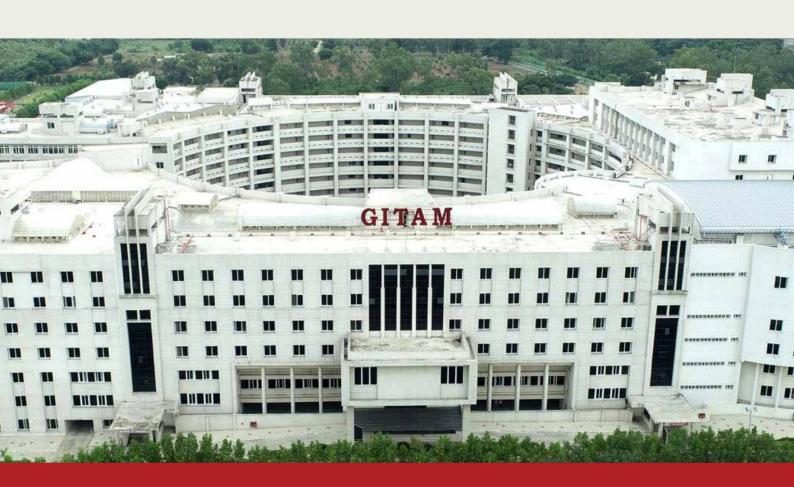


# Brief Series



"Bridging the Gap: A Comparative Case Study of Manufacturing in Tamil Nadu and Andhra Pradesh"

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## "Bridging the Gap: A Comparative Case Study of Manufacturing in Tamil Nadu and Andhra Pradesh"

"The best time to plant a tree was 20 years ago. The second-best time is today."

### **Abstract:**

This paper makes a comparative study of the manufacturing sectors of Tamil Nadu and Andhra Pradesh by focusing on policies, infrastructure and the people. Tamil Nadu succeeds because of the favourable policies of investment and skilled manpower and for Andhra Pradesh with high potential but lower yield and diversified infrastructural development are lacking. Andhra Pradesh seeks to become a "Swarna Andhra" through optimum use of the resources and thereby the new industrial policies so formulated with regard to create investment and employment. The state can learn from the Tamil Nadu model of incentives, skills development, and business environment. By focusing on these areas, Andhra Pradesh can boost its manufacturing sector and achieve economic growth.

### **Introduction:**

The manufacturing sector currently contributes around 17% to India's GDP and employs over 27 million people. A country's industrial sector is widely regarded as a driving force behind growth. The industrialized states, such as Maharashtra, Gujarat, and Tamil Nadu, had a large share of employment, output, gross value added, and capital. These states have been noted to have formulated specific policies in order to attract the development of factories by various industries. The manufacturing sector is equally as important for the economic growth of the state since it encourages development of regions, attracts investments, and improves people's quality of life.

### Tamil Nadu: A Manufacturing Powerhouse

Tamil Nadu is one of the most favoured destinations for manufacturing activities in India with the manufacturing sector contributing to 34% of SGDP((PRS Legislative Research, 2024)). The success story of the state is based on factors such as well-developed industrial policy, skilled and quality manpower, proactive and investor-friendly policies, robustinfrastructure and development of the service sector. These have together placed Tamil Nadu on the map of manufacturing destinations of India.

Growth in GSDP and sectors in Tamil Nadu at constant prices (2011-12)

Sources: MoSPI; PRS.

Tamil Nadu has a broad industrial base, including vehicle and automotive components, machinery, textiles, leather, electronics, and optical items. Existing a massive number of factories along with the industrial workers and having higher GSDP growth rate as well as exporting products on a large scale confirms the position of the manufacturing sector in Tamil Nadu.

The state's emphasis on education and skill development has cultivated a talented workforce that is both qualified and adaptable. The high literacy rate and the abundance of

engineering graduates ensure a steady supply of skilled labour, further bolstering the manufacturing sector's competitiveness.

Tamil Nadu's proactive policies like "Naan Mudhalvan" a flagship skilling program of the state undertaken by Tamil Nadu Skill development Corporation (TNSDC) with over 28 lakh students benefited, (The Hindu, 2024). Investor-friendly initiatives like digitisation of Government to Business (G2B) interface have created a conducive environment for businesses to thrive. The state's Industrial Policy 2021 further incentivizes investments, contributing to a thriving business environment. Combined with its strong road and rail networks, well-equipped ports, reliable power supply, and support from the IT and services sectors, Tamil Nadu has positioned itself as a leading manufacturing hub in India.

**Top Sectors for Tamil Nadu** 

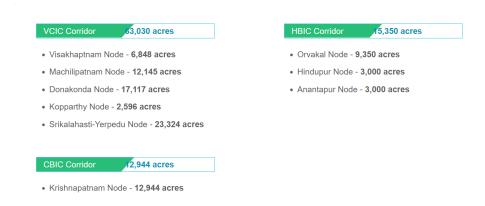
Sector	TN's Rank	Total Output (Rs. lakh crore)	Total Output (% share of India)
Motor Vehicles, Trailers	1	2.02	23.34
Wearing Apparel	1	0.63	33.66
Leather & Leather Products	1	0.18	27.54
Textiles	2	1.24	23.01
Machinery & Equipment	2	0.87	17.23
Computer, Electronic & Optical Products	2	0.58	17.32
Printing & Reproduction	2	0.04	14.34
Rubber & Plastics	3	0.45	9.58
Food Products	5	1.23	8.01

Source: Annual Survey of Industries 2021-22

### **Andhra Pradesh: A State with Potential**

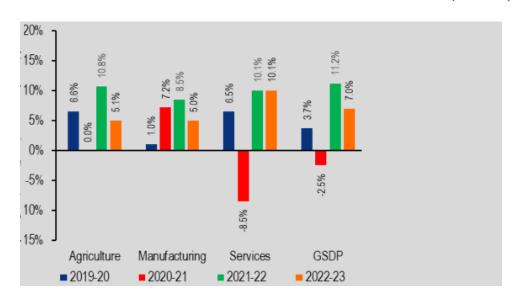
Andhra Pradesh, though a young state formed in 2014, has made great progress in the manufacturing sector. Supportive state policies and the central government's "Make in India" campaign have boosted industrial growth, with manufacturing now contributing 21% toSGDP (PRS Legislative Research, 2024). Andhra Pradesh is the only state to have three

Industrial corridors for accelerated development of the state. The steady increase in the number of factories, invested capital, and gross capital formation complemented by the rapid Infrastructure and logistical development are indicative of the positive trajectory.



Source: Andhra Pradesh Economic Development Board

### Andhra Pradesh GSDP and Sectoral Growth at Constant Prices (2011-12)



Sources: Economic Survey of Andhra Pradesh 2022-23; PRS.

### The Gap: Unlocking Andhra Pradesh's Full Potential

Although Andhra Pradesh has shown significant progress, there are inconsistencies in how factories contribute to the state's output, employment, and profits. This suggests that

while the state has successfully attracted factories, their overall impact on the economy is not as strong as it could be and needs further analysis.

This situation can be blamed on issues such as; low output, no scale economy, uneven infrastructure distribution and shortage of skills. Achieving these challenges is crucial for the state to achieve its full manufacturing potential and ensure steady progress.

### **Problem Statement**

The main challenge is to find and apply strategies that boost the productivity, efficiency, and economic impact of Andhra Pradesh's manufacturing sector. The state needs to shift focus from just attracting factories to building a system that produces high-value products, provide ample employment to the people, and significantly benefits the state's economy.

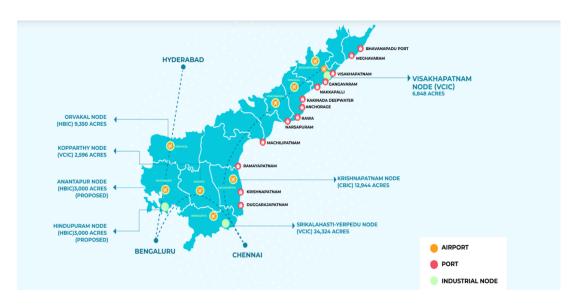
### **Case Study Methodology**

This policy paper adopts a case study methodology to delve deeper into the dynamics of the manufacturing sector in Tamil Nadu and Andhra Pradesh. By analysing the key indicators, policies, and initiatives in both states, the paper aims to draw valuable insights and lessons that can inform policymaking in Andhra Pradesh. The comparative analysis will highlight the strengths and weaknesses of each state's approach, providing a roadmap for Andhra Pradesh to emulate best practices and address its unique challenges.

### **Andhra Overview:**

The new states of Andhra Pradesh and Telangana were established on June 2, 2014, in accordance with the "Andhra Pradesh Reorganization Act, 2014". A.P.'s residual state persisted, lacking a capital city and any other cities that produced revenue or jobs. In this

case, the growth of the manufacturing sector is essential to the creation of jobs and the state's development.13 districts make up the recently created state of Andhra Pradesh: Nine districts make up the coastal Andhra region: Visakhapatnam, East Godavari, West Godavari, Vizianagaram, and Srikakulam. Prakasam, Godavari, Krishna, Guntur, Nellore, and four districts in the Rayalaseema region are Chittoor and Anantapur. Andhra Pradesh lifeline is its extensive coastline, Where the Krishna and Godavari rivers form a fertile delta before meeting the sea. Magnificent the state's natural resources are its mineral and water wealth, (Lakshmi & Rao, 2023). The state has strong manufacturing sectors like cement, paper, food processing and aquaculture, steel, fertilizers, chemicals and petrochemicals, textiles, automobiles, and ship building. As a result, there are numerous prospects for the growth of the state's industrial industry.



Source: **SBLC** 

### **Structure and Focus**

As to the given industrial policies of Andhra Pradesh and Tamil Nadu, it is possible to distinguish differences both in structure and in focus even if both speak about the development of the economy. On the structure of the policy Tamil Nadu is again applauded where marked structures are traceable in its incentives. It employs a tiered approach,

categorizing investments based on their size Mega (Over Rs. 200 to Rs. 500 crores invested over four years, 100 jobs are created), Super Mega A/B (For Super Mega A Investment beyond Rs. 500 to Rs. 1500 crore, 250 jobs will be created in five years), Ultra Mega (For Ultra Mega Investment above Rs. 3000 crore, 500 jobs will be created in 7 years), and linking incentives directly to investment levels and employment generation, (Frost & Sullivan, 2018). This transparent and predictable system empowers investors to easily understand the benefits they can avail based on their investment plans. The policy also strategically focuses on attracting large-scale investments through its tiered incentive structure, offering substantial incentives for mega and ultra-mega projects. The clarity and strategic focus of Tamil Nadu's policy create a favourable environment for investors, particularly those looking to make significant investments.



Source: Rodl&Partner

In contrast, Andhra Pradesh's policy adopts a broader approach, offering incentives applicable to the entire state without specific categorization based on investment size or sector, (Frost & Sullivan, 2018). While this approach may seem inclusive, it might lack the targeted focus necessary to attract large-scale investments. The policy's incentives, including VAT/CST reimbursement, capital subsidies for specific categories, and employment generation subsidies for large projects, are designed to encourage a wider range of investments. However, this broad approach might not be as effective in attracting major

industries and driving significant economic growth compared to Tamil Nadu's targeted incentives.

### **Incentives and Support**

The incentive structures of both states further highlight their differing approaches. Tamil Nadu provides a comprehensive range of incentives to promote industrial growth, including Investment Promotion Subsidies, Capital Subsidy, Power Incentives, Employment Intensive Subsidy, Training Subsidy, and Additional Capital Subsidy, (Frost & Sullivan, 2018). The Investment Promotion Subsidy is particularly noteworthy, as it is based on net VAT + CST, with varying ceilings and durations depending on investment size. The policy also provides capital subsidies for micro, small, and medium manufacturing enterprises in notified thrust sectors and offers power incentives for units with high demand.

Andhra Pradesh's policy also provides various incentives, including VAT and CST Incentive/Investment Subsidy, Capital/Interest Subsidy for SC/ST & BC Entrepreneurs, and Employment Generation Subsidy. The VAT and CST Incentive/Investment Subsidy offers reimbursement of 50% of net VAT/CST/SGST for 7 years or up to 100% FCI for large units, with higher concessions possible for sector-specific industries, (Frost & Sullivan & IBEF, 2018). The policy also provides capital/interest subsidies for SC/ST & BC entrepreneurs and employment generation subsidies for mega projects.

### **Comparative Analysis of Key Indicators**

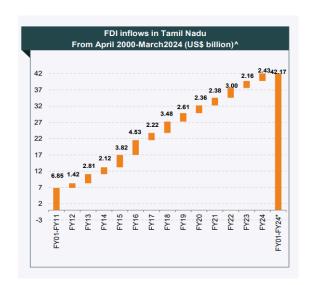
Indicator	Tamil Nadu	Andhra Pradesh	All India
Number of Operating Factories	31,606	12,507	200,576
Fixed Capital (₹ Lakhs)	307,595.68	221,119.56	37,263,544
Invested Capital (₹ Lakhs)	497,342.30	311,176.49	55,449,318
Total Persons Engaged	2,625,109	672,708	17,215,350

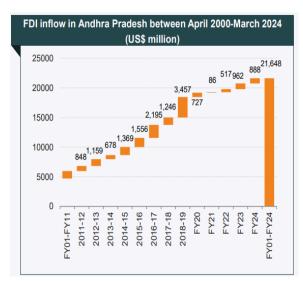
Total Output (₹ Lakhs)	1,160,198.20	529,374.17	119,271,515
Gross Value Added (GVA) (₹ Lakhs)	194,257.20	80,204.73	20,479,715
Net Value Added (NVA) (₹ Lakhs)	160,546.63	64,423.97	17,483,247

Source: ASI report 2021-2022

The ASI 2021-22 report presents several key indicators that enable a comparative analysis of the manufacturing sectors in Tamil Nadu and Andhra Pradesh. The data reveals a stark contrast between the two states. Tamil Nadu boasts a significantly higher number of operating factories, indicating a larger and more vibrant manufacturing ecosystem. Furthermore, Tamil Nadu's manufacturing sector surpasses Andhra Pradesh in terms of fixed capital, invested capital, total persons engaged, total output, gross value added, and net value added. These figures underscore the superior performance of Tamil Nadu's manufacturing sector compared to Andhra Pradesh. Among India's top ten states with the greatest number of factories, 35 per cent of Andhra Pradesh's factories 4,418 of them aren't functional, (Benu, 2024). Analysing the reasons behind these closures and taking corrective measures is vital for maximizing the state's industrial potential. A higher GVA(gross value added) or NVA(Net value added) suggests greater efficiency and profitability of the industrial sector. Andhra Pradesh's GVA and NVA are lower compared to Tamil Nadu, implying a need to improve productivity and reduce production costs. This could be achieved through technological upgradation, skill development, and better supply chain management.

### FDI in Tamil Nadu and Andhra:





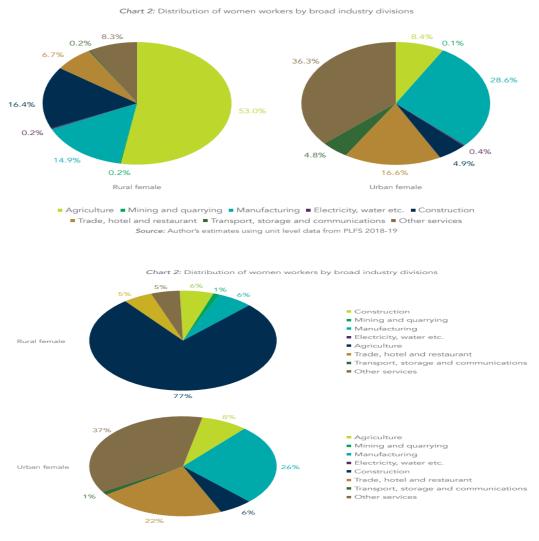
Source: IBEF

Both Tamil Nadu and Andhra Pradesh have demonstrated a significant progress in attracting FDI into the states. The recent surge is Andhra is trustworthy and shows its potential to become a major manufacturing hub in the coming years. Andhra Pradesh's economic landscape is undergoing a transformation, fuelled by a surge in foreign and domestic investments. Over the period October 2019 to March 2024 the flow of FDI was recorded at US\$ 888. Increased global confidence which was evidenced by equity funds reaching 13 million. It has also attracted sizeable investment proposals including Rs. 126,622 crores (US\$ 15. 5 billion) approved in September 2022 with more stress on green energy, (IBEF, 2024). The major steel players have shown interest towards creating manufacturing authorities, and many investment registrations have been done in the few years. These

investments particularly in renewable energy and manufacturing put the Andhra Pradesh state economy in a good stand to grow in the next few years.

### **Women Work force Participation:**

Tamil Nadu, India's most industrialised state, has a huge women workforce on the factory floor. What is astonishing is that Tamil Nadu's industries employ not only a sizable female workforce, but over half of all women working in factories across India. According to the 2021-22 Annual Survey of Industries, 6.3 lakh or 42 percent of India's 14.9 lakh registered women workers work in factories in Tamil Nadu, (Menon, 2024). The southern states of Tamil Nadu, Andhra Pradesh, Karnataka, and Kerala employ about 70 percent of all women who work in industries, (Mobin, 2024).



Source: National Sample Surveys' Periodic Labour Force Survey, 2017

Tamil Nadu has a higher percentage (42%) of women working in the manufacturing sector compared to Andhra Pradesh, both in rural and urban areas. This suggests that Andhra Pradesh has the significant potential to boost women's participation in this sector, which could drive economic growth and empowerment. Tamil Nadu's achievement in encouraging a considerable number of women to join the industrial workforce can be credited to the state's progressive politics, laws, and supportive environment. Schemes like "Pudhumai Penn" monthly assistance of Rs 1000 to schoolgirls to encourage them to stay in school and free bus travel for women acts as a catalyst in creating a sustainable workforce. The state's emphasis on education and skill development, especially for women. We've helped women succeed in a

variety of manufacturing jobs that have historically been filled by men by providing them with access to high-quality education and career training, (Menon,2024). The Dravidian Model states that a greater percentage of occupations in Tamil Nadu's non-agricultural economy are held by women. The state's Thozhi hostels for working women are one such initiative. In an effort to encourage more women to leave the house in search of employment, inexpensive hostels are built around the state, particularly close to industrial areas. These hostels, which are fully furnished with various room configurations and amenities for working women, also aim to provide safe environments for women, a goal the government is attempting to expand to the workplace. To achieve this, Andhra Pradesh can learn from Tamil Nadu's strategies, such as implementing policies and infrastructure that support women in manufacturing. This includes providing skill development programs, incentives for companies to hire women, and creating safe transportation and exploring comfortable accommodation options.

### **Potential Policy Adoptions for Andhra Pradesh**

Andhra Pradesh needs to emulate some practices from the policy environment of Tamil Nadu in order to improve investors' appeal and industrial development. The elements of the incentives structure that has been adopted are investment size and employment generation similar to the Tamil Nadu policy to make Andhra Pradesh more attractive to large-scale investors and induce industrial growth.

Number of Factories in India and Andhra Pradesh during the period from 2012-13 year to 2019-20 year

umber of Factories						
Years	India	% Change	Andhra Pradesh	% Change	% of Andhra Pradesh	% Change
2012-13	222120	-	15358	-	6.91	-
2013-14	224576	1.11	15719	2.35	7.00	1.30
2014-15	230435	2.61	16012	1.86	6.95	-0.71
2015-16	233116	1.16	16340	2.05	7.01	0.86
2016-17	234865	0.75	16246	-0.58	6.92	-1.28
2017-18	237684	1.20	16296	0.31	6.86	-0.87
2018-19	242395	1.98	16739	2.72	6.91	0.73
2019-20	246503	1.69	16924	1.11	6.87	-0.58
Mean	233961.75		16204.25		6.93	
SD	8319.91		510.06		0.05	
Co-efficient of						
variation (%)	3.56		3.15		0.72	
CAGR	1.31		1.22			

Source: WWW.CEICDATA.com/Ministry of statistics and programme Implementation; Reserve Bank of India – Publications; Statistical Abstract, Andhra Pradesh.

Though having huge potential due to geographical advantages and better connectivity Andhra Pradesh accounted for 6.93% of all factories between 2012–13 and 2019–20. However, Andhra Pradesh only contributed 3.82% of the total output value. Thus, steps must be implemented to boost Andhra Pradesh's industry's productivity, (Lakshmi & Rao, 2023). Also, this is reason to assume that augmenting targeted and sector-specific incentives might lead to investments in priority sectors of development. Greater emphasis on generating employment could require tying of incentives to the number of new jobs created to foster industries' commitment towards increasing employment opportunities and thus help to lower levels of unemployment in the state. To further enhance workforce productivity and skill gap the state government of Andhra could consider adopting initiatives similar to Tamil Nadu "Naan Mudhalvan" Scheme. This focuses on bridging the gap between education and employment. Last but not the least, specified and clear norms and criteria relating to

investment promotion subsidies can add to transparency and certainty for the investors and help Andhra Pradesh in becoming a more attractive investment site.

# Andhra Pradesh's New Industrial Policy: A Newly Emerging Driver of Growth and Development

The recently announced industrial policy by the Andhra Pradesh government seeks to fast track the economy through planned growth and development. The People Public Private Partnership (PPP) model is an emphasis on establishing industrial parks on private properties with government-provided infrastructure that have the effect of improving the Speed of Doing Business, this policy envisages goals such as attracting \$ 10 billion by 2029, and generation of two million jobs with \$1.5 billion has been provided for meeting the reimbursement liabilities to investors (The Hindu, 2024). The subsidies are tiered depending on the level of energy efficiency improvement special rates range between 30% best 62% for the first 200 participants best 70% for manufacturing companies (Indian Express, 2024). The state is also promoting the decarbonization of industries by providing a subsidy of 6 %, first state to implement in the country. It also includes important industries like automotive, chemical, food processing and pharma & healthcare along with new growth areas of electricity vehicles, renewable energy and aerospace. Furthermore, employment incentives that encourage developing human resources of the country will be available for use by MSMEs. The Ratan Tata Innovation Hub will address the lack of technology and skill upgrades, helping the state achieve its long-term goal of becoming a "Swarna Andhra"by 2047.

### **Conclusion:**

Andhra Pradesh has immense potential to transform into a 'Swarna Andhra' by harnessing its abundant natural resources, strategic geographic location, and forward-looking

policies. The state's current focus on attracting investments in renewable energy, manufacturing, and other key industries is a step in the right direction. Its newly announced industrial policy, emphasizing planned growth, the PPPP model, and industry-specific incentives, holds significant promise. However, its success hinges on effective implementation and alignment with a sustainable and inclusive development framework.

To accelerate its progress, Andhra Pradesh can draw valuable lessons from Tamil Nadu, which has established itself as a manufacturing hub. Tamil Nadu's success stems from robust policies, a supportive business environment, advanced infrastructure, a highly skilled workforce, and a buoyant service sector. For Andhra Pradesh to bridge the gap, it must prioritize productivity enhancement, workforce skill development, and reducing bureaucratic hurdles. Strengthening investor confidence through well-designed incentives and fostering a conducive environment for enterprises will also be crucial.

If the industrial policy is implemented within a sustainable and inclusive development framework, Andhra Pradesh can achieve rapid industrial growth, significantly improve its economy, and ensure better opportunities for its people.

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