COMPETITION FOR URBAN SPACE: ANALYSIS OF SPATIAL ASPECT OF STREET VENDING IN PUNE CITY

Isha, Panse* Pratap, Raval College of Engineering, Pune, India

Abstract

Streets are a stage for social interaction, commerce and act as determinant for character of the city. Among these activities, street vending is a dominant activity in Indian cities. The total number of street vendors in India is estimated at around 10 million, street vendors constitute approximately 2 per cent of the population of a metropolis in India as per WEIGO report. However, Street vendors are a part of de-regulated system. The study address this context with respect to Pune city, a growing metro in India. Pune city was also the first city to take policy directives for management of street vendors, in India.

The objective of the study is to distinguish and establish types of street vending in the context of Pune City. The study tries to estimate space utilized by different types of street vending. It analyses the patterns of distribution of types of street vending and their characteristics. This, unravels the locational aspects of street vending which proves to be essential for successful policy making. Through questionnaires, the perception of other road users towards the activity of street vending is evaluated.

The study uses quantitative and qualitative data. These include field notes, questionnaire survey of road users, field mapping and videography. Descriptive statistics such as means and frequencies were used to present the findings. The analysis of the data is based on percentages and simple cross tabulations, presenting empirical evidence to explore the spatial relations (location specific details) as against the types of street vendors.

The overall research theme is analyzing the impact of Informal Street Activities on Urban Functions and Planning aspects. This research paper is based on initial studies and is a part of doctoral research.

Keywords: Street vending Typology; Spatial utilisation; Locational aspects

^{*} Corresponding Author: Isha Panse ; E-mail- panseisha@gmail.com

Introduction

The street serves many more functions than just enabling the movement of goods and people from one location to other. The street is also a Public Space, essentially serving as a place for social interaction and commerce for the city residents. It is the workplace of street vendors who earn their livelihood off the streets. Since street comprise not only physical element but also the people who are interacting within and around them, street vending activities emerge as an integral part of street life

This character of the street is especially evident in many developing countries where Informal Street activities are an omnipresent phenomenon. Street vendors, small scale businesses often characterize the public space with their creativity, efficiency and temporality as observed by Klienenhammas⁵⁰. They cater to many of the basic daily necessities to the urban population conveniently and effectively. However, these activities also hold a huge potential for generating land use problems, putting pressures on civic infrastructure, open space conversions, it exacerbates congestion at busy sites etc. in urban areas⁵¹.

The street economy depends on the innovative use of space to survive and flourish. In recent times, street vending has presented new challenges for urban administrations charged with the management of space in the country. These street activities exist as 'illegal' in terms of policy makers and civic administration. The conventional policy of management and elimination of these activities, as practiced by most municipalities, has proven to be counterproductive according to Dimas ⁵².

In India, the Street Vendors Act, 2014, enforced on May 1, 2014, is an attempt to recognize and regularize all the street vendors in India. This makes the profession of street vending legal and brings relief from the continued threat of evictions by the Local Authority. The Street vendors act gave a framework within which every state was expected to give directives. It called for a Town Vending Committee to be set up in every city by the urban local body and the street vendors to be considered in the physical plan of the City.

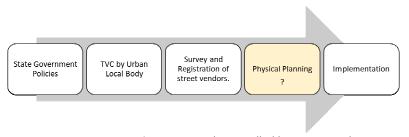


Fig. 1: Action plan as called by Street vendors Act 2014

This study looks into the 'determination of spatial planning norms for street vending' as called for by the Plan for Street Vending (First Schedule) in the Act. Also, the Plan has to

1. Ensure that all the existing vendors are accommodated.

⁵⁰ Klienenhammas, S. (2009). Revisioning Indian Cities: Informality and Temporality. Massachusetts Institute of Technology.

⁵¹ Okeke, D. C. Urban Land-Use Planning and Informal Sector Syndrome: Case, Journal of the Nigerian Institute of Town Planners, Oct 2000

⁵² Dimas, H., Street Vendors: Urban Problem and Economic Potential. First Indonesian Regional Science Association. Bandung: Department of Economics, Padjadjaran University.,2007.

2. Ensure that provision of space or area for street vending is reasonable and consistent with existing natural markets.

Literature background: Spatial aspects of Street vending.

In the literature related to this particular aspect of street vending, Spatial distribution as well as relationship of street vendors and there location across the city has been extensively worked on. Spatial distributions and relationships both are taken into consideration. Distributions refers to how populations, activities and phenomena are 'dotted' around space such that some areas enjoy huge concentrations (surpluses) while others are marked by dispersal and scantiness (deficits, shortages). Spatial relationships imply that places in a given geographical space are infused together by some forces (visible or invisible) which ensure that there is interaction This paper deals with both, spatial distribution as well as relationship. Here the relationship is based on street vending characters and Land use.

Study area: Pune City

Pune is a city in the state of Maharashtra, India. City of Pune (approximately 250 sq. km. with population of around 4 Million - neither a Metro nor a small city, displays continuing urban landscapes, carrying ethos of the past and essence of the present. Pune is an organically grown city, with no formal efforts of planning.

Pune is facing complex developmental issues related to rapid urbanization, traffic congestion, growth of population, densification, urban sprawl, climate modification, hybridization of cultural and economic policies and resultant lifestyles. The fast pace of life and neglected, public infrastructure and spaces are further adding to the complexity of the problem of transportation. Pune, also known as an 'Oxford of India', houses six Universities with about 600 functional higher education centers catering to an estimated 5 lakh student population.

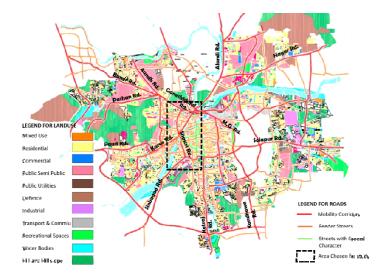


Fig. 2: Map of Pune city showing Land use and Road Hierarchy Source: author

Street Vending Management in Pune city

It is projected that currently there are around 30,000 street vendors in Pune. The appropriation of public spaces for commercial activities is visibly rampant in the cities and the footpaths are lined with small businesses operating on what is nominally public space: cooked food stalls, mobile vendors, vegetable sellers, tea stands. The street vendor encroachments are treated as hindrance to the movement of people and also reduction to the capacity of the roadways. Currently, the pedestrians are forced to walk on the carriageway at these locations of encroachments, thereby creating hazardous situations for both themselves and the traffic. In this regard, the Comprehensive Mobility Plan (CMP) of Pune City has proposed "Hawker Zones" aimed at decongesting main roads in Pune, while at the same time, protecting the interests of street hawkers had been proposed. Accordingly, the Municipal officials in consultations with the traders and the developers of the city have to come up with a hawking zone plan. Different hawking zones need to be identified and the proposals have to be enforced stringently. However, the planning and implementation for this in the physical plan of the city missing.

Methodology

Five roads in the core parts of the city were selected. These were selected to represent different types of urban land uses including commercial, residential, institutional, open spaces and mixed land use also these streets were selected due to the marked presence of street vendors from reconnaissance survey.

This paper used both, primary and secondary data gathered through questionnaire survey, field survey, field mapping. The secondary sources included reports on government policies and Traffic transportation plans for the city and Land use map as a part of development plan of the city.

For field survey, on all the selected roads, basic characteristics of street vending were video recorded. From the video, street vendor locations and typologies were plotted on the base map of Pune city. The details recorded included the location, type of goods sold, and type of display of goods.

The primary data through questionnaires to understand the nature of transactions that take place between them and the street vendors. Questionnaire survey followed the stratified Random Sampling technique to identify samples of

- a. Pedestrians
- b. Vehicle users

c.

A cross sectional study across ages, genders and socio economic groups was attempted. The questionnaires were filled by the respondents at the location itself. A total of 192 samples of these questionnaires were collected out of which 98 samples were from pedestrians and 94 samples from vehicle users. Interviews of street vendors were also conducted to get a background information.

Apart from the Spatial forces of the city, political and economic pressures play a major role in deciding the locational aspect of street vending clusters, number and types. However, these are beyond the scope of this study.

Profile of Selected Roads

Located in the core area of Pune city, the roads are a representative of few of the main shopping streets in Pune, with commercial establishments on both the sides of the road. These areas were taken into consideration, because it was observed that they had a high intensity of street trading activities within the city. The roads selected were: Fergusson College road, Jangli Maharaj Road, Bajirao road, Lal Bahadur Shastri Road, Sinhagad road. Out of the Five roads selected, four roads serve as mobility corridors for the city in [5]. Bajirao road however was selected based on the need to assess what the situation was on a neighborhood road and the dynamics of street trading on such roads.

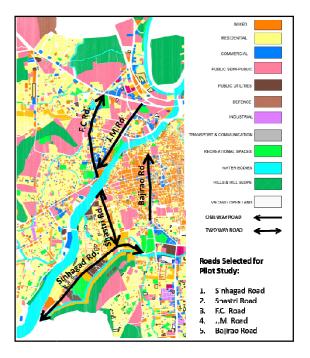


Fig. 3: Selected roads for Study Source: author

Results and Discussions

Typology of Street vending

According to literature review, street vending could be classified based on the Commodity Sold-Food and Non-Food, Legal status – registered and non-registered, type of display used (Location specific- Temporary, door-to door etc). ⁵³

After field mapping in Pune city and to suit the purpose of this study, which is to study the spatial aspect of street vending, the typology has been established on the basis of types of display as well as the commodity sold - Raw food (Fruits, vegetable, nuts etc.), Non Food

⁵³ Ministry of Urban Development and Poverty Alleviation (2009), 'National Policy on Urban Street Vendors', New Delhi, Government of India.

(Clothes, toys, household equipment, books, jewellery etc.), Services (Barber shop, tire repairs, tailor, printers and copiers, key maker etc.)⁵⁴

Both these parameters influence the space utilized by the vendors. An average of the space utilized by each type of vendor has been approximated. In general, the handcarts / stalls selling food items require more space for interaction with the customers since they tend to wait and eat around the hand carts. The following table shows categories and the average space including the buffer space required for the customers to stand and shop. (Table 1)

Table 1: Typology of Vendors and Space requirement

Sr. no.	Type of Display	Avg. Space required (sq.m) Vending space + Buffer space(for customers standing)					
		Others			Prepared Food		
		Raw Food	Non Food	Services			
1.	Standing vendor	2.25+0.6			3+1		
2.	Handcart	5.8 + 2.25			5.8+2		
3.	Cycle	2.5 + 0.6			4+1		
4.	Stalls	5.5+ 2.25			5.5 +2		
5.	On Road display	3.75+0.6			3.75 +2		
6.	Table	2.25 +0.6			2.25+2		

Murtanti Jani Rahayua, I. A. (2015). Typology of urban hawker's location preferences. CITIES 2015 International Conference, Intelligent Planning Towards Smart Cities (pp. 3-4). Surabaya, Indonesia: Procedia - Social and Behavioral Sciences.

Out of the total 686 vendors observed on the five roads studied, the number of vendors for different categories was as shown in (Table 2). The most seen typology is 'On road type display' selling fruits and vegetables. Thus this gives as idea about the space approximation. The maximum commodity sold by vendors is raw foods, 44.02%. Also, the maximum type of display is on road display.

Table 2: Distribution of Vendors across typologies

	Total	Distribution of types of vendors					
	Percentage	Raw	Non Food	Services	Prepared		
	acc. to display	Food		00.0.00	Food		
Standing Vendor	5%		5%				
Handcart	16%	7%	2.50%		6.26%		
Cycle	4%	4%					
Stalls	18%	6.80%	2%	2.50%	6.70%		
On road Display	34%	16.80%	16%	1.20%			
Table Display	23%	9.18%	8.16%		5.66%		
Total Percentage acc.							
To commodity		44.02%	33.66%	3.70%	18.62%		

Profile of Roads and Intensity of street vending

The intensity of the street vending activity on the selected roads is calculated as densities, i.e. number of street vendors per km of the road (Fig. 4). A maximum of 69 street vendors / km has been noted. This density of street vendors is not uniform throughout the road.. The profile of the road according to the land use has been cross tabulated with the number and type of street vendors (Table 3).

Table3: Road profiles and character of vending

Sr. no.	Road	Length of Road (in km)	Avg. Width of Road	No. of Lanes	Avg. Width of footpath	Dominant Landuse	No. of Street Vendors	Street Vendors/Km	Commodity Sold		Peak Time		
									Prepared Food	Other	Morning	Evening	
1.	ΓC Road	1.9	18m	4	1.65 m	Commercial	132	69	44	88	11.00-1.00	5.30-9.30	
2.	Bajirao Road	1.85	10m	2-3	Absent	Mixed	63	34	27	36	11.00-1.30	4.30-8.30	
3a.	Shastri Road (to LBS Statue)	1.16	12m	4	1.25m	Mixed	25	21	13	12	8.00-11.00	6.30-8.30	
3b.	Shastri Road (to Alka Chowk)	1.16					1. 25m	Mixed	33	28	26	7	
4.	J M Road	1.66	18m	4	1.5m	Institutional	83	50	52	31	11.00-1.00	6.00-8.30	
5a.	Sinhgad Road(to dandekar bridge)	5.1	24m	4	1.25m	Residential	52	10	18	67	11.00-1.00	6 00-8 30	
6.a	Sinhgad Road(to Vadgaon)	5.1				7	1.25m	Mixed	298	58.43	23	275	11.00-1.00



Fig. 4: Selected roads for Study Source: author

Land use and street vending clusters

It was observed that, mostly the street vendors tend to locate themselves at a location in clusters. Clusters of 20 vendors were also observed, however the average cluster of street vendors consisted of 3-6 vendors. These locations of clusters depend Land use immediately along the road can be linked to the number of vendors. The patches of road with residential land use along the road has the least number of vendors. Also there is a concentration of street vending near the slums. The roads in areas where the residential land use is dominant, the number of prepared food vendors reduces and the raw food vendors increases. The vendors selling prepared food are concentrated around commercial and institutional areas (offices, educational institutes etc.)



Fig.5 : Clusters of street vendors along selected roads (Refer Fig. 3 for Legend)

Location of street vendors on road

The street vendors tend to use the following areas of the road:

- 1. Setbacks in front of building
- 2. Footpath/Pedestrian walkway,
- 4. On street parking space
- 3. Edges of the Carriageway.

The setbacks of the building come under the status of private space, whereas the footpath, parking space and the carriage way are public spaces. The street vendors using private space, have some form of informal contract with the owners of the space (shopkeepers, institutes etc.) and they carry out their business from these spaces.

From the survey it is seen that 69% of the vendors occupy the space meant for pedestrians (Fig. 6)

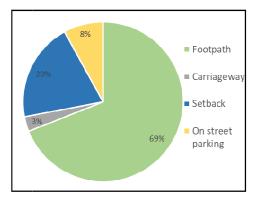


Fig. 6: Location of street vendors on the road Source: author

From the average space requirement, type and number of vendor it is estimated that 12-15% of the available footpath area is occupied by street vendors on the selected roads. At certain points, where street vendor density, people were forced to resort to jaywalking.

Attitude of other road users towards street vending

Thus, out of all the road users, pedestrians are directly affected by the presence of street vendors, this is in consistency with the results obtained from questionnaire survey, which reflect the attitude of road users towards the street vendors. The parameters used for the survey were Convenience, Safety, Aesthetic, comfort.

Out of the total pedestrians as well as vehicle users surveyed, 63% of the users stated that buy goods from street vendors more than thrice a week. The maximum bought commodity from street vendors was fruits and vegetables (Raw food).

66% of the pedestrians expressed that street vendors were a hindrance to their movement and affected their comfort as against 23% of vehicle users. 86% of the respondents agreed that the

street vendors have served their purpose of providing goods of daily necessities at reasonable prices thus providing convenience. 52% of the pedestrian respondents stated that the street vending activity, did not seem to affect the safety of the pedestrians. 49% of all users agreed that the street vending sites were an eyesore, rest of them were not sure.

Conclusions and Future scope of work

Street vending is indispensable part of the urban life. The weaker sections of the society, depend on this for livelihood, whereas even the other road users agree to the convenience provided by the vendors. Infact a large part of the population buy from the vendors on a regular basis, irrespective of their socio-economic group.

However, by occupying the pedestrian space, the debate on urban Space ends up being a direct conflict between pedestrian, vendors and their customers. This indirectly affects the traffic causing congestion on street. (Fig. 7)

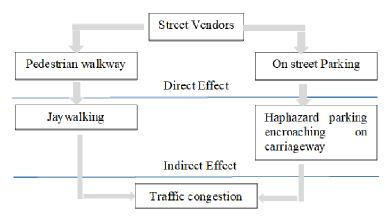


Fig. 7: Effect of street vendors on other road users Source: author

Space and vending appropriation of public spaces for commercial activities is essential, to avoid negative effects on the capacity of Public Infrastructure. The space averages of the informal activities need to be accommodated for in design and planning of Roads.

The distribution of typologies of street vendors needs to be studied across a different cities/locations, this would help in better generalization of spatial distributions and relations which can further help in accommodating the vendors better in the physical planning of the city.

References

Reports

WEIGO. Street Vendors in India. Retrieved from WEIGO:

http://www.wiego.org/informal_economy_law/street-vendors-india accessed on 1st July,2017 Ministry of Urban Development and Poverty Alleviation (2009), 'National Policy on Urban Street Vendors', New Delhi, Government of India.

Department, M. O. (2014). Street Vendors act 2014. Government of India.

Klienenhammas, S.,Revisioning Indian Cities: Informality and Temporality, Massachusetts Institute of Technology, 2009

Journal article:

Okeke, D. C. Urban Land-Use Planning and Informal Sector Syndrome: Case, Journal of the Nigerian Institute of Town Planners, Oct 2000

Conference paper:

Murtanti Jani Rahayua, I. A. (2015). Typology of urban hawker's location preferences. CITIES 2015 International Conference, Intelligent Planning Towards Smart Cities (pp. 3-4). Surabaya, Indonesia: Procedia - Social and Behavioral Sciences.

Dimas, H., Street Vendors: Urban Problem and Economic Potential. First Indonesian Regional Science Association. Bandung: Department of Economics, Padjadjaran University.,2007.