

CREATING SUSTAINABLE CITIES – MUNICIPALITIES AND THE POTENTIAL OF SEBI'S GREEN BOND FRAMEWORK



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In 2018, the Global Infrastructure Hub estimated a \$15 trillion global investment gap in the years leading to 2040 that would need to be filled if the world were to make infrastructure resilient to climate impact and qualify to be *Net Zero*. Internationally Cities are looking at various sources of finance to complete their projects, particularly sustainable / green projects. In India, SEBI has allowed municipalities as 'issuers' under the SEBI (Issue and Listing of Municipal Debt Securities Regulations), 2015 to issue green bonds as a source of finance for such projects.

Potential for municipalities

Presently around 36% of India lives in cities. (*World Bank data, September 2023*)¹ This figure is expected to go up to 50% in 2047². *Niti Aayog* estimates that more than 60%³ of India's GDP is generated by its cities. Cities have municipal corporations that run them. The indicative functions of municipal corporations are broadly as follows⁴:

Public Health and Sanitation

Water supply, public vaccination, control of diseases, prevention of pollution, collection/disposal of rubbish, maintenance of sewers.

¹ <https://tradingeconomics.com/india/urban-population-percent-of-total-wb-data.html>

² https://www.business-standard.com/article/economy-policy/urbanisation-set-to-be-key-with-50-population-in-cities-by-2047-niti-ceo-122120800515_1.html

³ https://www.niti.gov.in/sites/default/files/2022-05/Mod_CEOG_Executive_Summary_18052022.pdf

⁴ <http://www.lse.ac.uk/asiaResearchCentre/files/ARCWP19-Aijaz.pdf>

Abstract

Municipalities have an unenviable job - that of ensuring that cities are not only liveable, but are also sustainable. Towards this, one needs funds other than the usual avenue of government grants and revenue through taxes and charges. To be fair, municipalities are primed to be most likely issuers with green objectives owing to the inherent nature of sustainability in the projects like water management, waste treatment etc. This article examines how SEBI 's green bond framework provides an answer to the sustainable finance requirements of municipalities.

Medical Relief

Establishment and maintenance of health institutions.

Public Works

Construction and maintenance of roads/bridges, control and regulation of building activity, street lighting, tree plantations, etc.

Education

Establishment and maintenance of educational institutions.

Development

Construction and maintenance of markets, shopping centres, drinking water stand posts, wells, parks, gardens; preparation of plans for development and growth of towns.

Administration

Preparation of annual reports, maintenance and development of municipal property, regulation of traffic, registration of births and deaths.

SEBI's municipal bond framework and reforms

The SEBI (Issue and Listing of Municipal Debt

Securities) Regulations, 2015 (ILMDS Regulations) and circulars issued thereunder, provide the framework for issuance and listing of municipal debt securities in India. SEBI has also specified the continuous disclosure and compliance requirements to be complied with by issuers of Municipal Debt Securities. 12 municipalities have raised around Rs.2400 crore in municipal bonds so far.

In order to assist municipal debt issuers,

- ⊙ *SEBI has been creating awareness around the country among municipalities about its municipal bond framework through programmes.*
- ⊙ *SEBI launched an Information Database – accessible through a QR Code –containing a repository of information pertaining to Municipal Bonds which serves as a guide to municipalities and aid awareness.*
- ⊙ *SEBI allowed Stock Exchanges to introduce the Muni Bond Index. Consequently, NSE, in February 23, launched India's first Muni Bond Index*
- ⊙ *SEBI is also engaging with states across the country on how municipalities can utilize the municipal bond market to meet their funding needs*

SEBI framework for Municipalities to issue green bonds

The ILMDS Regulations do not define 'green debt security'. The SEBI (Issue and Listing of Non-Convertible Securities) Regulations, 2021 (NCS Regulations), defines "green debt security". Further, Chapter IX of the SEBI NCS Operational Circular dated August 10, 2021, *inter alia*, provides the initial and continuous disclosure requirements for entities issuing/ proposing to issue green debt securities.

SEBI had received representations from market participants on the compliances an issuer under the ILMDS Regulations would have to undertake in case it is desirous of issuing a green debt security, in the absence of similar provisions in the ILMDS Regulations.

In November 2022, SEBI clarified that an issuer under the ILMDS Regulations may issue a green debt security if it falls within the definition of "green debt security", as per Regulation 2(1)(q) of the NCS Regulations. SEBI also stated that such issuer, shall, in addition to the requirements prescribed under the ILMDS Regulations and circulars issued thereunder, comply with the provisions for 'green debt security', as specified under the NCS Regulations and circulars issued thereunder.

Potential for municipalities to issue green bonds

More than any other of bonds, municipalities are most primed to issue green bonds. The reason is many of their

projects relate to:

- ⊙ *Treatment of waste,*
- ⊙ *Sewage related projects,*
- ⊙ *Desalination,*
- ⊙ *Riverfront development,*
- ⊙ *Coastline protection etc.*

Cities have more green projects than companies. Ghaziabad Municipal Corporation was the first municipality to issue a 'green' bond though the SEBI clarification was then not in place. Indore became the latest city to issue a green bond. In fact, the response to the Green bond issue of Indore Municipal Corporation was so overwhelming that it got oversubscribed by more than 6 times by the public. With India as a nation providing commitments in the form of Nationally Determined Contributions (NDCs), it is only imperative that these projects will become the mainstay of municipalities in India's drive towards net zero.

NDCs – India's Commitment to United Nations

In its NDCs, which have been communicated to the United Nations Framework Convention on Climate Change (UNFCCC)⁵, India has pledged to:

- ⊙ *Improve the emissions intensity of its GDP by 33 to 35 per cent by 2030 below 2005 levels.*
- ⊙ *Increase the share of non-fossil fuels-based electricity to 40 per cent by 2030.*
- ⊙ *Agreed to enhance its forest cover which will absorb 2.5 to 3 billion tonnes of carbon dioxide (CO₂, the main gas responsible for global warming) by 2030 (like a 'carbon sink')*

India's updated NDCs also represents the framework for India's transition to cleaner energy for the period 2021-2030.

Further it is significant to note that India has proposed 'LIFE' – 'Lifestyle for Environment' as a key to combating climate change. India's updated Nationally Determined Contributions (NDCs) NDCs embody efforts by each country to reduce national emissions and adapt to the impacts of climate change.

So municipalities have a responsibility in contributing to the NDCs – this can be done by the tapping the SEBI green bond framework.

Sustainability and cities around the world

Countries around the world have provided significant commitment given to green financing. Cities are trying

⁵ <https://unfccc.int/process-and-meetings/the-paris-agreement/nationally-determined-contributions-ndcs>

innovative ways to exist sustainably. Punggol, a city in Singapore has applied *Green Urbanism* approach to create an entire new town aimed at driving sustainability, reducing carbon emissions and promoting a better quality of life for residents.

For example, Belgrade, the capital of Serbia, has come out with an indigenous concept of a *'liquid tree'*⁶, an urban photo-bioreactor that harnesses the power of microalgae to improve air quality. Serbia is the owner of an unwanted record – it has the worst per capita record for pollution-related deaths, with 175 per 100,000 people. It is looking at innovative solutions.

India, on the pollution front, is at an alarming place – it is the 8th most polluted country in the world with the 14 most polluted cities out of 20 being Indian⁷. Accordingly, in India too there is a crying need to ameliorate the situation -hence the growing need for municipalities to smartly transition from a carbon intensive to a carbon neutral economy.

Why green bonds for municipalities?

Hence, government grants alone may not suffice for municipalities in India and they need to look at different sources of finance to achieve the commitments. The green bond framework of SEBI is one such source waiting to be tapped. The green bond framework of SEBI is pretty exhaustive inasmuch that:

- ⊙ *it defines what comprises a green debt security;*
- ⊙ *it stipulates requirements as to initial and continuous disclosures;*
- ⊙ *it requires disclosures as per Chapter 6 of the BRSR on Environment;*
- ⊙ *it requires independent third party analysis, which will boost credibility and*
- ⊙ *it lays down the DOs and Don'ts for greenwashing.*

Further, the SEBI green bond framework goes on to define *blue* bonds, *yellow* bonds as well as *transition* bonds to suit the needs of the issuer. Urban municipalities should optimize resources to unlock monetary value. Cities can also follow the Infrastructure Trust model - InVIT model – of SEBI to raise funds in which only a share of revenues require to be pledged – this innovative model acts as a shield against indebtedness. At an earlier Conference of parties (CoP 26), India presented the success story of one of its cities – Surat - which has become a model city in

⁶ <https://www.envirotech-online.com/news/air-monitoring/6/international-environmental-technology/could-liquid-trees-be-a-game-changer-for-urban-air-pollution/60122>

⁷ <https://www.hindustantimes.com/india-news/most-polluted-cities-in-the-world-india-pakistan-bangladesh-iran-iqair-101686047650288.html>

the country for its circular economy recycling waste water, releasing it for industrial usage and generating revenue through such reuse⁸. Certain cities are creating a public private partnership for waste recycling.

Conclusion

Cities drive our future – hence, it is important that cities are sustainable and resilient. There is a need to look at various sources like municipal bonds for cities to augment their needs. Studies indicate that in India, while municipal revenue is around 1% of GDP, the infrastructure investment needed annually is around 9% of GDP. Further, Only 1% of urban bodies' financial needs are met through municipal bonds as against 10% in the USA.⁹

OECD estimates that by 2050, the global population living in cities is projected to reach 5 billion and that massive investment in infrastructure will be needed to accommodate this growth, not least given the need to adapt existing, as well as new, infrastructure to climate change and to benefit from the digital transition¹⁰.

Cities need to ensure that their sources of funds and revenue remain diverse – this will only make them resilient and financially sustainable. While they may tap into their own sources of revenue / government grants, the SEBI municipal bond framework emerges as an attractive source of revenue, particularly green municipal bonds, which will aid in creating sustainable cities. **MA**

⁸ <https://timesofindia.indiatimes.com/city/surat/surats-circular-economic-model-presented-at-cop26/articleshow/87690137.cms>

⁹ <https://www.orfonline.org/expert-speak/municipal-bonds-sustainable-source-finance-indian-cities-67646/>

¹⁰ OECD July 2023 report – *Financing Cities of Tomorrow*