

Spatio-Temporal Analysis in Socio Economic Aspects in Haryana

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Geography

Abstract – Urbanization is a cycle where country populace move to metropolitan regions. Metropolitan populace is expanding at a quick rate which gives better living offices. Urbanization is a record of change from customary provincial economies to present day modern one. The cycle of urbanization is an element of financial changes which occur in the public eye through time 34.88% of Haryana's populace lives in metropolitan regions as correlation with India, which is 31.16%.

Keywords: Urbanization Socio Economic Aspects Spatio-Temporal

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INTRODUCTION

Urbanization is a cycle wherein provincial populace move to metropolitan zones. Metropolitan populace is expanding at an exceptionally quick rate which gives better living offices. Urbanization is a record of change from customary provincial economies to present day modern one. The cycle of urbanization is an element of financial changes which happen in the public arena through time 34.88% of Haryana's populace lives in metropolitan territories as correlation with India, which is 31.16%. An examination of the financial credits of Urban Population for example urbanization, sex proportion, education rate and a metropolitan specialist in Haryana shows spatio-transient varieties in 2001&2011. An individual who can peruse and compose with comprehension in any language is recorded as proficient. Proficiency is a significant marker which shows the improvement of an area. Sex proportion is a pointer of advancement. Metropolitan specialists show the advancement level urbanization.

Age and sex arrangement involves a significant situation in any conversation on qualities of a populace. Age speaks to an individual's capability to work. Based on age structure, any populace can be arranged into youthful or grown-up populace. Sex is an organic trademark that orders people into guys and females. Sex organization alludes to the harmony among guys and females in the complete populace. Age and sex organization influences the segment measures, yet additionally decides the financial relationship inside a network. Thusly, separate information on guys and females, and by age, turns into a significant apparatus for different

kinds of planning. Each populace has an interesting age and sex piece.

The harmony among male and female in the complete populace just as in different age gatherings can have impressive effect on social and monetary circumstance in both present and future settings. Sex structure is communicated regarding a proportion between the mathematical quality of guys and females in the absolute populace. Sex structure has critical direction on richness levels, future, mortality conditions, movement and conjugal status. As such, sex organization of a populace administers the different segment highlights in a network. 'As the two genders play incompletely differentiating and mostly reciprocal functions in economy and society, the investigation of sex piece expect included importance for a populace geographers' (Chandna, 1996: 178). Sex arrangement decides the job and status of ladies, the kind of relationships, age at marriage, pace of male and female cooperation at work, the type and phase of improvement of economy and so on. As per Momsen, 'sex proportion, or the quantity of guys per hundred females in a populace, would both characterize the general personal satisfaction and mean the worth put by society on the genders' (Momsen, 1987: 33). The most generally utilized measure to speak to the sex structure of a populace is sex proportion (until now curtailed as SR). Sex proportion might be characterized as the quantity of guys per 100 or 1000 females or the other way around.

It might likewise be communicated as the level of complete populace comprised of either guys or females. Nonetheless, proportion is constantly liked to rate, as, it is a customary or ordinary device

utilized in the populace concentrates all through the world. Sex proportion in the Indian setting is characterized as the quantity of females per thousand guys in a populace. Presently a days, the term female-male proportion is (FMR) is progressively being utilized to connote the harmony between the two genders in a populace. Here in the current examination both the terms have been utilized reciprocally. For instance, as per the 2001 Census, there were 9,75,53,31 females and 11,32,76,58 guys in Haryana.

The sex proportion for the state, subsequently, works out to be 861. At the end of the day, there are 861 females for every thousand guys in the number of inhabitants in Haryana. The sex proportion can be inspected regarding its three unique sorts viz. essential sex proportion, auxiliary sex proportion and tertiary sex proportion. The essential sex proportion alludes to proportion among male and female at the hour of origination. It is organically for guys. The auxiliary sex proportion means the proportion between two genders during a period of birth (SRB). Sex proportion during childbirth in a populace is by and large for guys because of natural reasons. The tertiary sex proportion alludes to the proportion of the two Sexes in the populace at the hour of list. In any examination on populace arrangement, we are commonly worried about the later two sorts of sex proportions. The sex proportion can be determined for a populace all in all, or for various age gatherings, or for various position or social gatherings, or for country and metropolitan zones independently.

In the light of the above mentioned, the current investigation is an endeavor to inspect the spatial fleeting changes in sex piece of populace in provincial Haryana utilizing region and tehsil level information. The timeframe chose for the investigation is twenty years from 1981-2001. A specific accentuation in the examination is on the adolescent age gatherings (essentially long term's age gathering). The examination attempts to investigate the related components. The explanations behind such varieties can't be just investigated natural measurements as it were. Then again, these should be inspected as far as socio-social and natural develops of various areas. Wellbeing status of the female youngsters and their mom in contrast with their male partner, and their openness to and use of medical care framework are similarly essential to be investigated. The issue merits researching considering the way that in spite of an overall improvement in medical care offices, proficiency rates, expanded mindfulness about social causes, increment in future of female opposite guys, the quantity of female per thousand guys, in the populace is on the decline. The territory of Haryana needs extraordinary examination since it is the subsequent positioning state in the public economy where agribusiness has made enormous steps during the ongoing past especially after the mid 1960s when green upset was presented in the nation. In spite of an exemplary advancement made

on the monetary front, it is at the close to base as respect to is sex proportion. Evidently, the product of its farming thriving has not been converted into social progression.

LITERATURE REVIEW

Sex structure of populace is a multidimensional marvel and has, consequently, been concentrated by researchers having a place with various parts of sociologies, including Geography, Demography, Sociology, Psychology and so forth. India's populace has been set apart with low and declining sex proportion since the time the start of enumeration activity. Declining sex proportion has, subsequently, pulled in the consideration of specialists, organizers, and strategy creators since quite a while. Infact, enthusiasm for the shortfall of females in India's populace is as old as the historical backdrop of registration taking in the nation. A low and declining sex proportion in India's populace has involved a lot of examination and hypothesis among researchers.

Williamson (2012) investigated the issue from the social perspective on the inclination for young men and young ladies. He contended that the decision of child is general aside from in barely any social orders. He has inspected the social, monetary, mental and segment ramifications of leaning toward either sex. His work is a short hypothetical, examination of the human sex inclinations and control. A few investigations at public level dependent on the statistics information were completed by different analysts. Gosal (1961), Visaria (1961, 1971, 1981) Natrajan (1971) Premi (1991) and so on have examined into sex proportion in detail for India. These investigations depended on evaluation information and had segment approach. They have given a summed up clarification on the conveyance of sex structure patterns and factor influencing sex organization. They reasoned that sex proportion is influenced by essentially four elements, for example sex proportion during childbirth, movement, differential mortality in male and female and undercounting of female in the Census. They likewise talked about example in sex proportion in India and featured the related components.

Chandana and Krishan (2013) clarified sex structure of Haryana's populace based on Census information during 1901-1971. They found that dissimilar to different states in the nation, Haryana is portrayed by a high sex proportion in country zones than in the metropolitan zones. The spatial examples in sex proportion in India is set apart with a sharp partition between the north and north-western states, from one viewpoint, and the rest of the nation, on the other. Alluded to as the north-south division in the sex organization of India's populace, the subject has additionally involved the consideration of the researchers. This polarity

alludes to an incredible deficiency of females in the northern states when contrasted with southern conditions of the nation. Sopher (1980) has contended that the north-south contrast in sex proportion is because of social establishment having environmental premise. He has likewise investigated the sex proportion of Hindu and Muslim populace utilizing state-wise information as an aspect of the part, named 'Social Pattern of India'. The idea of 'north-south' partition is likewise seen underway of researchers having a place with other control in sociology (Bardhan, 1974; Visaria, 1971).

Mill operator (2014) in her book on *The Endangered Sex* analyzed the different ways to deal with sex organization in India, by and large, and in the provincial zones of the northwestern states, specifically. She accused culture instead of nature for disregard of female youngsters in the district, and called it as culture against females. She worked out the collaboration between the necessities of rural creation, the idea of property holding and the sexual profile of the populace. As indicated by Miller, the fate of females in India might be additionally jeopardized by expanding conceivable outcomes of sex determination of posterity at the time of origination (Bardhan, 1982; 1450). She has featured the distinctions in the idea of sexual orientation relations between propertied classes and 'others', suggesting that in the last sex proportion is higher than among the previous. In this manner, in another investigation, Miller (1989) examined the provincial examples in adolescent sex proportion in country India utilizing 1961 and 1971 information as far as changes in mortality differentials among young men and young ladies.

Agnihotri (2015) gave accentuation on disaggregated investigation of sex proportion for SC/ST and rest of the populace. He investigated age-wise sex proportion in detail. He contended that the general pattern of declining FMR isn't uniform the nation over, however differs starting with one locale then onto the next, and by economic wellbeing, age gathering and levels of thriving. In a most recent examination, Agnihotri remarks that 'sociological and anthropological writing give numerous occurrences of expanded female subjection among the more prosperous gatherings (Agnihotri 2003:4354). Utilizing NSSO information of 43rd, 50th and 55th rounds, Sidhartha et al. (2003) have indicated a declining pattern of sex proportion with ascend in flourishing level. For success the creators (one of the three creators in Agnihotri) have utilized normal month to month per capita consumption (AMPCE) as a proportion of flourishing level. They contend that the opposite relationship between success level and sex proportion is more articulated for the later adjusts of the NSS. Almost twenty years sooner, Krishnaji (1987) has endeavored to clarify the connection among neediness and sex proportion. His work isn't straightforwardly worried about the variables behind the level and the declining pattern in the sex

proportion. Rather he endeavored to inspect the connection between sex differentials in mortality and irregularity between the genders from one perspective, and destitution, on the other, in provincial families. Along these lines, as a roundabout induction he contends that the sex proportions are more imbalanced among families with enormous land property - even in south India where sex proportions are more equitably adjusted - than among horticultural workers or little cultivators.

The shortfall of females in India's populace in past was, accordingly, credited principally to male dominance during childbirth, differential in mortality, and under specification of females. There was a stamped improvement in the nature of information in the censuses of 1991 and 2001. There has been an improvement in the mortality of female because of expanded accessibility of medical services offices, improved education and success levels. Considering this, the decrease in the sex proportion pulled in the consideration of demographers and social researchers the same. Presently researchers have credited this to be inescapable abuse of clinical innovation for recognizable proof of the sex of the infant in the mother's belly, and ensuing end of pregnancy if the infant is female. This training is known as female foeticide. One of the strategies utilized for sex distinguishing proof is amniocentesis. Kundu and Sahu in their examination based on 1991 information contended that a sharp increment in sex proportion during childbirth for male infants could be because of amniocentesis (Kundu and Sahu, 1991). This created a discussion among the researchers. A few researchers (for example Rajan et al., 1991 and 1992) challenged this clarification at first. Be that as it may, presently there is an overall unanimity among researchers with respect to the part of amniocentesis, or different methods for sex recognizable proof, and female foeticide in late decrease in sex proportion in India's populace (Premi and Raju: 1992).

OBJECTIVES

The present study is focus on following:-

1. To investigation the spatio-worldly varieties of level of urbanization in Haryana during 2001&2011.
2. To examination the financial parts of level of urbanization in Haryana during period 2001&2011.

Data source and methodology

➤ The present study is based on secondary data. Data has been collected from census of India, Director of census operation, Haryana, 2011.

➤ Following formula has been used for the study:-

• $Level\ of\ Urbanization = \frac{Urban\ Population}{Total\ Population} \times 100$

• $Literacy\ in\ Percent = \frac{Number\ of\ Literates\ (above\ 6\ years)}{Total\ Population} \times 100$

• $Sex\ Ratio = \frac{Female\ Population}{Male\ Population} \times 100$

• $Workers\ in\ Percent = \frac{Total\ Workers\ (main + marginal)}{Total\ Population} \times 100$

The information has been prepared by factual methods. Region astute varieties in urbanization, sex proportion, education rates and metropolitan laborers has been appeared on maps by utilizing choropleth strategy arranged in Arc GIS 9.3.

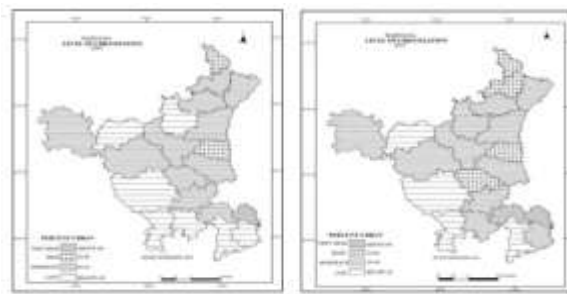


Fig 2

Gurgoan locale had 35.4 percent populace in 2001 however the urbanization expanded at a quick become 68.8 percent in 2011 because of mechanical turn of events. Sirsa area has diminishing degree of urbanization from 2001 to 2011 in light of the fact that individuals have relocated to different locale.

Table 3: Urban Literacy Rate in Haryana 2001&2011

District	2001			2011		
	Person	Male	Female	Person	Male	Female
Panchkula	82.9	87.6	77.5	86.7	90.5	82.5
Ambala	85.5	89.7	80.5	87.5	91.2	83.2
Yamunanagar	81.7	86.3	76.4	84.5	88.5	79.9
Kurukshetra	80.8	86.3	74.5	84.0	88.1	79.3
Kaithal	72.3	79.8	63.9	77.9	84.9	70.1
Karnal	80.0	85.3	74.0	82.3	87.1	77.1
Parities	76.2	82.3	68.8	79.9	85.2	73.1
Sonapat	80.6	87.6	72.5	83.9	89.9	77.1
Jind	78.9	84.5	65.9	80.1	87.3	72.1
Fatehbad	73.6	80.2	66.3	78.0	83.0	72.4
Sirsa	73.6	80.2	66.1	79.2	84.4	73.4
Hisar	77.8	84.9	69.3	81.7	88.1	74.3
Bhiwani	76.6	85.0	66.9	81.5	88.3	73.8
Rohtak	81.3	87.2	74.5	84.9	89.9	79.2
Bharat	79.4	87.1	70.1	84.3	90.4	77.4
Mahendragarh	78.2	88.8	66.3	82.7	90.6	73.9
Rewari	82.2	90.1	71.0	84.7	91.5	77.0
Gurgaon	83.9	90.0	76.9	86.8	90.7	82.1
Mewat	69.3	80.6	56.6	69.4	80.1	57.7
Farsidabad	79.6	86.8	70.7	83.8	89.6	77.3
Palsal	73.2	82.9	62.2	77.8	86.2	68.5
Haryana	79.2	85.8	71.3	83.1	88.6	76.9

Source: Statistical abstract of Haryana (2001 & 2011)



Fig 1

Table 1: level and Growth of Urbanization in Haryana, 1971-2011.

Years	Urban Population (Percent)	Growth Rate (Percent)
1971	17.66	35.58
1981	21.82	59.47
1991	24.63	43.41
2001	28.92	50.52
2011	34.90	44.39

Source: Computed from census of Haryana

Table 2: level of urbanization in Haryana 2001&2011

District	2001			2011			Decade Growth Rate 2001-2011
	Total (percent)	Male (percent)	Female (percent)	Total (percent)	Male (percent)	Female (percent)	
Panchkula	44.5	53.9	46.1	55.6	70.8	49.6	25.30
Ambala	35.2	44.1	43.9	44.4	53.1	44.7	26.34
Yamunanagar	47.7	53.9	46.1	56.9	70.4	46.5	7.10
Kurukshetra	78.0	84.1	43.8	78.9	83.7	49.1	11.15
Kaithal	18.4	23.9	46.1	27.0	35.0	47.0	15.60
Karnal	28.7	33.7	46.3	38.2	47.8	47.1	13.96
Parities	48.2	54.9	45.1	46.0	55.3	46.4	13.58
Sonapat	73.0	81.1	48.9	11.3	18.8	48.3	29.30
Jind	38.3	43.8	46.2	22.9	33.1	46.8	12.81
Fatehbad	17.7	22.2	46.8	18.1	23.6	47.4	7.91
Sirsa	28.2	33.3	46.7	38.6	47.8	47.7	6.46
Hisar	23.9	28.2	43.8	31.7	38.7	48.3	22.39
Bhiwani	18.9	23.8	46.2	18.7	23.0	47.0	4.31
Rohtak	33.0	37.7	46.3	42.0	50.0	47.0	30.00
Bharat	22.2	28.2	45.2	32.4	37.6	48.4	14.41
Mahendragarh	13.8	18.1	48.9	14.8	19.9	47.1	8.87
Rewari	27.8	34.0	48.0	35.9	43.6	48.6	47.31
Gurgaon	33.6	39.9	46.1	66.8	74.7	45.8	44.35
Mewat	7.84	12.6	47.7	11.4	16.2	47.6	31.39
Farsidabad	27.8	33.0	43.0	28.8	33.6	46.6	7.19
Palsal	18.2	24.6	43.6	27.7	35.1	46.9	18.35
Haryana	28.9	34.1	45.9	34.9	41.1	46.7	20.26

Source: Census of India, 2001&2011

The information has been prepared by factual procedures. Locale savvy varieties in urbanization, sex proportion, education rates and metropolitan laborers has been appeared on maps by utilizing choropleth strategy arranged in Arc GIS 9.3.



Fig 3

Fig 4

Table 4: sex ratio in Haryana 2001&2011

District	Total		Urban	
	2001	2011	2001	2011
Panchkula	823	873	855	881
Ambala	868	885	849	876
Yamunanagar	861	877	854	871
Kurukshetra	866	888	848	862
Kaithal	853	881	855	887
Karnal	864	887	861	890
Panipat	824	864	818	868
Sonepat	838	856	846	869
Jind	852	871	857	881
Fatehabad	884	902	879	899
Sirsa	882	897	876	896
Hisar	850	872	843	861
Bhiwani	879	886	858	885
Rohtak	846	867	862	887
Jhajjar	847	862	823	865
Mahendragarh	890	895	882	890
Rewari	898	898	850	873
Gurgaon	850	854	854	844
Mewat	898	907	892	907
Faridabad	826	873	817	873
Palwal	861	880	872	883
Haryana	860	880	709	764

Source: Statistical abstract of Haryana (2001 & 2011)



Fig 5

Haryana is found at an exceptionally low level as contrast with public degree of sex proportion that is 940 in as per the statistics 2011.sex proportion improved in all the locale of Haryana however the most elevated sex proportion is found in Mewat area.



Fig 6

Table 5: distribution of urban workers in Haryana 2001 & 2011

District	Workers (in percent)			
	2001		2011	
	Total workers as percent to total population (main+ marginal)	Total urban workers as percent to total worker (main+ marginal)	Total workers as percent to total population (main+ marginal)	Total urban workers as percent to total worker (main+ marginal)
	%	%	%	%
Panchkula	38.1	39.2	37.7	55.2
Ambala	32.0	11.5	33.0	47.4
Yamunanagar	32.3	34.5	32.1	39.5
Kurukshetra	37.4	21.0	34.9	26.6
Kaithal	39.3	14.8	34.8	19.5
Karnal	37.7	23.3	34.3	29.6
Panipat	39.6	37.0	34.2	46.2
Sonepat	40.9	18.3	36.1	28.1
Jind	43.9	14.0	39.2	17.8
Fatehabad	45.0	12.2	12.2	15.3
Sirsa	42.6	19.8	38.8	21.0
Hisar	43.3	19.5	39.9	26.9
Bhiwani	42.7	13.5	38.1	15.5
Rohtak	39.5	26.6	32.6	38.5
Jhajjar	44.2	16.6	34.1	22.3
Mahendragarh	43.3	9.7	36.7	12.0
Rewari	43.6	12.3	37.5	21.7
Gurgaon	37.8	18.8	36.0	70.9
Mewat	50.0	5.5	26.6	10.8
Faridabad	35.8	46.2	32.0	81.6
Palwal	35.8	48.2	20.7	21.8
Haryana	39.6	23.0	35.2	32.9

Source: census of India (2001&2011)

Gurgoan district there was only 18.8 percent urban worker in 2001 it increased at a very fast rate and become 79.9 percent in 2011.Mewat district has found low level of urban worker in both periods.

CONCLUSION

Haryana is a rustic condition of the nation with just 34.9 percent populace living in metropolitan zones. Haryana has low degree of urbanization basically because of horticultural based economy. Faridabad region is more urbanized 77.8 percent populace in 2001and 79.5 percent in 2011. Gurgaon locale has just 35.4 percent metropolitan populace in 2001 however the urbanized expanded at a quick rate and became 68.8 percent in 2011. Gurgaon and Panchkula the elevated level of urbanization is because of mechanical turn of events. Gurgaon is situated in the National Capital Region and while Panchkula has nearness to the state capital district. Mewat region has low degree of urbanization for example 7.54percent in 2001and 11.4 percent in 2011. Yamunanagar, Karnal, Kaithal and Jind locale have moderate degree of urbanization. Sirsa, Fatehabad, Bhiwani and Mahendragarh have low degree of urbanization because of their far off area, provocation in atmosphere conditions and their helpless availability with the public capital district. Sirsa region has diminishing degree of urbanization of 2001 to 2011 on the grounds that individuals are relocating to different locale. Most elevated sex proportion is found in Mewat region. It was 892 in 2001and 907 in 2011. There is convergence of Muslim populace in locale. In Muslim people group more than one marriage is permitted subsequently the labor rate is higher than different regions. Being protection the individuals are less mindful about the pre-birth test resources because of which the female feticide rate is

exceptionally low irrelevant in Mewat zones in contrast with the others.

REFERENCES

1. Bhagat RB (2009). Emerging pattern of urbanization and the contribution of Migration in Urban Growth in India Asian Population studies; 5(1): pp. 5-20.
2. Barakade AJ (2011). Urbanization of Satara District of Maharashtra Bioinfo publication of Geoscience Research; 2: pp. 38-44.
3. Bhattacharya CR (2012). Gender in equality and Sex Ratio in Three Emerging Economics, What Economics Discussion Papers.
4. Das S. (2015). Woman Worker in India. Why so Few Among So Many International Monetary Found.
5. Islam UM, Khan EM (2014). A Spatial-Temporal Analysis of Urbanization in India, Excellence International. Journal of Education and Research; 2: pp. 563-75.
6. Kalotra G. (2011). Urban Population: Distribution and its Socio Economic Attributes in Haryana Global Research Analysis; 2: pp. 79-84.
7. Mahima S, Sangwan SR, Anjudabas (2007). Regional Aspect of Rural Literacy in Haryana.
8. Megery NM, Kadi SA, Megery NM (2014). Impact of Lagged Urbanization in India International. Journal of Statistics and Application; 3: pp. 11-16.
9. Mundhe NN (2014). Monitoring Level, Trends and Pattern of Urbanization in Maharashtra (1991-2001). International Stream Research Journal; 4: pp. 11-17.
10. Mukherjee GD, Bino Paul (2007). Migrate Workers in Informal Sector Discussion Paper Series, pp. 1-9.

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