

# Architecture as a Trigger for Socio-Economic Development

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## **Abstract:**

Settlements in rural India are socio-culturally unique. Their physical cluster based pattern, occupational pattern, cultural dimensions and economy set them apart from the rest of the world. But the most important parameter that keeps them distinct and grounded is their people and culture. Urban settlements in India are growing rapidly, diminishing the rural counterpart. Many villages are becoming part of Urban Agglomeration or are under heavy pressure of urbanization. It is without doubt that, cultural dimension of rural habitats is one of the major parameters for which our country is recognized worldwide.

Most of Indian rural and peri-urban areas have long-established craft clusters or communities which impact the livelihood of the residents. These crafts in many settlements were the second best employment generator after agriculture be it pottery, toy making or textiles. These craft communities are under transition due to changing times. Social cohesiveness of such settlements are also in danger due to migration and changing social dynamics. This impacted their settlement patterns adversely. These aspects needs urgent attention of policy makers and Indian rural areas are in dire need of rejuvenation.

Architecture or built environment plays an important role in creating an identity of an area. It also provides people the suitable platform or arena to perform their activities, social or occupational. Appropriate spaces with right mix of user centric activities creates excellent places to inhabit and thrive. Wisely designed architectural programs in underprivileged areas can trigger growth potential. Truly said by Winston Churchill, “we shape our buildings; thereafter they shape us.” This concept paper aims to investigate the power of right architecture as a trigger for socio-economic growth of a less focused area with the help of case studies and pre – post scenario analysis. The paper also discusses the tailored approach to design right architecture insert in such existing settlement so, that its inherent characteristics don’t get affected adversely as well as it doesn’t dilute its conventional cultural identity.

**Keywords:** Architectural Insert, Development trigger, Socio-Economic Development, Rejuvenation

## **1. Introduction**

Architecture plays a multifaceted and influential role in society, impacting various aspects of daily life and cultural identity. It is deeply intertwined with societal values and needs. It not only creates the physical backdrop for daily life but also influences cultural identity, economic development, environmental

sustainability, and overall well-being. Iconic buildings and landmarks often become symbols of a place's heritage and collective memory. Real estate development and architectural projects can stimulate local economies by attracting businesses, tourism, and investment. Architectural insert can also create new markets and job opportunities.

Thoughtfully designed urban spaces can revitalize declining areas, attract businesses, and improve the quality of life. Projects like affordable housing, mixed-use developments, and public spaces can transform neighborhoods, making them more accessible and inclusive. Thoughtfully designed urban spaces can revitalize declining areas, attract businesses, and improve the quality of life. Projects like affordable housing, mixed-use developments, and public spaces can transform neighborhoods, making them more accessible and inclusive. Sustainable design practices can reduce environmental impact and promote long-term economic savings, impacting climate change initiatives and helps fostering a sustainable lifestyle. Architecture of pride can reflect and reinforce cultural identity, fostering a sense of belonging. Well-designed spaces that honor local traditions and histories can strengthen community bonds and cultural heritage. Design influences mental and physical health by creating environments that support well-being.

### **1.1 Concept of Socio-Economic Development**

Socio-economic development aims to enhance the overall quality of life, reducing poverty and disparity, and fostering economic growth by a range of social and economic activities and policies. It aims to reduce poverty by improving access to resources, education, and employment opportunities. It seeks to ensure that the benefits of economic growth are distributed more equitably. Building and infrastructure supports economic activities and improves living standards. Building and maintaining infrastructure, such as transportation networks, utilities, and communication systems, supports economic activities and improves living standards. Beyond material wealth, socio-economic development aims to improve overall quality of life, including access to cultural, recreational, and social opportunities that contribute to personal well-being and happiness.

### **1.2 Aim and Objective**

The aim of this study is to understand the role of an architecture development as a trigger to area level socio-economic development. This research paper attempts to provide an in-depth understanding about the importance of good built-environment for encouraging communal environment which ultimately leads to enhanced productivity ensuring better socio-economic development. It also attempts to understand how the appropriateness of architecture retain the essence of rural lives and their way of living by incorporating measures, which preserves their cultural and communal beliefs at the same time create opportunities for them to adapt and learn new methods and enrich their identity.

Research Questions here are, how architecture can shape society, how it can integrate temporal changes in peoples' lives as well how architecture can affect the cultural identity of a community.

## **2. Research Methodology and Framework**

The methodological approach for this architecture study and design includes a comprehensive literature review and case studies. Data were collected from secondary sources. Secondary data were collected from books, journals, newspaper, internet sources etc. The literature review explores few cases where architecture development played as catalyst for area level reforms. Case studies analyze magnitude of the insert,

population affected and resultant changes. This paper ends with a case of design proposal, an architecture development, to upgrade the livelihood of rural craft clusters artisans.

### 3. Architecture as Catalyst for Socio-Economic Development

Architecture can significantly impact socio-economic development by improving infrastructure, enhancing community engagement, and stimulating local economies. It can also elevate the sense of pride amongst the citizens and enhance cultural identity. Below are some of the examples illustrating the role of architecture as a catalyst for socio-economic development.

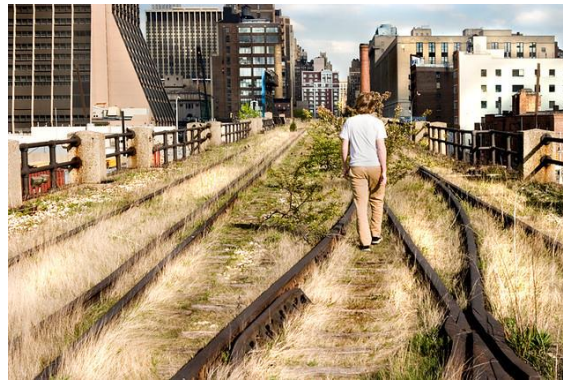
#### 3.1 Global Example: High Line, New York

First project presented here is famous The High Line of Manhattan, New York, which was used to be a fully functioning goods rail line. This example emphasizes on the role of the architecture to bring about positive social change in the existing urban scenario. Previously a non-functional railway line, kind of urban void, was redesigned to be a vibrant public space in the heart of the New York, serves a massive population through a simple design intervention.

The High Line was originally built in 1934 as part of a massive infrastructure project called the West Side Improvement. It is lifted train traffic 30 feet in the air, carrying meat, produce, and factory goods. This elevated rail line was initiated to remove dangerous trains from the streets of Manhattan's largest industrial district. Due to shifting of industrial units it served and in the wake of better alternatives of transportation in 1980s, the high line was discontinued and the elevated train tracks became deserted unused spaces posing threat to the neighborhood's safety and hygiene. Almost after 20 years of its discontinuation, some active residents began petitioning for area's preservation and reused and in 1999 they founded 'Friends of the High Line', the non-profit caretakers of the High Line. They floated an idea competition to invite public opinions regarding its proposed reuse. 10 years later, in 2009, the high line elevated park's first section was opened to citizens of New York, offering landscaped pathways integrated with seating for socialization with different great views of city (Perry).



**Figure 1 before - when in use for transportation of goods**



**Figure 2** after-when rail line not in use - dead space



**Figure 1** Now: a vibrant public space (Blog)

### 3.2 Asian Example: Marina Bay Sands, Singapore

Marina Bay Sands is an iconic integrated resort located in Marina Bay, Singapore. It was developed by Las Vegas Sands Corp and officially opened in June 2010. The project, designed by architect Moshe Safdie, is renowned for its striking three-tower design and its unique sky park that spans the top of the towers. Sky Park offers an observation deck and infinity pool perched 200 meters above the ground, offering panoramic views of Singapore's skyline. One of the largest gaming venue in the world, it also houses hotel, convention and exhibition spaces, a shopping mall with luxury boutiques and a diverse range of dining options, a theatre for large-scale shows and performances. It created a significant socio-economic impact on the area as well as it has enhanced Singapore's global appeal as a major destination for business and leisure. It has become a symbol of the city's ambition and modernity, attracting international investment.

This development has driven improvements in local infrastructure, including transportation links and public amenities. The Marina Bay area has seen a rise in property values due to the prestige and desirability associated with living and working near the iconic resort. This has had a broader impact on the real estate market in Singapore. Marina Bay Sands' construction and ongoing operations have created thousands of jobs in hospitality, retail, entertainment, and administrative sectors. The total construction cost of Marina Bay Sands was about USD 5.7 billion. The resort has also spurred job creation in ancillary services such as transportation and food supply. It is estimated that MBS creates approximately 15,000 to 20,000 jobs when including indirect employment. The influx of visitors have stimulated local businesses. Retail shops,

restaurants, and service providers in the surrounding areas benefit from the increased foot traffic and high spending power of the resort's visitors. Marina Bay Sands has been a significant source of revenue for the Singaporean government through taxes, gaming levies, and other regulatory fees. The casino alone contributes substantially to government in form of gaming levies. MBS contributes a significant portion to Singapore's GDP, especially through tourism and hospitality sectors. Estimates suggest that MBS's economic contribution could be in the range of 1% to 2% of Singapore's GDP, reflecting its importance to the national economy ((EDB)).



**Figure 2 aerial view of the area - before MBS (Soh)**



**Figure 3 aerial view of the area - after MBS (Soh)**

### **3.3 Local Example: Statue of Unity, Gujarat**

The Statue of Unity, the Tallest Statue in the world, is a tribute to Sardar Vallabhbhai Patel's life, a freedom fighter and India's first Deputy Prime Minister. The Statue was to accelerate tourism within the region and the surrounding 2,200-acre preserve along the Narmada River, where it is located. In addition to the Statue, which stands on an island in the river, there is an exhibit hall and memorial garden at the base. The project includes a canopied bridge to the island, a visitor's center, a hotel with a conference center, a transit center, and a 3.5 km road from the nearby town of Kevadia. This project was launched in 2010 as a public-private partnership model and was completed in 2019. Standing at 182 meters, which is twice the height of the Statue of Liberty, the Statue of Unity in Gujarat rises on India's western shore as the pride of the nation built on a budget of Rs. 2,989 Crore (USD 450 Million). Constructed by Larsen and Toubro (L&T), the Statue of Unity is located on Sadhu Hill on the banks of the Narmada in Gujarat. The statue towers over another engineering

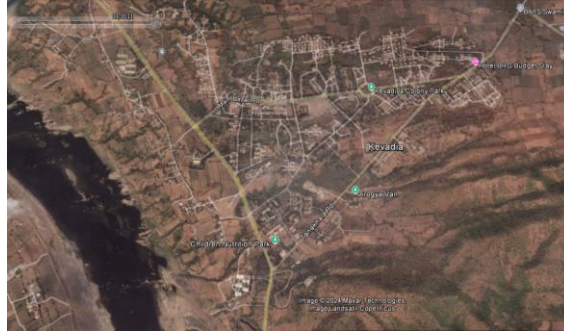
marvel, the Sardar Sarovar Dam, and has already become a draw for tourists from across the country. Construction of a statue of this magnitude was one of India's unique projects in recent times. The project is grand in terms of the size of the Statue and the challenges it posed for the engineers, government, local community, and the environment. Not only it is now a pride of the nation, but it has also now become a source of employment and income generation for the local community through the boost the Statue has provided in the region (Sarbjit Singh Oberoi). The project gave employment to over 8,000 people, including over 2,000 local residents during the duration of the project construction. The Statue of Unity has attracted over 1.5 million tourists since its inauguration on 31 October 2018. It has boosted the local economy by providing direct and indirect employment. As per tourism details shared by Gujarat Tourism Department, 2.6 million tourist footfalls at the State of Unity have generated an earning of Rs.570 million through selling tickets from 1st November 2018 to 12th September 2019. The daily average from the first year increased by 74 percent, 15,036 footfalls registered in the first month of the second year, which further rises to 22,430 on weekends. The development of the Statue of Unity has had a positive impact on property values in the vicinity. Real estate prices in areas close to the monument have increased due to the heightened interest and investment in the region. Statue of Unity is the tallest of all other comparable statues in the world. One can compare them in more parameters as well. The parameters could Cost, Year of completion, Height, Daily Tourist Average, and the time taken to complete the project. Below is a brief comparison of the Statue of Unity with three other renowned statues – The Spring Temple Buddha, The Statue of Liberty, and Christ the Redeemer in table below (Sarbjit Singh Oberoi).

Parameters	Statue of Unity	Statue of Liberty*	Spring Temple Buddha	Christ The Redeemer*
<b>Cost</b>	\$450 Million	\$250,000	\$18 Million	\$250,000
<b>Year of Completion</b>	2018	1886	2008	1931
<b>Time Taken</b>	5 years	11 years	11 years	9 years
<b>Daily Tourist Average (2019)</b>	15,036	10,000	2,800	5,500
<b>Height</b>	182 meters	93 meters	153 meters	39 meters

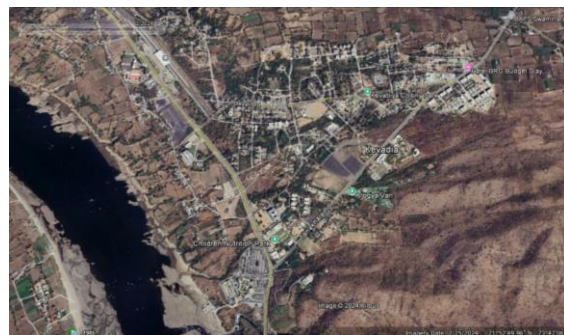
**Table 1 comparison of various statues across world (Sarbjit Singh Oberoi)**

*\*The cost of construction for The Statue of Liberty and Christ the Redeemer would be a lot higher if we consider it in today's inflated values.*

Apart from socio-economic impact on the area, the Statue of Unity has fostered a sense of national pride and unity. The monument has become a site for educational tours, promoting knowledge about India's history and heritage, and contributing to civic education. The statue has garnered international recognition, enhancing India's global profile as a destination for tourism and cultural heritage.



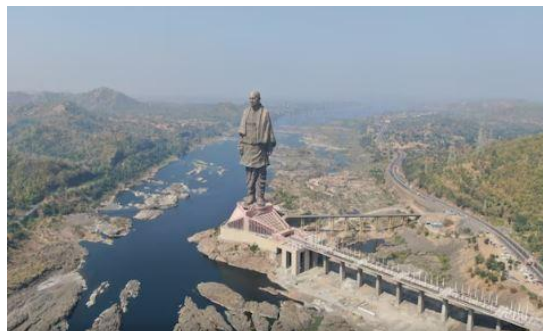
**Figure 4 Area around SOU, Guj. (Nov 2011\_Historical Imagery Google Earth)**



**Figure 5 Area around SOU, Guj, (Feb 2024, Historical Imagery Google Earth)**



**Figure 6 Site for SOU, Guj (During Construction)**



**Figure 7 SOU, Guj.**

#### 4. Discussion and a Way Forward

Above examples show the capital investments done in form of architecture projects which can yield many benefits like, creation of construction jobs & long-term employment opportunities, tourism and revenue generation, asset building, enhancement of property values and real estate, positive cultural and social impact, improved infrastructure and better connectivity, technological advancements, investment attraction and image building of an area. Such a development can bring in positive *chi* in the area and trigger for development. Community outlook becomes positive and growth oriented. This aids in building a development oriented environment. This type of developments are necessary in deprived or overlooked areas of rural India. Rural India has very diverse cultural traits geographically. So, such investments should be done in a manner that, it enhances their cultural pride, retain their traditional practices and at the same time, community outlook becomes growth oriented.

Massive investments as described in case studies above, which may yield regional or country level benefits, are not necessary in all situations. Small scale, modest or humble interventions can also result in socio-economic upliftment of a cluster of villages, influencing thousands of lives. Neighborhood level interventions can also serve as a prototype for areas around and provide an area level development stimulus. Public participation is one key factor for success in all the examples described above which is not discussed in this paper in detail. Importance of this aspect can also be analyzed in further studies.

#### 5. Conflict of Interest

Authors declare no conflict of interest with anybody/any organization.

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