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## Localisation of SDGs in Addressing the Inter-District Disparities in Tamil Nadu

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### ABSTRACT

Tamil Nadu, though being a front-runner in income and socio-economic aspects compared to other Indian states, has been facing inter-district disparities in various dimensions as some districts are strong performers and others persist to lag with uneven distribution of growth and resources. These discrepancies have been reflected in state's trajectory towards sustainable development. Hence, this study recommends localisation of Sustainable Development Goals (SDGs) which ensures participatory planning and implementation, leading to inclusive growth. Localisation, primarily deals with assessing the position of the districts in achieving the SDGs. Against this backdrop, this study constructs a composite SDG Tamil Nadu Index focussing on the first five people related goals. A composite index integrates multiple individual indicators into a single measure, offering more comprehensive assessment of socio-economic performance of regions that aids effective and meaningful comparison. Employing district-level data and adopting the NITI Aayog methodology derived from Sustainable Development Solutions Network (SDSN), this study categorises districts according to their performance and identifies those needing immediate attention. The findings highlight the disparities



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within the state and suggest policy interventions to address these gaps to promote sustainable development across Tamil Nadu.

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## I Introduction

Over the aggregate development of Tamil Nadu in many socio-economic aspects compared to other Indian states, significant variations have been seen across the districts. The state is characterised by persistent regional disparities and that makes it important to assess the intra-state development patterns. Therefore, this study attempts to construct specific SDG index, focussing on the first five goals to evaluate the position of districts in achieving the goals using the framework developed by SDSN and adopted by NITI Aayog. Considering the state's demographic and regional diversity, localisation of SDGs is critical in reaching the path of sustainable development.

## II Materials and Methods

The socio-economic condition varies significantly across the districts of Tamil Nadu. Chelliah and Shanmugam (1996) has found that the higher income districts are concentrated in the eastern, northwestern and middle of the southern part of the state. Moreover, the low -income districts are characterised with low industrial and agricultural productivity and larger proportion of SC/ST population. With regard to human development, 18 out of 29 districts considered in the study have been having HDI score less than the state average indicating economic growth has not translated into even improvements in human development. Likewise, Narain et al. (2000) has found northern and north-eastern districts were better developed compared to the western and southern districts on the basis of agriculture and infrastructure. The low developed districts were found to require improvements in various dimensions like irrigation, fertilizer usage, transport, communication, and medical facilities. Annapoorani and Sudha (2013) has assessed the overall quality of life using an index computed by summing up four components; Life Expectancy, Infant Mortality Rate, Literacy Rate, Per capita Net State Domestic Product. Also, substantial inter-district variations have been identified in various aspects by employing GINI coefficient analysis. Sundar (2015) has also identified disparity in per-capita income across the districts. The reasons for higher per-capita income as pointed out by him are development of industries, industrial clusters and concentration of multinational companies in the districts and the districts with low per-capita income has a higher share of agriculture. Though Tamil Nadu is the model state for Universal Public Health Care System in India, Sikder (2015) has revealed inter-district variations in under-five mortality rate in Tamil Nadu and has addressed a sharp gap between advanced and backward districts. This has been backed by



Veena and Ganesan (2020) who revealed variations in Birth Rate, Death Rate, IMR, MMR and Under-Five Mortality Rate across the districts. Furthermore, variations are seen in the availability of primary health and sub-centres per 1,00,000 population across districts of Tamil Nadu. These disparities have also been seen in the achievement of the districts towards SDGs and the studies emphasis on targeted interventions by the government for more balanced regional development. Hence localisation of SDGs can be seen as a necessity in the current development context.

According to NITI Aayog, Early Lessons from Localising of SDGs (2019),

*“Localising is the process of recognising subnational contexts in the achievement of the 2030 Agenda, from the setting of goals and targets, to determining the means of implementation and using indicators to measure and monitor progress, in addition to raising awareness through advocacy. Localisation relates both to how local and sub-national governments can support the achievement of the SDGs through bottom-up action as well as how the SDGs can provide a framework for local development policy. These entail participatory planning, implementation, and evaluation”*

Kumar and Anand (2023) have stressed on the federal system of administration and the role of sub-national governments; The State, UT, District, and Local bodies (both rural and urban) in being equal partners in implementing the SDGs. Ankita (2024) has assessed how well the SDGs have been localised through Panchayat Raj Institution in the Rayagada district of Odisha. On analysing the progress of the gram panchayats in achieving good governance, this study has recommended 'Theme-Resource Identification Framework', that concentrates on a specified Localised SDG (LSDG) and works towards its effectual implementation. On recognizing the need of localising SDGs and the challenges faced by the local stakeholders in implementing the goals, Reuter (2023) has proposed a ‘Middle Ground Approach’ that fills in the limitations of Top-Down and Bottom-Up approach. However, the first step in planning and implementing development policies through local governments is to ascertain the need of each district based on its position in achieving SDG. In line with this research problem, this study has attempted to construct 5 composite Goal Specific Indices for first five people related SDGs; No Poverty, Zero Hunger, Good Health and Well Being, Quality Education and Gender Equality (OECD, 2024). Also, categorising the districts based on NITI Aayog’s classification (NITI Aayog, 2024) has enabled effective identification of districts that need immediate attention in a specific aspect.

Various dimensions of socio-economic aspects cannot be quantified using a single descriptive indicator as they should be represented with multiple features (Mazziotta & Pareto, 2013). Therefore, indicators have to be combined in a systematic way in order to construct a composite index that assess the overall

performance of the districts. This study has followed the globally accepted Sustainable Development Solutions Network methodology (Lafortune et al., 2018) for calculating the index. This has been adopted by NITI Aayog as well (NITI Aayog, 2024).

The indicators have been identified from National Indicator Framework (NIF) prepared by the Ministry of Statistics and Policy Implementation (MOSPI, 2025) to monitor SDGs at national level. Here, the indicators that have district wise relevance, acceptability and availability are chosen.

**Table 2.1: List of Indicators**

S.No.	Indicator	Target	Source
<b>Goal 1 – No Poverty</b>			
1	Head count ratio as per the Multi-dimensional Poverty Index (%)	13.95	Multidimensional Poverty Index Report, 2023
2	Percentage of households with any usual member covered by a health scheme or health insurance	100	NFHS – 5
3	Percentage of households living in Katcha houses	0	Census, 2011
4	Persons provided employment as a Percentage of persons who demanded employment under MGNREGA	100	Ministry of Rural Development, GOI
<b>Goal 2 – Zero Hunger</b>			
1	Children under 5 years who are underweight (weight for age) (%)	1.9	NFHS – 5
2	Children under 5 years who are stunted (weight for age) (%)	6	NFHS – 5
3	Women (age 15-49 years) whose Body Mass Index (BMI) is below normal (BMI <18.5 kg/m <sup>2</sup> ) (%)	0	NFHS – 5
4	All women age 15-49 years who are anaemic (%)	25.2	NFHS – 5
5	All women age 15-19 years who are anaemic (%)	14.2	NFHS – 5
6	Rice and wheat produced annually per unit area (Kg/Ha)	5322.08	Ministry of Agriculture and Famers Welfare, Government of India
<b>Goal 3 – Good Health and Well Being</b>			

1	Children age 12-23 months fully vaccinated based on information from either vaccination card or mother's recall (%)	100	NFHS – 5
2	Institutional births (in the 5 years before the survey) (%)	100	NFHS – 5
3	Suicide rate (per 1,00,000 population)	3.5	Tamil Nadu Crime Report, 2022
4	Death rate by accidents (per 1,00,000 population)	5.81	Tamil Nadu Crime Report, 2022
5	Infant Mortality Rate	25	Statistical Handbook of TN, 2022-23
6	Maternal Mortality Rate	70	Statistical Handbook of TN, 2022-23
7	Total case notification rate of Tuberculosis per 1,00,000 population	242	NFHS – 5
<b>Goal 4 – Quality Education</b>			
1	Gross Enrolment Ratio - Higher Secondary	100	UDISE, 2025-26
2	Adjusted Net Enrolment Ratio in Elementary Education (1-8)	100	UDISE, 2025-26
3	Pupil Teacher Ratio (Secondary Level)	30	UDISE, 2025-26
4	Literacy Rate	100	UDISE, 2025-26
5	Gender Parity Index in School	1	UDISE, 2025-26
6	Percentage of schools with electricity	100	UDISE, 2025-26
7	Percentage of trained teachers (Secondary Level)	100	UDISE, 2025-26
8	Dropout Rate (Secondary Level)	8.8	UDISE, 2025-26
<b>Goal 5 – Gender Equality</b>			
1	Percentage of Female MLA	50	Director of Electoral Board
2	Sex Ratio (per 1000 males)	950	Census, 2011
3	Ratio of female to male LFPR (15-59 years)	1	PLFS, 2023-24
4	Rate of crime against women per 10000 female population	0	Tamil Nadu Crime Report, 2022
5	Per 100000 women who have experienced	0	Tamil Nadu Crime

	cruelty/physical violence by husband or his relatives during the year		Report, 2022
6	Percentage of female operational holdings	50	Tamil Nadu Agricultural Census, 2015-16
7	Current Use of Family Planning Methods (Currently Married Women Age 15-49 years) - Any modern method (%)	100	NFHS - 5
8	Ratio of female to male average wage/salary earnings received among regular wage/salaried employees	1	Season and Crop Report, 2022-23

The data have been procured from secondary sources and the targets for each indicator have been given by NITI Aayog (NITI Aayog, 2021). These indicators have been normalised using Max-Min method and equal weights are assigned while computing individual goal score. Aggregated SDG index of the people related goals has been constructed by averaging five individual goal scores.

### III Results

As an initial move towards localising SDGs in Tamil Nadu, this study has determined the position of 32 districts in achieving the people related SDGs and has categorised the districts as Achievers (100), Front Runners (65-100), Performers (50-65) and Aspirants (less than 50) based on the index scores.

On ranking the districts on the basis of goal specific indices, it has been found that 28 out of 32 districts are front runners in Goal 1: No Poverty, while others are performers. The Nilgiris stands first with the goal score of 85.74 and Cuddalore being the last with 59.64. Similarly, same pattern has been observed in Goal 4: Quality Education as well, where among 32 districts 23 are front runners and others are performers. Kanyakumari and Namakkal has secured the first and last rank with 91.14 and 51.76 as goal score respectively. Except 5 districts, others are either performers or aspirants in Goal 3: Good Health and Well-Being. High prevalence of malnutrition and anaemia among women and children are observed as the index shows that only Dharmapuri and Dindigul are front runners and most of the districts are far from achieving the targets assigned to them. 18 districts are in aspirant category with Thiruvallur being the lowest with goal score 29.82. All the 32 districts have scored below 50 in Goal 5: Gender Equality.



#### IV Discussions

The overall performance of the state in alleviating poverty is noteworthy as the Multidimensional Poverty Index (MPI) of the state has seen a significant drop from 0.019 in 2015-16 to 0.009 in 2019-20 (NITI Aayog, 2023). Also, no districts had fallen under the aspirant category proving employment generation schemes, providing housing facilities at affordable prices, early Self-Help Group (SHG) movements and other policy interventions have rightly reached the targeted beneficiaries (State Planning Commission, 2024).

Tamil Nadu's school education has been characterised by near-universal enrolment, reduced drop-outs rates and strong welfare schemes. Moreover, in addition to the existing educational schemes, the government has allotted nearly 12.58% of its total budget to school and higher education in 2025-26, aiming to execute Tamizh Pudhalvan Scheme, to ensure disbursement of education loan and to cover third-gender education in the upcoming years. The relative performance of the districts has shown variations, yet all the districts have achieved their target in indicators like percentage of trained teachers, pupil teacher ratio and dropout rate at secondary level. Also, all the districts exceed 75% in enrolment ratio at elementary level, 68% in literacy rate and 0.89 in gender parity index (school education). This exhibits effective penetration of inclusive educational policies into the state.

Although, the public health model of Tamil Nadu is eminent in delivering quality health services at an affordable price, districts like Kanchipuram, Thiruvallur and Tiruppur have scored less than 40. With distinctive public health cadre in the district level (Parthasarathi & Sinha, 2016), these districts require special focus on reducing maternal mortality rate, suicide rate and death rate by accidents. Also, Kanchipuram has to take up rigorous vaccination drive and measures to bring down TB notification rate. Furthermore, it is important to consider the presence of major industrial hubs in these districts while formulating localised policies to achieve SDG 3.

The Goal 2: Zero Hunger targets at overall access to safe and nutritious food thereby ending lack of nutrition especially in children, adolescent girls, pregnant and lactating women. The Public Distribution System (PDS) in Tamil Nadu provides universal access to essential commodities at highly subsidised prices ensuring comprehensive food security (Dhanaraj & Gade, 2015). However, districts still have not achieved the target. Moreover, urbanisation and industrial growth in districts like Chennai, Kanchipuram, Thiruvallur, Tiruppur and Erode has pulled down the index score. This emphasizes on tailoring district specific policies based on their distinct needs.



Tamil Nadu's female literacy rate has crossed 50% in 1991 and has reached 73.86% in 2011 (Census, 2011). During 2021-22, the Gross Enrolment Ratio (GER) of women was 47.3% (AISHE, 2021-22). The female labour force participation rate (FLFP) of the state (both urban and rural) is 43.9%. This shows that Tamil Nadu's figures are well above the nation's average and that can be attributed its initiative of the government in empowering women through schemes such as free travel for women in government buses, Moovalur Ramamirtham Ammaiyar Higher Education Assurance Scheme, Magalir Urimai Thogai Thittam, Marriage Assistance Scheme, etc (TN State Policy for Women, 2024). Despite the successful formulation and implementation of the women specific welfare schemes, it is crucial to note that all the 32 districts have scored below 50 in Goal 5: Gender Equality negatively contributing to the aggregate People SDG Index. Localising SDGs could aid to address this issue as the particular areas in which the districts lag have been identified, for the government to fabricate the welfare schemes accordingly.

## V Conclusion

This study, on analysing the inter-district disparities in Tamil Nadu has observed that economic growth in the districts like Thiruvallur has not translated into social development. Also, it provides a meticulous understanding on the progress of the districts in the first five SDGs and has highlighted the gaps in nutrition, health outcomes and gender equality which requires targeted interventions with economic and social investments. Finally, this study concludes that localisation of SDGs is essential to ensure balanced regional development which eventually strengthens Tamil Nadu's contribution to India's overall progress towards achieving SDGs by 2030.

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