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## Geographical analysis of the street children of Kolkata through qualitative triangulation

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### Abstract

The paper underscores the importance of using qualitative methods in current practice of human geography. The focus is on the adoption of triangulation- of data and of method-justifying the need for adopting such an approach as has been done in this study of street children. Triangulation of data is based on the field diary, the longitudinal study and the visual observational study on 'activity space' adopted by street children in Kolkata. The Triangulation of method is achieved through interview and questionnaire survey; participant observation; and geo-referencing qualitatively in the process. Transcripts of in depth interviews with key actors, ethnographic field notes and interpreting the close ended questions illustrates a unique blending of multi method and mixed method research design. First, traditional social science approach is adopted then validated through judicious application of triangulation approach.

**Key Words:** Qualitative research, research design, multi method, mixed method, triangulation.

### Introduction

A research ideally begins with a question or a problem that defines the topic or subject matter or *what* is to be studied. The *research problem* is a question, or set of questions worth asking, an issue that merits attention or requires solving. The challenge for the researcher is to adopt a critical attitude to research design and the key to this lies in the initial formulation of the

research problem. Research design results from a series of decisions we make as researchers. These decisions flow from the knowledge of the academic literature, the research questions to be framed, the conceptual framework, and knowledge of advantages and disadvantages of different techniques. The way a research problem is 'framed' informs the choice of research method/s. *Method* is a technique for gathering evidence, while *methodology* is a theory of how research should proceed through its various stages and phases, discussing the philosophical approach to the work. Research in Geography involves thinking about the relationships between methods, techniques, analysis, and interpretation, the important role of which is filled by the *research design*. This work has extensively drawn upon the books edited by Eyles and Smith (1988); Tashakkori and Teddlie (2003), Flowerdew and Martin (2005); and Clifford, French and Valentine (2010). It has also referred to books authored by Flick (2009) and Rose (2012).

Geographers today are increasingly explicit in their use of multiple methods (qualitative, quantitative and cartographic) as a way to weave together data from multiple sources and engage in rigorous, integrative, context sensitive analysis. A historical antagonism between qualitative methods hindered the recognition of benefits gained by employing several of its techniques/ approaches within one study. Each of these qualitative methods can enhance the unique qualities of each other and result in vast opportunities for reciprocal advantages at each stage of research process. This integrated approach results in a new style of social research called *multi-method research* and a new term for the research as multi-methodological (Tashakkori and Teddlie, 2003). Multi-method approach reduces bias and elicits more detailed information, resulting in more accurate data. Through its capacity to answer research questions in more depth, multi method studies generate richer data that may be applied to more robust theory building, hypothesis testing, and generalizing. The use of multi methods enhances the validity of research by establishing linkages bridging between the methods administered. This facilitates the synergy between the techniques to discover relationships and the generation of ideas. The qualitative and quantitative methods each have their own unique strengths and weaknesses. By combining both methods, one method's strength may compensate for the other method's weakness and vice versa in the *mixed-method* design.

### **Contextualising qualitative research methods in geography**

Credit goes to the early contributions of the Chicago School for the initial predominance of qualitative methods applied in urban studies. In spite of such attempts the qualitative approach was largely neglected in geography. Although such methods did not cease to be applied in urban studies, but their use was relegated to community studies focusing on ghettos, immigrants, poverty and ethnic culture (Gans, 1982) and the ethnography of urban public space as cited in Verd, and Porcel (2012). In the 1990s, new ways of understanding the city and growing interest in addressing the complexity of urban reality favored the resurgence of qualitative approaches outside the above fields (Jacobs, 1993). Qualitative methods were also obtaining greater recognition in science thanks to their increasing consistency, transparency and rigor (Fielding, 2005). The growing interest in qualitative methods within human geography (as put forth by Verd and Porcel, 2012) calls for the contemporary geographers to come forward and apply it in their work.

We live in a predominantly visual era. Modernity entails the hegemony of vision and visual media. Visual culture is the visual construction of the social, not just the social construction of vision. Modern technical media (television, cinema, photography, the internet) simply are

the central content and determining instances of visual culture. Visual culture stands for both the field and its content viewed (Mitchell, 2002). The detailed description of earlier geographers such as Vidal de la Blache, Carl Sauer and Jean Brunhes had a visual foundation as mentioned by Roadway (1994). Although human geographers rely on textual representation, more recently visual and other forms of representations are becoming more common.

A concept is an intellectual representation of some aspect of reality that is derived from observations made from phenomena. Various literature, documents, study reports and policies have been thoroughly reviewed to get conceptual idea about the qualitative research techniques applied in the discipline of human geography. Geographers have always employed both qualitative and quantitative methods of research, looked at both the particular and the general, and are engaged with multiple social and natural processes. Traditional quantitative and statistical sources are still the most frequently used type of secondary data. However, qualitative and non-statistical sources such as newspapers, photographs, films, sound recordings and diaries are also significant (Clark 2005). Geographers are now providing understanding of complex processes, identifying connections between places and eliciting the meanings of phenomena through people's lived experiences. The appropriate choice of survey technique is of great importance to the overall success of the research. Each means of gathering data has advantages and disadvantages, particularly in relation to the different types of errors and these factors need to be taken into account while applying the methodology.

In this study the triangulation of data is based on the field diary, the longitudinal study and the visual observational study on 'activity space' adopted by street children in Kolkata. The triangulation of method is through interviewing and questionnaire survey, participant observation and georeferencing qualitatively in the process. Though most visible in the urban landscape, these street children are ironically invisible and the hardest-to-reach population by the intervening authorities due to lack of possession of any identification documents. Consequently they face difficulty in getting access to basic needs, services, care and protection. The troubles these children face for their survival, coupled with stigmatization by the society, develops a sense of insecurity, mistrust and fear. To cope with these daily occurring challenges the street children of Kolkata in general and Sealdah in particular adopted their exclusive activity space/place. They involve themselves in different income generating strategies using the urban landscape of Sealdah in particular and Kolkata in general. This space has been conceptualized as their *economic activity space*. Both the researchers participated and observed keeping written field notes and video notes of the research. Through the *case study* research, looking intensively at an individual and the small participant group, conclusions were drawn about the group in the specific context of economic activity space. The type of information processing that consists in the geographical localization and placing of qualitative material such as photographs and field notes is *Geo referencing* and this has been applied by the geographical localization of the various economic activity spaces utilized by the respondents. This was possible as in the qualitative materials (photographs, observation notes, etc.) the content and the place where they were produced coincided. Initially the case study method was adopted and later on, to make it more convincing and accurate, the triangulation approach to validation involving a multi method design was judiciously applied.

### Triangulation of data

Exploration of data for meaningful patterns is often termed as *data mining*. Often researchers draw on many different perspectives or sources in the course of their work. This is known as

*triangulation*. The term comes from surveying where it describes using different bearings to give the correct position. In the same way researchers can use multiple methods or different sources to try and maximize their understanding of a research question (Valentine, 2005:112). The idea of triangulation is based on the classical (positivistic) theory of measurement with the objective of improving the validity of the data.

### ***Ethnographic Field notes from participant observation***

For geographers there are a number of key methods in the fieldwork and research toolkit that are used to gather qualitative information. *Participant observation* is a simple skill of doing and watching that we all do as a part of our everyday lives without realising them. It is important to both participate and observe. The approach can be applied to new places and practices (Clifford et. al, 2010); it can also be applied to make visible familiar places and practices. The participant observer should keep written field notes and/or video notes of the research. The data collected has to be analysed in a manner similar to that of empirical material: observation (of people and places), by making field notes either by hand or by using a dictaphone, sketches, video and photographic evidence. This type of work is sometimes called ethnographic fieldwork and research.

### ***Longitudinal - case study***

A *longitudinal study* provides data about the same individual at different points in time allowing the researcher to track changes at the individual level. It tells a story about his/her life at a moment in time, but also over time showing how his/her life has changed. This capacity to follow individuals through time and observe how experiences and behaviour are influenced by the wider social and economic contexts in which they find themselves - and perhaps how they in turn influence those contexts - gives longitudinal studies a major role in understanding social change. *Case study* is a form of qualitative descriptive research, looking intensively at an individual or small participant group drawing conclusions only about that group in that specific context.

### **Visual representation**

Detailed description by earlier geographers such as Vidal de la Blache, Carl Sauer and Jean Brunhes—had a visual foundation as mentioned by Roadway (1994). In fact the history of the discipline of geography reveals attempt to visualise or make visible both the features, patterns and processes operating in the description of the earth (*geo-* means earth and *graphie* means drawing). Disciplines of anthropology and geography have used visual images as research tools since their inception as academic disciplines. The discipline of anthropology used mostly photographs, diagrams and films while geographical study incorporated photos, maps and diagrams (Rose, 2012). We are frequently surrounded by different types of visual media such as photography, film, video, digital graphics, TV. Images of these visual technologies are the TV programmes, advertisements, snapshots, Facebook pages, movies, close circuit television (CCTV) footage, newspaper pictures and paintings.

### **Triangulation of method**

#### ***Interviewing***

The interview is a social encounter, and how the respondent answers the questions will depend to some degree upon what the respondent and interviewer think and feel about each other

(Davidson and Layder, 1994:118). Choice of interviewing location and time of the day may carry biases to the survey. It is advisable not to hold interviews in busy, noisy social spaces (Valentine, 2005) so as not to be disturbed or distracted. Talking to people on their own 'territory' facilitates a more relaxed conversation. It offers the possibility to learn more about the person/group from seeing them in their own environment. The time of the day is also decided upon after the observational phase of researching on the field during the pilot survey phase.

A list of themes were worked out on some key questions such as the descriptive ones which asked for information on activities/experiences; structural questions which focused on how and when events occurred; and thoughtful questions which helped explore meanings, feelings, and opinions. Questions were not asked sequentially as in the questionnaire frame; but it followed their train of thought. The conversational flow was thus adopted and own views were not expressed thus giving scope to the respondents to declare contrary opinions if any. The 'who, what, when, where, how and why' was kept in the back of the mind, while interacting. Asking the questions is only half the skill of interviewing; the other half is learning to listen and respond to the participants (Valentine, 2005). Through semi structured interviewing new and interesting ideas not thought of earlier may emerge and this was kept in mind; to be both alert and sensitive as well.

### ***Questionnaire survey***

An introductory statement to attempt to put the respondents at ease was made by the researcher (the second author) and the questionnaire survey began with the introductory simple 'easy to answer' questions to act as a 'warming up' exercise for the respondents. Neutral type of follow-up questions was asked. Potentially embarrassing questions relating to drug related habits were not asked in a personalized form as people often loath to admit their own anti-social tendencies. A tactic is to word questions in such a way as to suggest that the taboo subject or socially disapproved issue is accepted.

Both closed and open-ended questions had been framed as the questionnaire design is a semi structured one. The closed questions encompassing a range of more innovative question types, such as Likart scales of satisfaction level and ranking questions were asked. In the Likart-style format, statements were provided and respondents were asked to indicate the extent to which they 'agree' or 'disagree' using a five-point level of satisfaction scale on the issues of fulfillment of basic needs. Rather than just 'agree', 'disagree' and 'don't know', use of an extended scale which allows for some measure of the strength of opinion was used.

Since open ended questions do not force respondents into giving particular answers, it entails more work for the interviewer as no 'pre-codes' are set out (Parfitt,2005) and the answer is written on the space provided on the questionnaire. The comments were later read and a coding sheet drawn up classifying the most frequent responses by creating codes for them.

### ***Geo referencing***

*Geo referencing* should be understood as the type of information processing that consists in the geographical localization and placing of qualitative material such as photographs, field notes, text fragments of documents and any other information. As pointed out by Fielding and Cisneros (2009), georeferenced information can come from the content of the materials used (for example, text fragments of interviews and other documents that refer explicitly to particular

locations), or it can refer to the place where the data were produced (for example, the setting in which interviews were conducted). In certain qualitative materials (photographs, observation notes, etc.) the content and the place where they were produced coincide. The aim is to establish a connection, or hyperlink, between the territory and the rest of the information being used, by simply a process of "localization." Applying a spatial technology such as Google Earth to studies on sense of the place represents a unique and innovative approach to advance the collection of data gathered through interviews and conversations (Wise, 2015). Applying this technology to research presents an alternative dynamic in human (cultural and social) geography methodology, aided by visual ethnographies of space and place. Such geographically based technologies can be used to store "non-cartographic forms of spatial knowledge, such as emotion" as a way of pinpointing and consolidating data as stated by Cope and Elwood (2009).

### **Rationale of the study**

The synthesis of techniques is a new phenomenon and is part of contemporary social research. Certain essential decisions are to be made when considering use of mixed mode designs and alternative approaches to analysis in surveys based on different types of primary data which is largely qualitative. These are: whether to mix data collection modes for different people in the same sample, concurrently or sequentially; or for the same respondents at different times. Initially the case study method which is a traditional approach to social science can be adopted and later on to make it more convincing and accurate; a triangulation approach to validation involving a multi method design judiciously applied. Case study is a form of qualitative descriptive research, looking intensively at an individual or small participant group (the street children of Kolkata) drawing conclusions only about that group in that specific context. Following the *mixed-method* design, both qualitative and quantitative data were combined and collected and then analyzed. The type of survey technique to be adopted is a decision which also has important implications for all aspects of questionnaire design and so quantitative survey techniques as the centrality of empirical evidence, the scientific method, has been juxtaposed with the conversational-style interviews as a research methodology giving a mixed method approach in this study. This may also be referred to as *inter-triangulation*. Such studies use the strength of both qualitative and quantitative methods. The study may use a survey technique (quantitative), an interview (qualitative) and documentary analysis from a quantitative perspective where numbers are recorded for analysis or from a qualitative perspective where text is deconstructed. The outcome will be more focused similar to the ones adopted by sailors who while navigating, triangulate their bearings. The principle of *triangulation* has been applied to minimize errors by drawing from diverse sources and types of data. The findings have been based on the smooth application of the triangulation method of data collection and analysis to enrich the study. The documenting of points on Google Earth maps after ground-truthing enabled the researchers to consolidate *multiple points* of view *spatially*: the points adopted in this study being the activity spaces of the target population of street children.

### **Statement of the problem**

There has been a shift from a conception of spaces as 'essential' to a conception of space as 'constructed'; a shift away from the idea of space as homogenous, continuous, objective, cartesian and knowable towards a view of space as fragmented, imaginative, unknowable

and subjective. This work points to the ways in which places are constructed through competing spatialities after Massey (1994) who noted that different social groups may have distinct spatialities, different abilities and propensities to travel and mobility, or different levels of commitment to places. This research discusses the implications of seeing space as socially constructed, multiple and contested for the development of a critical pedagogy of space. An effort has been made to draw attention to the ways in which geographical knowledge is socially constructed. The 'local' struggles over space (by the street children) which is related to the politics of identity and difference is central to the critical notion of space put forth in this work.

The street children constitute a marginalized population in most urban centres of the world in both developed and developing nations, more so in the latter. The phenomenon of street children, widely acclaimed as an urban one, is a worldwide problem emerging as alarming and escalating. The term street children were first used in 1951 by the United Nations Educational, Scientific and Cultural Organization (UNESCO) to refer to vagrant children after World War II. Street children are probably the most visible face of child labour. They can be classified as a group of children in especially difficult circumstances and are an extremely vulnerable group in all aspects of life and difficult-to-reach populations. They are a diverse and heterogeneous population, because of the diversity of their backgrounds and personal history; living in the streets, sleeping in the open or in empty buildings, with no one to support them in their daily struggle for survival. The defining of the street children may be based on whether they are (i) the "children of the streets" i.e., those children (i.e. persons under 18 years old), who work and live on the streets without family support, the street being therefore a place for living 24/7 or (ii) the "Children on the streets" working on the streets spending most of the time there, but returning to their families/relatives at night. Regardless of definition, the phenomenon of street children is not new and neither is it restricted to certain geographical areas (Connolly, 1990) only. In most third world cities, they are the shadowy presences who fill the background of daily life, doing odd jobs, scavenging for food, begging and stealing (Lalor et. al, 1999). The United Nations High Commissioner for Human Rights (UNHCHR, 1993) Report stated India to have the largest population of street children in the world. According to the Planning Commission of India, (2015) around 40 per cent of India's children are vulnerable or experiencing difficult circumstances. The Union Ministry for Woman and Child Development acknowledged the lack of reliable data on street children. Over one third of the children in urban areas go unregistered at birth, they have no birth certificate or an official identity proof document as stated by the UNICEF (2012) and hence are invisible in governmental policies; the current level of birth registration in the country is 70 per cent. This research showcases the street children of Kolkata with special reference to the "children of the streets".

### Objectives

Qualitative methods have ceased to be on the fringe of our discipline and are today vital to current practice of human geography (De Lyser et. al, 2010). The main objective of this paper is to highlight the importance of qualitative geography and to promote application of these methods in geography. Besides, the paper intends to broaden and refine the scope of the methods used and their practice in human geography. The methodology of study design and data collection; the methodology of data management and processing has been exemplified through triangulation which is a technique of qualitative analysis in the study of the street children of Kolkata.



## Findings based on qualitative triangulation

### *Ethnographic field notes from participant observation*

The researcher's (the second author more specifically) own notes, recorded as linear text, were added to the repository of data. Note taking helped in paying attention while interacting; the most significant use of the field notes were after the event. It helped to recall the details of the situation, intended to be described, analyzed or reflected on at a later period. The *field diary* covered the kind of contexts in which the interview took place; the kind of places in which certain interactions occurred; what were the immediate impressions and how they changed; and so on. This field diary with notes written on paper ('field materials') was maintained, reading through the transcripts was done, and voices taped with permission. Tape recording produced a more accurate and detailed record of the conversation (including capturing all the nuances of sarcasm, humour, etc). These were listened over and over again. Information that can be missed when the conversation first took place or which did not seem important, were picked up. The quality of the transcript depends significantly upon the quality of recording, the audibility of the respondents and the successful operation of the recording device and these were taken into consideration.

Table 1 Extract of the field diary, 2013-14

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*January '13 to July '13:* During this period I visited different places of Kolkata with significant concentration of street children. I visited along the riverside, along the circular railway, terminal stations such as Sealdah and Howrah; large vegetable markets, tannery industry, vat or garbage dumping station. I also observed the Sealdah station's parking place, ticket counter, south section, area between south and north section of the station, market places, and slums adjacent to and near the station.

*August '13 to December '13:* During this period, I conducted a pilot survey with 30 street children from different places including 25 in and around the Sealdah station area. I interacted with the children at parking place, market area, and platform number nine and the Sealdah south section. The children included in the pilot study, were very much connected with this station.

*January '14:* Throughout the month on different days, I observed the activities of street children in and around the station. I also tried to find out how the children are associated with these places for their daily activities.

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*Source: Sarkar (2017, Appendix: v-xi)*

### Visual technologies

Different types of *visual technologies* such as photographs and video recording enriched the data which were transcribed post field. These were taken with prior permission from the respondents. Transcription of codes was done from the questionnaires into the computer package of statistical software version 20. This quantification was compared with additional information extracted from the qualitative data such as the transcripts of 'interviews', the open-ended questionnaire responses, the observations, visual coverage and notes made by the researcher. Such materials generated were thus processed for graphical and textual representations. The key points of the conversation and notes of thoughts on how the interview went were jotted down and the tape transcribed soon after the interview.

### Longitudinal study

Longitudinal study provides data about the same individual at different points in time. Akash Barui was one such individual hailing from Krishnanagar of Nadia District, West Bengal. He was seen loitering initially in the earlier days of field observation in 2014. Two years later he was seen as a porter having experimented with the opportunities of the various economic activity spaces available to him and later choosing the porter's responsibility as his career option. Such a study thus allowed the researchers to track change at the individual level. His is also a unique case study documentation which showcases the economic activity space of the street children. In-depth interviewing also helped in reflecting the changes in his life; his contacts, perception, income and lifestyle. The findings were unmistakably a result of inter-triangulation through this longitudinal study, case study documenting and in-depth interviewing.

Table 2 Extraction of print media: related to intervention on street children

Publication	Original Bengali Title	English version	Newspaper	Remarks
23 <sup>rd</sup> July, 2013	"Arther avabe Shisu sramik ganana bandha"	Lack of funds causing no census on child labour	Ananda Bazar Patrika	Related to Intervention child labour
20 <sup>th</sup> June, 2014	"Sishu sramik bidyalayar sikhak ra abahelito"	Teachers of School for Child labour neglected	Bartaman	Related to street children's education
16 <sup>th</sup> July, 2014	Andhye galir rupkatha	Fairy tales on blind alleys (focus on ICPS Scheme)	Eai Samay	Related to ICPS Project
21 <sup>st</sup> September, 2014	"Path sishuder schooler udyog :puro sabha O nagar unyan daptar"	Attempt of Schooling of street children by Municipality & urban development department	Eisamay	Related to street children's education
12 <sup>th</sup> June 2016	"Poschim banger Ak tritiansho sishu sramik nirakhar"	One third child labourers are illiterate in West Bengal	Ananda Bazar Patrika	Related to Child labour and their education
6 <sup>th</sup> September, 2016	"Jader janna aaine tarai jane naa"	Policy for Pavement Dwellers: but they are unaware	Ananda Bazar Patrika	Related to intervention policies

Source: Sarkar (2017:217-218)

### Press releases

Newspaper cuttings helped in giving added and updated information on the target population and on the service providers. These were collected and later compiled and then analyzed as shown in table 2.

### Georeferencing of activity space

The incorporation of the territory as data, or simply the referencing on the territory of the material being analyzed, can help to develop what Mason (2009) called contextual explanations, understood as those in which an effort is made to show that all social activity is always localized.

Street children are a very much active group of population. They involve themselves in different survival activities throughout the day and night. The concept of spatial structure of activity relates to where people choose to undertake their daily activities. The survival activities

of the street children have been analyzed using the concept of 'activity space' after Mason et.al. (2008). Such spaces are 'the geographical extent in which people move in the course of their daily activities'. It is linked with human activity, participation and mobility in the realm of space and time. Activity space has also been investigated in social geography to analyze various socio-cultural issues. A more recent work by Schonfelder and Axhausen (2010) characterizes activity space as a compound concept that can be approached through different perspectives. The 'activity space'/place adopted by street children in Kolkata city has been georeferenced qualitatively and shown in table 3. It is based on observation made on these locations to give a glimpse of the phenomenon in the city in general. Fig.1 on the other hand shows the economic activity zone of the street children of Sealdah rail station complex as a case study in particular.

Table 3 Activity space/place adopted by street children in Kolkata city

Activity space	Purpose	Time of activity	Location/area
Railway station	Working, living, loitering	Whole day and evening	Sealdah, Howrah, Ballygunge, Park Circus and Dumdum
Garbage dumping station	Rag picking	Whole day	Dhapa, different garbage dumping stations
Big Vegetable markets	Collecting vegetables from trucks	Mainly at the early morning and mid night	Koley market, Barabazar
Along the river (burning place and rituals)	Collecting coins with the help of magnet and other belongings	Whole day and night	Nimtala, Barabazar
Tannery Industry	Work as child labour	Work as demand arises	Tangra, Rajabazar, Topsia, Park Circus
Religious place	Loitering in search of food and begging, sleeping at night	Whole day and active during special occasions	Kalighat, Dakshineswar
Bus stand	Begging, collecting food, sleeping at night	Whole day and night	Dharmatalla, Sealdah
New construction sites	Loitering and begging (they are the children of labour)	Whole day and night	East-west metro site

Source: Sarkar, 1997

### Discussion on grounding the theoretical perspective

How theoretical perspectives impact actual study is depicted in this paper. It has been inspired by the works of many qualitative researchers such as Yin (1993) where the importance of clearly articulating one's theoretical perspective, determining the goals of the study, selecting one's subject(s), selecting appropriate method(s) of collecting data and providing some considerations to the composition of the final report was highlighted upon. The longitudinal case study of Akash Barui can be stated as an illustrative case study— to make the unfamiliar familiar. The following theoretical perspectives were articulated: (i) the phenomenon of street children is widely acclaimed as an urban one (ii) street children form a major area of concern for any urban planning authority, which has to mainstream and rehabilitate them through its

policies (iii) due to lack of possession of any identification documents these children are invisible in governmental policies and consequently, adopt coping strategies and 'activity space' on their own.

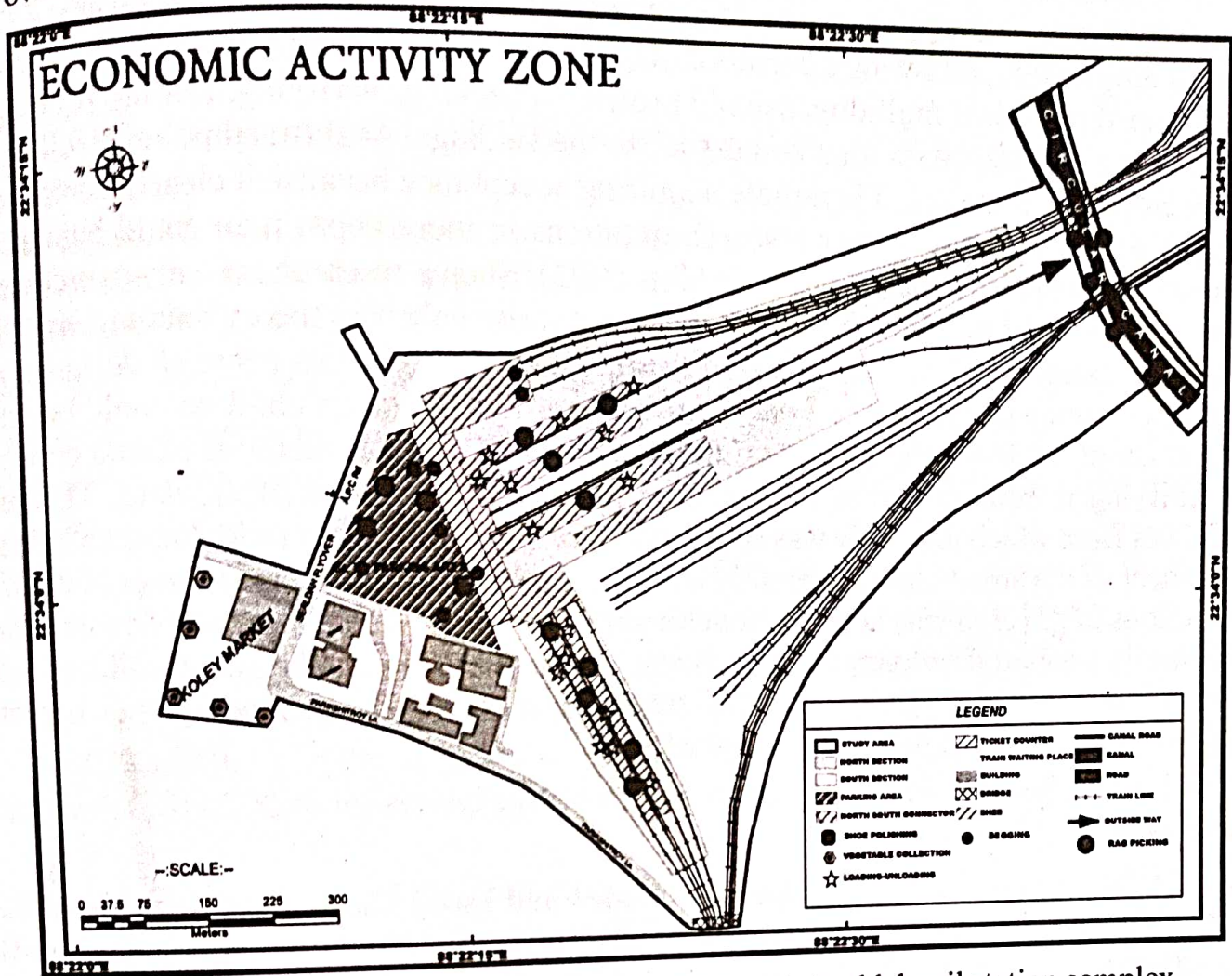


Fig1 Economic activity space of the street children in Sealdah rail station complex

### Conclusion

The history of the discipline of geography reveals the attempt to visualise or make visible both the features, patterns and processes operating in the description of the earth. Geographical information is presented through the use of maps, photographs, visual descriptions and diagrams (Roadway, 1994). Through the ages, geographers prided themselves on being integrative pulling together aspects of the physical and human world to understand places, processes and people. On a practical level this integration is related to the specific research techniques of triangulation and using multiple methods. Application of the method of triangulation is demonstrated through findings contextualized in this work. The ethnographical research techniques are used by human geographers across the world and an attempt of such dissemination has been made in this paper.

Results from qualitative research are often more understandable to people who are not statistically trained and can reveal more insightful geographical thinking than purely numerical outcomes. Emphasis on context helps in bridging the gap by comparing first hand observations with quantitative results (i.e. theoretical and empirical). In statistical analysis (i.e. quantitative method) one generalizes to a population based on a sample which is representative of that population. While in qualitative method such as through case studies on the street children one

generalizes to a theory based on cases selected to represent dimensions of that theory. These case studies depend on sources of data such as the researchers' own drafts, transcripts of interviews, video tapes and notes from direct field observation and hard copy of writer's work on computer. Since such studies are more convincing and accurate if based on several different sources of information, following a corroborating mode; the cross checking of data from multiple sources helped provide a multidimensional profile – checking, verifying, testing, probing and confirming the collected data thus contextualize the findings. Multi-method research is in its early development; however, it is rapidly acquiring acceptance because it clearly demonstrates that it has the capacity to answer research questions in more depth than could be answered using a single method (Tashakkori and Teddlie, 2003). Such a research not only overcomes the weaknesses of each of the individual approaches, but it also enhances theory building, hypothesis testing and generalizing. By incorporating multiple techniques in this research design, a more accurate perception of the reality, knowledge and truth on the street children could be arrived at. The study of the same phenomenon through the use of multiple methods of data collection, cross verifying it through two or more sources, helped in validation of the data. Theoretical perspectives from which this study was approached are individual theory (with focus on individual development of the street child); organizational theory (with focus on organizational structure and functions of governments and non-government organizations as stakeholders); social theory (with focus on urban development of Kolkata, group behavior of the street children – with special reference to the “children of the streets”). In so doing, grounding the theoretical perspective has also been judiciously applied.

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