultimately, socially responsible customers play a key role in expanding the market for green banking and promoting a sustainable economy.

Keywords: Green Banking, Sustainable Development, Customers.

I. INTRODUCTION

Green banking has emerged as an important strategy for promoting sustainable development and enhancing public awareness of environmental responsibility. It functions similarly to standard banking, but includes a social and environmental aspect in buying decisions, often also known as ethical banking. Ethical banks are created to fulfil the main goal of helping with environmental protection and sustainable behavior. These institutions operate similarly to traditional banks in terms of the regulatory architecture under which they function but have an enhanced focus on environmental and social impact as part of their day-to-day activities. Unlike conventional commercial banks, certain ethical or development-oriented green banking institutions may not rely primarily on public deposits and can instead be funded through government support, charitable organisations, or a combination of both.

A green bank, according to the Coalition of Green Capital, A green bank is a dedicated public or non-profit finance entity designed to drive capital into market gaps.

According to the OECD, a Green Bank is a specialised public, quasi-public, or non-profit financial institution established to encourage private investment in domestic low-carbon and climate-resilient infrastructure. By using public funds strategically, Green Banks help reduce investment risks, attract private capital, and support the development of environmentally sustainable projects, including renewable energy, energy efficiency, clean transportation, and climate adaptation initiatives. Their focus is on speeding the transition to a low-carbon economy while also bolstering resilience in terms of climate change.

Green banking is a process in which banks operate but have little or no negative impact on the natural environment. It emphasizes on the role of information technology (IT) to streamline all banking processes to be more efficient, effective and environmentally friendly. The scope of green banking is also dual, including internal and external aspects.

The internal component emphasizes energy-efficient banking operations and the use of contemporary technologies to facilitate further reduction in paper consumption; this is commonly referred to as branchless or lobby-free banking. Systems like RTGS, along with ATM statements and electronic fund transfers, are increasing customer convenience, decreasing the operational cost of financial institutions themselves & also adding to the overall efficiency and performance in decision-based banking.

The external part, in turn, means encouraging environmentally responsible practices among industrial and commercial clients, which is not just promoting sustainable behaviour in the banking sector. In line with this objective, banks increasingly prioritise financing environmentally friendly projects that comply with environmental regulations, including those that have obtained the necessary clearances, such as No Objection Certificates, from the State Pollution Control Boards in the States where the projects are to be established.



II. LITERATURE REVIEW

Azad and Samamlou (2016) studied the factors influencing green banking within a competitive market environment. The study identified five key determinants shaping green competitive strategy, namely green investment, green banking processes, green banking models, and competitive advantage in banking.

Bihari and Pandey (2015) researched the green banking practices in India, reporting that green banking is critically important for promoting environmental sustainability, conservation of natural resources, as well as making the planet a livable one. It was also noted that Indian banks are far behind in building and implementing green banking in comparison with most of the developing and developed nations. At the same time, however, it highlighted that proactive attempts are being made by Indian banks to educate customers on green banking practices and services.

The study of Jaya Dutta and Nitin (2017) focuses on green banking: opportunities, challenges, initiatives and prospects. Bank customers, as found in the study, are becoming more conscious about green banking practices, and they seem to adapt. Banks are also working toward making the Indian financial system in line with global standards, and green banking is among some of the business tools to reach this goal. But the report also pointed out that there are still several opportunities available to Indian banks which they can explore with regard to the evolution and implementation of green banking initiatives.

Sahoo, B., & Singh, R. (2016). An overview of challenges and prospects of green banking in India. The results of the study showed that the younger cohort was more likely to adopt green banking as compared to the middle-aged & the older groups, who are less informed.

Srilatha (2018) examined green banking in India and its future prospects. The study found that the concept is relatively new in the country; however, banks and the government are making ongoing efforts to raise awareness among citizens about this emerging financial practice and technology.

III. RELEVANCE OF THE STUDY

The study underscores the various initiatives undertaken in India under the framework of green banking, signifying a major shift towards sustainable development by embedding environmentally responsible and resource-efficient practices within the banking sector. With the gradual rise in public awareness regarding environmental degradation, climate change, and the need for sustainable development, financial institutions are increasingly integrating green banking principles into their operations and services. This transition not only aims to reduce the environmental footprint of banking activities but also seeks to align financial growth with ecological preservation and long-term sustainability objectives. Furthermore, green banking encourages the adoption of eco-friendly practices such as paperless transactions, digital banking services, energy-efficient banking infrastructure, and financing of environmentally sustainable projects. These initiatives collectively help reduce carbon emissions from traditional banking operations while promoting responsible consumption and production patterns. In this way, green banking plays a dual role in fostering economic development and protecting the environment, thereby supporting the broader goal of sustainable and inclusive national growth.

IV. OBJECTIVE OF THE STUDY

To study the range and accessibility of green banking products and services provided in the Indian banking sector.

A) Methodology

The study adopts a descriptive research design, as it is most appropriate for examining and understanding the prevailing eco-friendly banking practices in India.

B) Data Collection Method

The research is based on secondary data collected from reliable sources. The key sources of data include: official websites of banks and other published research papers and journals.

V. FINDINGS AND DISCUSSION

Green banking offers a range of green products and services to promote sustainable development. Some of them are green mortgages, green securitisations, online banking, green credit cards, green savings accounts, mobile banking and green loans. Some of the banks are already promoting green banking in India.

The State Bank of India (SBI) has been a pioneer in promoting green banking initiatives in the country. In 2009, the bank introduced the Green Channel Counter, a paperless banking system designed to reduce paper consumption and minimize its carbon footprint. SBI further strengthened its commitment to sustainable development by becoming the first bank in India to generate green energy through windmills for its own operational use. As part of this initiative, the bank installed 10 windmills with a combined capacity of 15 MW across Maharashtra, Gujarat, and Tamil Nadu by 2019, with plans to add another 20 MW in Gujarat and achieve a total wind power generation capacity of 100 MW within five years. In 2015, SBI also issued its first Green Bond in the Indian market, raising ₹500 crore to finance renewable energy projects, marking a significant milestone in its green finance strategy. Additionally, the bank introduced green housing initiatives and provides financial assistance for environmentally sustainable projects that improve energy efficiency and reduce environmental

impact. Through these initiatives, SBI has demonstrated its commitment to integrating sustainability into its banking operations while supporting India's transition towards a low-carbon and environmentally responsible economy.

State Bank of India (SBI) had also launched a Green Home Bank loan scheme at low interest rates to encourage customers to opt for green housing, i.e., buildings that are certified by rating agencies such as Leadership in Energy and Environmental Design (LEED) India, India Green Building Council (IGBC) and TERI – GRIHA from TERI- BCSD India.

ICICI Bank had introduced a scheme of Vehicle finance which aims at dropping the interest rate by 50 per cent on the loans taken by consumers on purchase of cars employing renewable sources of energy like Civic Hybrid of Honda, Tata Indica CNG, Reva electric cars, Mahindra Logan CNG versions, Maruti's LPG version of Maruti 800, Omni and Versa and Hyundai's Santro Eco. Under its home finance schemes, the bank attempts to reduce the processing fees of customers purchasing homes in LEED-certified buildings.

Union Bank of India offers schemes extending loans to farmers for the purchase of solar water heaters, solar water pumps and installing of solar home lighting systems.

Punjab National Bank offers medium-term loan schemes to farmers for the construction of greenhouses and the setting up of biogas plants with sanitary latrines, and has a scheme, PNB's Saur Urja Yojna, for small farmers to finance the purchase of solar home lighting and water heaters.

HDFC Bank introduced its Green Loan product in 2016, aimed at financing energy-efficient projects and green buildings. These banks also began integrating environmental considerations into their credit assessments. In 2021, the bank issued its first Green Bond worth USD 500 million to fund green projects and enhance its sustainability portfolio. This issuance supported various projects related to renewable energy and sustainable infrastructure. HDFC Bank is taking up various measures to reduce its carbon footprint in the areas of waste management, paper use and energy efficiency. The bank is encouraging its employees to avoid any wasteful use of natural resources and the emission of greenhouse gases. They are changing the use of paper by providing e-transaction advice to their corporate customers, communicating with their high-net-worth customers via electronic media, and issuing e-statements to their retail customers. The organisation is exploring renewable energy by setting up 20 solar ATMs with a pilot ATM set up in Bihar, and by changing batteries in ATMs to Lithium-ion batteries.

Corporate Social Responsibility Report 2010-11, Punjab National Bank had engaged in numerous steps to lessen emissions and energy consumption. Punjab National Bank was conducting an Electricity Audit of its offices as an energy conservation initiative and maintains a separate audit sheet to evaluate the impact of green initiatives. The bank had organised 290 supplementary tree plantation drives. It started emphasising green building practices such as energy-efficient lighting, immediate repair of water leaks, printing on both sides of paper and motion sensors for lights, fans, etc.

Axis Bank has undertaken several initiatives to promote environmental sustainability and strengthen its green banking practices. In August 2011, the bank launched a waste management program to collect and recycle dry waste generated from its corporate office and 34 branches in Mumbai. This collected more than 100,000 kg of paper waste that was recycled into around 12,000 notebooks, notepads and envelopes for use in-house by the bank. The bank's corporate head office in Mumbai was designed and constructed as a Platinum LEED-certified green building to demonstrate its dedication to environmentally sustainable infrastructure. With a view to further lessening its carbon footprint, Axis Bank initiated a carpooling concept for employees and also encouraged customers to go for paperless banking by opting for e-statements, electronic communications and annual reports through email. As part of its green finance initiatives, the bank in 2017 raised ₹1,000 crore through a Green Bond to fund renewable energy and energy-efficient infrastructure projects that support sustainable investments. Axis Bank launched a Sustainability-Linked Loan Product, where the loan terms are linked with borrowers meeting pre-set sustainability targets in 2020 as well. This initiative reflects the continuing commitment of Bank-AI to integrate Environmental, Social and Governance (ESG) lending practices into its operations and more broadly sustainable economic development.

VI. CONCLUSION

Global warming is creating various problems in the economy. Scientists and environmental experts believe that it is due to greenhouse gas emissions. India is in a race against time in meeting its climate goals, and greening all finance has become an imperative. Green financing will significantly reduce greenhouse gas emissions. Though the Government of India has taken various steps toward sustainable development, private sector participation in sustainability is in its nascent stage. Because of limited public finance, private finance has immense importance in sustainable development. So, the development of green finance is essential. This requires concerted efforts, a cohesive approach and the collective vision of policymakers, regulators and actors in the financial system. The way forward is to accelerate the dialogue at the highest level and initiate a narrative around sustainable finance. There should be a unified approach around taxonomy, green guidelines, financial products, as well as defining the roles of the private and public sectors and bankers and asset managers. This will stimulate action to align the financial system with green finance and, in turn, support the sustainable growth of the country.

Green banking in India is still evolving, with increasing efforts from both the government and the private sector to integrate sustainability into the financial system. The success and feasibility of eco-friendly banking emphasise the urgent need for 'go green' initiatives in the banking sector. However, compliance with green banking standards poses significant challenges for financial institutions, including technological constraints and limited technical expertise.

VII. REFERENCES

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