



Revitalization of Catchment Area of An Existing Commercial Hub: A Case Application at Hatibagan-Shyambazar, Kolkata, West Bengal

Sandipan Sinha^{1*}, Sanghamitra Sarkar²

¹PG II, Urban Design, Jadavpur University

²Assistant Professor, Department of Architecture, Jadavpur University

Abstract:

The century old metropolises of India have witnessed some kind of organic growth especially at the city core area throughout the ages when development control was partially or not properly implemented. As a result, these cities have ended up being congested and eventually the essential functions also have been fragmented and unorganized. Market or commercial areas as a matter of fact became the center of complete haphazard organization of space with very essential functions juxtaposing on each other and creating inconvenience for them to function smoothly. The city of Kolkata has also suffered the same fate in those age-old commercial hubs of the city which considered to be situated at the core part of the city of joy. In this research the Shyambazar and Hatibagan markets have been chosen to visually study the basic problems of disorganization of space. This area is one of the biggest hawker markets of north Kolkata, which adds up to the problem. On the basis of a few Urban Design parameters the reconnaissance survey has been taken place to establish how much these places are in need of a rejuvenation to prevent them to turn into urban blight. The need to stop the gentrification the need intervention from Urban Design point of view has been established through the research work.

Keywords: Revitalization, Commercial Hub, Catchment Area, Kolkata

1.0. Introduction:

Revitalization: According to Oxford Thesaurus Revitalization refers to make something stronger, more active and healthier. In Urban Design practice this term is not much older than fifty years. During 1950s the term 'Urban Renewal' first conceptualized by rebuilding a part of the city after the devastation of WWII. Later on, as the Government/s started changing the policies, the concept started to evolve as well. "So, in 1960s, it was urban revitalization, in 1970s urban renewal, 1980s urban redevelopment and finally in 1990 it was urban regeneration." (Robert & Sykes, 2000) ^[1]. Nowadays revitalization is considered as a tool to upgrade city core areas as they can retain their value in the fast changing twenty first century city landscape. In a report by ADB (Asian Development Bank) Florian Steinberg (2008) ^[2] opines- "While cities in Asia and the Pacific have been concentrating on their conventional infrastructure requirements, many cities are still discovering how to deal with the challenge of urban renewal in a broader sense." Often, we get to see the concentration of commercial activities into a certain stretch of these old city areas, besides their high-density residential blocks.

Commercial Hub: As per the Oxford Thesaurus the Commercial Hub is the most important part of a place where commercial activity takes place. Commercial activity is conceptualized by buying or selling goods where at both the sides there will be common people. Commercial Hubs are sometimes defined as downtown business district which could be delineated by mostly mixed-use kind of land use of the area where, plots adjacent to the road are commercial and behind that mostly of residential use. Very often revitalizing urban commercial areas of an existing city comes up with these advantages:

- Accessibility of that hub from the catchment areas improves.
- It reduces urban sprawl by concentrating business in that particular hub.
- This part of the commercial hub becomes part of the walkable community.

Being a place of multiple activities, it creates a visual as well as functional chaos which could be addressed by revitalizing an urban commercial hub. According to, Paul D Sprenger^[3], there are some standard steps to revitalize a commercial hub:

- Orientation of Building to the street
- Creation of inviting corners for pedestrians
- Addition of community space and special features
- Placing of parking behind or beside a building
- Provision of pedestrian connection
- Addressing human scale with building and landscape details
- Incorporation of mixed use

If one area of the city, where the commercial hub lies, gets developed without proper master planning, i.e., just by piecemeal growth then the trade companies take the initiative to build the major distribution network. Eventually this type of developments has a major impact in terms of the biased and unplanned infrastructure development with respect to the entire city.

Catchment Area: From geographic point of view catchment area is the surrounding stretch from where the people may be drawn to the point for the principal activity of a place. Here in the case of commercial hub the principal activity may be shopping or buying of goods. “The general concept of a retail catchment comprises three major components: supply factors, demand factors and consumer interactions.” (Birkin et al, 2010)^[4]. Out of many technical methods to delineate a catchment area of a commercial hub depends on, available data, requirement for the particular study and the analytical capability of the researcher or the analytical tool used by the research. Drawing concentric circles with different radius around the commercial area can be a method.

However, when an entire town center or shopping street is considered, such techniques are unlikely to sufficiently capture the complexity of those different attributes that may influence true catchment extent. (Birkin et al., 2010; Dramowicz.,2005)^[5]. In urban areas it might happen that the catchment areas may overlap due to the presence of more options to the buyers. In case of Kolkata, one gets to see a number of these areas which has proximity to more than one commercial hub. Shyambazar commercial hub can have overlapping catchment area of Maniktala commercial hub.

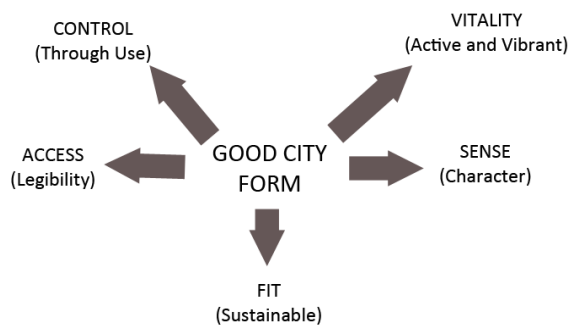
Kolkata: Kolkata has a rich history of more than 300 years, in between it has served as Capital of British India from 1772 to 1911. When Job Charnock established Kolkata, long ago before that it was a natural region for trade and commerce even with the Portuguese from Goa. “The Portuguese began to frequent the river by 1530. They did not risk their ships in the shallow water and lay at anchor at Garden Reach. A market sprang at Betor near Shibpur.” – Rama Deb Roy^[6] says.

The trade and commerce of the city of Kolkata was centered around some regions. Sutanuti-Shyambazar region, Bara bazar region are two most old commercial hubs of Kolkata. After the planning intervention at the Esplanade area New Market became another commercial hub since then. In the southern part of Kolkata Gariahat emerged as a natural market and commercial Hub. Apart from that there are a number of small markets to promote the trade and commerce throughout the city. After the opening of Forum- Courtyard, the first shopping mall of Kolkata in 2003 the situation changed hardly a bit. People of Kolkata are more and more comfortable shopping from those former markets as they bring in a lot of options in lower budget. Now the difficulties with these markets are the encroachment of pedestrian area of the road, creation of hustle at the road itself which results in traffic jam, creation of problem by concentrating the vendors at the street junctions, creation of visual clutter and inconvenience to cater the basic services. As the existing commercial hub and the catchment area of Shyambazar-Hatibagan area has developed with piecemeal growth in time the simple problems of distribution channel, overcrowding and juxtaposing of commercial units in the pedestrian area, are needed to be solved in order to revitalize that urban area.

This paper will establish the context of revitalization of a commercial hub including the traditional market spaces as well as street vending along the both side of the road between two traditional market places. The case application has been identified as Shyambazar-Hatibagan area where the Shyambazar Market and Hatibagan Market demarcates the two ends of a commercial hub connecting these two inclusive. The market buildings are century old and prone to manmade accident at any point of time. In fact, 2012 witnessed a devastating fire at Hatibagan market leading to a lot loss of business.

2.0. Literature Study:

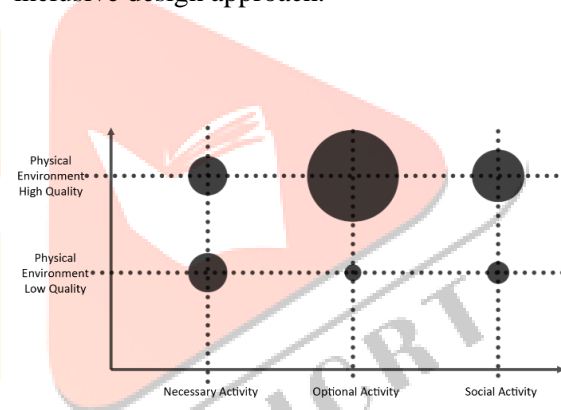
Now the discussion will be on some theories of urban design, we consider them important regarding revitalization and very much contextual regarding this study. Firstly, we will discuss the theory of Kevin Lynch i.e., Good City Form ^[7].



Picture 1: Good City Form by Kevin Lynch

In his book 'How to Study Public Life' (2013) Jan Gehl ^[8] have shown that how increased outdoor quality can increase optional and social outdoor activities. This has been shown with a nice illustration in terms of relationship between these two (Pic. 2). Optional activity can be, according to Gehl, reading newspaper sitting on a bench by the road. Social Activity Refers to meeting a friend suddenly and chit-chatting for sometimes, may be inside the market or on the pavement of the road, or near a street crossing.

In his book "A Theory of Good City Form", Kevin Lynch figured out the answer to the question 'What makes a good city core?' and the process leads to a comprehensive discussion of Urban Design Theory. Lynch provided 5 criteria (Pic. 1) plus, two meta-criteria named Vitality, Control, Access, Fit, Sense plus Efficiency and Justice. These two meta criteria actually direct towards the robustness of the system as well as inclusive design approach.



Picture 2: Relationship Between Outdoor Environment Quality and Outdoor Activity

When we talk about the revitalization of Commercial Hub, we need to study the existing setup in detail. Because in Indian context commercial hubs grow in a very organic pattern. So, before we propose we need to ensure that we concentrate on these aspects:

- Design/Physical Improvement
- Promotion
- Economic Development
- Safety and Cleanliness

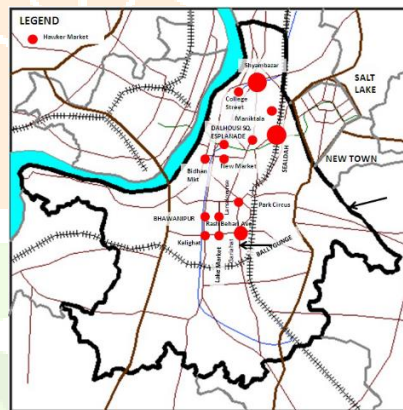
To serve these all purposes we must follow a step-by-step procedure to study the whole area designated as commercial hub. Eventually when the hub extends on the pavements of the adjacent road and a mixed-use type of land use zone then these steps become very essential to lead towards an incisive design solution.



Picture 3: A step-by-Step Study Leading to Urban Revitalization. Source: Author

Commercial Hub Revitalization: The moment Urban Design intervention in terms of Revitalization gets coined up one of the inevitable points also coins up as the issues with the place. We know that the market area, may be indoor or outdoor, covered or uncovered, mostly unorganized and the traditional one is a public interactive space also. If this aspect of public interactive space is neglected then the obvious outcome of the degradation of quality of the space is inevitable. According to Lefebvre the urban space is a social construct, rather than a neutral construct. The social relations, through which these spaces are being created, that he characterizes as a triad of spaces: spatial practice, space of representation and representation of space. So, when we approach for the urban design intervention for a commercial hub, which is a public space as well we need to concentrate towards the inclusive design approach.

In Kolkata there are some specific commercial hubs which are operational and here is the mapping of the same according to Chatterjee and Roy (2016)^[9]



Picture 4: Market Clusters of KMC area. Source: Chatterjee and Roy 2016

Here we found from the pic 1 that Shyambazar is one of the most important Market Cluster of KMC area. We also found that the Market Cluster is concentrated between two important built-up markets Hatibagan and Shyambazar. These two conventional markets are connected through Bidhan Sarani which has given place to the hawker's area through this stretch at the both side of the carriageway.

Although we found the hawkers have taken over almost the whole pavement towards more south up to Rupobani Cinema Hall, in east it stretches all along the Aurobindo Sarani up to APC Road as well. The hawkers have taken over the both sides of the road along RG Kar Road from Shyambazar Market to Canal West Road. So, the market is actually spread occupying the roads of Ward no 10, 11 and 12. The whole urban district of market is characterized by very old market centers, all the pavements of adjacent road occupied by street vendors, disturbed traffic movement due to the pedestrian moving along the carriageway, a total visual clutter with innumerable billboard, sometimes completely covering up the edge of the buildings along two sides of the road. Another very important aspect of this area is the Heritage buildings and many dilapidated buildings stuck in the fight of ownership lawsuit. A number of buildings, which used to be once very famous cinema and theater halls are very fast closing off and changes its character from recreational to commercial.



Picture 5: Shyambazar, Hatibagan Market and Their Catchment Area around 500 m Radius. Source: Author

This image shows (in yellow hatch) two designated markets of Shyambazar and Hatibagan. The two circles have been drawn with these two markets at the center and with 500m radius around it as walking distance to and from those markets. River and Canal near the place have been shown beside the major roads in and around the area.

3.0. Analysis:

3.1. Path: According to Kevin Lynch^[10] Paths are the channels along which the observer moves. The movement can be customary, occasional or potential type of movement. To discuss about Path in an urban set up first thing comes in mind is movement along road, both on the carriageway as well as on the pavement. If pavement is taken over by informal vendors, then pedestrians are compelled to use carriageway to walk and thus it disturbs the movement of vehicles. Vehicles includes the public transit as tram, bus, para transit like auto, Hand pulled rikshaw and private vehicles including two wheelers along with four wheelers. Apart from that we can mention the vehicle of goods as this is indispensable for marketplace, both formal as well as informal. To reinforce this importance of streets Jane Jacobs (1961)^[11] said, “Think of a city and what comes to mind? Its streets” (p.29)

So free flow traffic and pedestrian movement needs to be ensured by creating designated pavement space for pedestrian, designated carriageway space for vehicle and designated parking space for vehicles. As the pavement is almost blocked by vendors then vendors also are needed to be reframed in the place to accommodate them also in designated pavement area.



Picture 6: Current Condition Shown by A Schematic Section Through Road. Source: Author

The movement problem of the study area is shown by a cross section of the road (Pic.6). The tram service is still operational here in route no.5 i.e., Esplanade-Shyambazar route. Shyambazar Tram Depot is the point which is situated at Bidhan Sarani and still operating a historic public transport system.



Picture 7: Tram Depot at Bidhan Sarani(A), Tram at Move Through Bidhan Sarani(B). Source: Author

The other traffic movement have reduced to only the central part of the carriageway (Pic. 8, A). Both the sides have been taken over by parking and pedestrian (Pic.8, B) and vendors with pedestrian either buying or a simply walking through (Pic. 8, C).



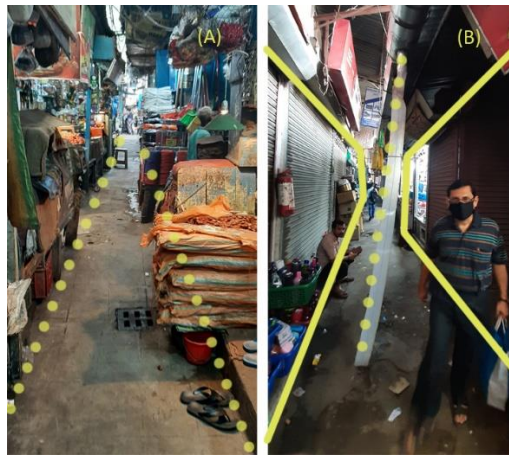
Picture 8: Carriageway Blocked by Pedestrian, On-Road Parking and Vendors. Source: Author

The pavement also has hardly had space for pedestrians as they have been almost blocked by street vendors. There is no standard size for the vending stations and they perform all the loading unloading activity during day-time and their stored materials along with the displayed ones also eat-up public movement space (Pic. 9).



Picture 9: Vendor occupied Pavement, Bidhan Sarani. Near Minar Hall(A), Near V2 Shopping Store(B). Source: Author

Movement along the Paths inside the market area are also another issue which need to be addressed. Generally, through the allies which are now being used to walk through the market is also being jeopardized by the space occupied by the spaces occupied by the shops. Inside the market area. People need to stand in front of the shops and order for the product or look for the right product. Sometimes in the middle of movement channel the rain water from the vast roof area are released and this makes the movement for the buyers very difficult. This alley is actually not adequate for the movement of the materials as well, which gets delivered during business hours only. When this type of movement occurs, it becomes almost impossible to move through these paths (Pic 10).



Picture 10: Movement inside the Hatibagan Market. The stored materials block the pathways(A). Rain water gets released at the middle of the pathway(B). Source: Author.

Due to this problem of the movement along the designated pathways Kolkata police creates another pedestrian channel on the main road by putting fence on the carriageway itself. If observed then it is clearly visible that these needs are getting needed as there are inadequate space left in the pavement and it doesn't let pedestrian to move freely when one is intended to just walk through fast without getting the attention of the vendors and vice versa. This tendency shows that there is immense need of design intervention in this area (pic 11A). During Durga Puja festival all along the Bidhan Sarani this temporary fence is created by Kolkata Police to ensure pedestrian safety as the whole pavement becomes almost impossible to move for a passerby, who is not a buyer. (Pic. 11B)



Picture 11: Pedestrian Path on the Carriageway. At Shyambazar Five Point(A), At Bidhan Sarani during Durga Puja Festival(B). Source: Author.

3.2. Activity: Activity is referred to the dominant visible activity. Lynch said^[10], concentration of special use or activity may create a prominent idea about the place in the mind of an observer. Activities can be classified in three types, necessary activity, optional activity and social activity. There are sellers, buyers and vendors as three important components of commercial hub. Apart from that there are through traffic and pedestrians, local residents out for a walk. All of these components are needed to be taken care when the activity of people is being studied.

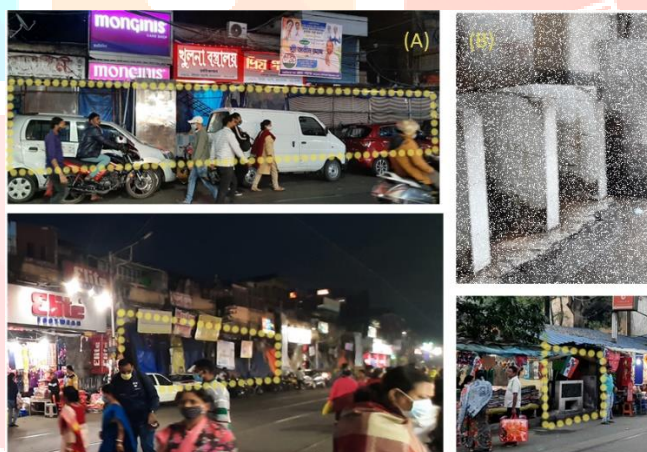
For sellers, their necessary activity is to load unload and store their products. Among them food products need to be sold directly in the store or to be cooked in the kitchen. The stores like KFC manages their kitchen very professionally and there is hardly any loading unloading during daytime. But local sweet sellers like 'Sen Mohashoy' are having quiet small kitchen, and their stock of food comes from a distant workshop daily in the early morning and evening time. Food sellers perform another activity of waste store and disposal. Sellers of garments are seen the most among all the sellers. There are pretty good need to perform the display activity for this kind of sellers. In most of the cases their promotion and display get disturbed by the vendors on the pavement, who almost block the frontage of the shops (Pic 12).



Picture 12: Shops on the Edge Get Sometimes Completely Blocked(A) or Partially Blocked(B) By Vendors. Source: Author

Buyers from in and out of Kolkata prefer this market mostly during festival shopping because this place offer both the branded and local made garments. Apart from it bags, footwear, ornaments, home decors etc. are available with an option of high range of pricing from expensive to very cheap ones. Street vendors accept negotiations regarding the price and it takes comparatively long time to buy a product result into standing long time in front of the stall thus blocking the very small pedestrian path for that time. The optional activity like having a fast food from the street side vendor also result into same whereas this don't happen when people choose an eatery which has interior seat out facility. So instead of the lack adequate pedestrian path and lack of social activity space this area still attracts the buyers and they could have been given the improved environment quality so that the buyers could be attracted more to this commercial hub.

Vendors, as they are one of the indispensable parts of this area, should have got better space management so that, the quality of the place improves. They perform loading and unloading their products during pick time also as there is no control of it. They not only occupy the pavement but also sometimes to increase their display and to protect their products from sun or rain they made the edge of the road completely blunt and messy sometimes (Pic 13, A). the hygiene is completely ignored as there are no good toilet for the vendors (Pic 13, B) inside the market as well as on the stretch of Bidhan Sarani.



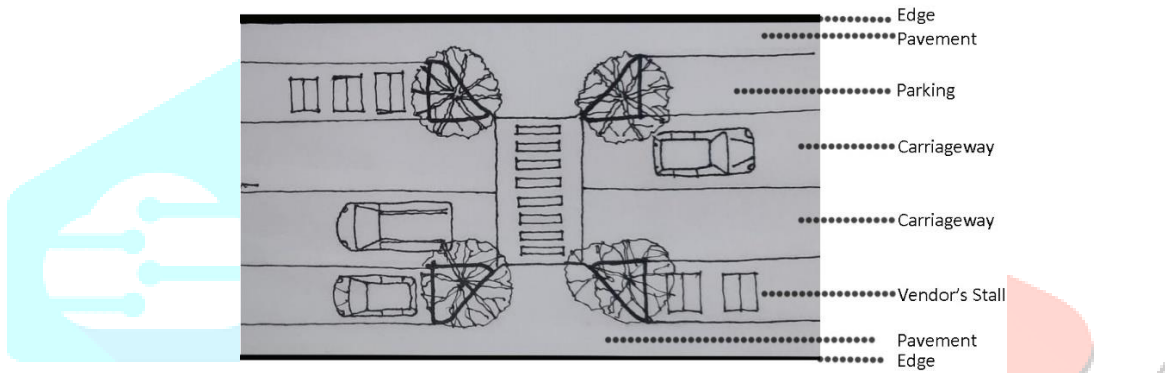
Picture 13: Vendors Blocking the Edge of the Road(A), Inadequate Hygiene for Vendors, Toilet inside the market and on The Road(B). Source: Author.

3.3. Space: Space is referred to Public Space/Urban Space. Both the markets Hatibagan and Shyambazar are occupying big urban area/space almost 1.5 Acre each. The single-story structures could have been increased one story up for better operability and better space utilization. These two century old markets are standing on land area more than 1.5 acre each. Both of them are covered mostly or partly with metal sheets over iron truss (Pic 14). As the land price of this region is going up in leaps and bounce with time, this is the only way to increase the height of the building and create more spaces for better accommodation and improved space quality effectively. There used to be a time when the land of these markets used to belong to rajas and zamindars. Gone are those days and the ownership of the land are in dispute. This is the high time to intervene with urban design principals and to make these place more and more usable and effective.



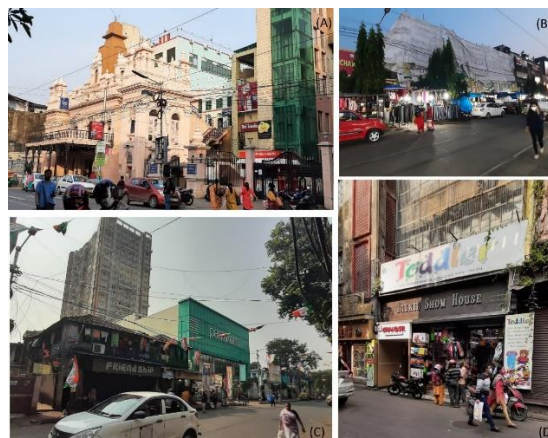
Picture 14: Roof showing the total space of Hatibagan (A) and Shyambazar (B) Market. Source: Author

There is the urgent need of designated space for each and everyone. When the intervention takes place, it is to be remembered that each one of the vendors or sellers are getting designated space. Unofficial encroachment should be replaced by spaces designed for a purpose which really don't change the character of the place but improve the quality of environment towards a higher level. May it be the bus-stop or a simple seating arrangement, a small child play area or adequate pedestrian pathway or even a stall for the vendors has to be minutely thought out and designed (Pic. 15).



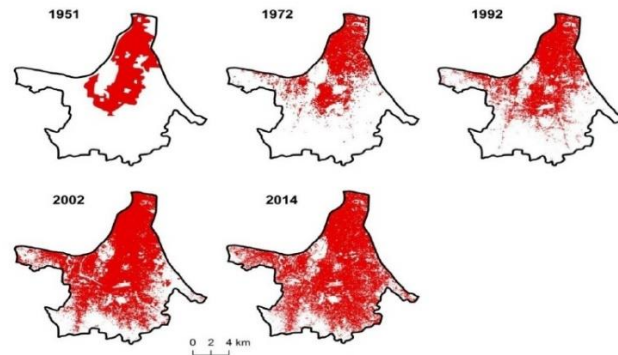
Picture 15: Schematic Space Segregation on The Street. Source: Author

The Shyambazar area once used to be the cultural center of the Kolkata. Beside the classical Star Theatre there used to be a number of cinema and theater halls here. Theatre has been the established fine art, from which cinema was evolved, but slowly it lost its appeal and popularity with the rise of cinema. With the advancement of multiplexes now all the cinema hall land parcels here are being substituted with commercial, residential or mixed-use commercial-residential type of establishment. Star Theatre has gone through restoration to evoke a feel of multiplex (Pic 16A). Recently cinema hall Mitra has been broken down for another commercial set-up to be established (Pic 16B). Bidhushree cinema hall has been transformed into a mixed-use residential high-rise and Pantaloon store (Pic 16C). Talkie Show house is closed and the front part is being used as toy-shop and restaurant (Pic 16D). The hall space is now being used as store for those commercial set-ups. Shree has been broken down to build food court like KFC, Wow Momo etc. Bazzar Kolkata has been built on the site of Radha Cinema Hall, where as City Mart site used to be Uttara Hall. Rupbani Cinema has been transformed into Disha Eye Foundation.



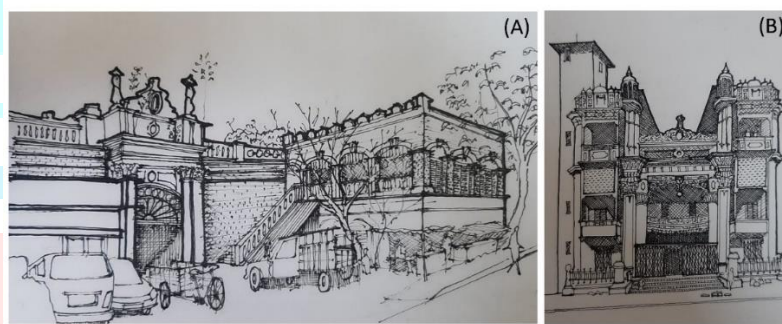
Picture 16: Transforming Movie Halls into commercial and mixed-use development. Source: Author

3.4. Form: Form here has been referred to the Urban Form. Here in the study area the Urban Form can be classified by the characteristics called, dense and coarse built form. The Shyambazar-Hatibagan area of the city is one of the oldest settlements of the city of Joy. But as the city grew slowly after independence and at a fast pace in last few decades ^[12] (pic 17).



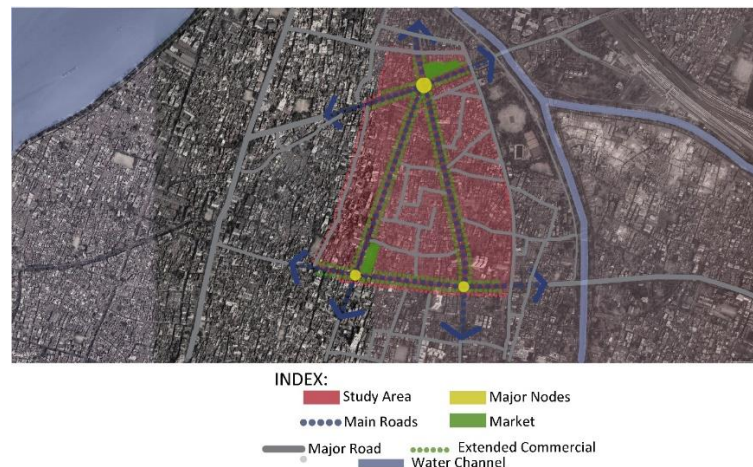
Picture 17: Spatial-Temporal Urban Growth of Kolkata City. Source: Mahata, D. et al 2017

With this fast change the demographic and economic characteristics of the urban population also getting changed and these triggers change of land use pattern and the very form of the city. As the study area is taken from Shyambazar Commercial Hub it shows that the very dense population, crowded pavement, disturbed traffic and changing land use are reshaping the form of the city which have been taken into consideration for this study.



Picture 18: Classical Structures in the precinct. Source: Sketches Author

The study area falls under three municipal wards of KMC i.e., Ward no. 10, 11 and 12. This area shows a classic part of Kolkata city where there are lots of Heritage Buildings (Pic. 18) and some of the old structures are at derelict condition. There are three important nodes among which Shyambazar five point is one. The Hatibagan Market and Shyambazar Market has been identified to be inside the study area. Along all the both sides of Bidhan Sarani, Gray Street and APC Road which is inside the study area the edges mostly are commercial and the pavements are being taken away by the vendors. (Pic. 19)



Picture 19: The Google Map Reference of Study Area of Shyambazar Hatibagan Commercial Hub. Source: Author

4.0. Conclusion:

It can be concluded that with the constant growth and change of commerce and trade and the advent of E-commerce the Kolkata bazars are still in demand. So, the area designated by the market characteristics, i.e., the commercial hub of Shyambazar-Hatibagan could be identified as a reasonable place to serve the purpose of retail business hub for years to come.

But we should acknowledge that the informal markets and growing number of hawkers are contributing towards the decline of quality of life, at least from middle-class perspective. In the last two decades it has been observed that the middle-class population are moving out from the congested city core to the greenfield gated communities at the city fringe areas.^[13,14] (Chen, Wang and Kundu 2009, Chatterji 2014) So this is the high time to think to revitalize the city core area to uplift the quality of life of the place to make it ready for a sustainable city life, where inclusive approach will accommodate everyone earning their bread and butter as well as living in this beautiful city.

The problems identified here are the issues which could be resolved by Urban Design interventions. The same thing will restructure the public spaces in a manner to resolve the problems of pedestrians as well as uncontrolled growth of business. This might lead to a sustainable urban setup which can serve better business as well as a sustainable city growth.

5.0. Acknowledgement:

We are thankful to Dr. Sanjib Nag, Professor, Department of Architecture, Jadavpur University, who was the constant motivator to publish this article based on the original research work as part of the academic activity. His constant help and support meant a lot for the progress of the research work.

References:

6.1. Book

^[1] Roberts, P. W. et Sykes, H. "Urban Regeneration- A Handbook", London: Sage Publications. (2000)

6.2. Book

^[2] Steinberg, S. "Revitalization of Historic Inner-City Areas in Asia, The Potential of Urban Renewal in Ha Noi, Jakarta and Manila"- ADB Publications. (2008)

6.3. Book

^[3] Paul D Sprenger, "Urban Design, The Architecture of Town and Cities", New York, Mc Graw Hills Book Company (1965)

6.4. Chapter in a Book

^[4] Birkin, M., Clarke, G., Clarke, M., "Refining and operationalizing entropy— maximizing models for business applications". *Geogr.Anal.*42(4), (2010), pp 422–445.

6.5. Journal Article

^[5] Dramowicz, E., "Retail Trade Area Analysis using the Huff Model" *Directions Magazine*. July 3, (2005), Article no. 3207

6.6. Journal Article

^[6] Roy D. R., "Glimpses on The History of Calcutta 1600-1800", *Annales de Démographie Historique*, (1988) pp 243-257

6.7. Book

^[7] Lynch, A. K., "A Theory of Good City Forms", *The MIT Press*, (1981)

6.8. Book

[8] Gehl, J., Svarre, V., "How to Study Public Life", Island Press, (2013)

6.9. Journal Article

[9] Chatterjee T., Roy S., "From Margin to Mainstream: Informal Street Vendors and Local Politics in Kolkata", *L'Espace Politique*, DOI: 10.4000/espacepolitique.3903, (2016)

6.10. Book

[10] Lynch, A. K., "The Image of The City", The MIT Press, London, (1960)

6.11. Book

[11] Jacobs, J., "The Death and Life of Great American Cities", Random House, New York (1961)

6.12. Conference Proceeding

[12] Mahata, D., AK Rai, PK Narzary "Trends of Spatial-Temporal Changes and Growth of Kolkata City, India: Evidences from Geospatial Analysis". *International Population Conference IUSSP, October (2017)*

6.13. Journal Article

[13] Chen, X., Wang, L. and Kundu, R., "Localizing the Production of Global Cities: A Comparison of New Town Development Around Shanghai and Kolkata", *Sage Journal- City & Community*, vol. 8, issue. 4, (2009) pp-433-65.

6.14. Book

[14] Chatterji, T., "Local Mediation of Global Force in Transformation of the Urban Fringe- The Story of India's Regional IT Clusters", Lambert Academic Publishing, Saarbrücken, (2014)

