Land grab practices and a threat to livelihood and food security in India? A case study from Aero-city Expansion project from S.A.S. Nagar, Punjab

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Agricultural dominant societies in India are slowly shifting from traditional agricultural practices to modern infrastructural development. The Recent trends of developing high-tech cities are some efforts being taken by Punjab government to bring additional investment in the state and boost up its economy. But to do that at the expense of highly fertile agricultural land is a debatable proposition. One of the most recent ventures toward this objective is kind of development being initiated in the vicinity of Chandigarh and Mohali by GMADA (Greater Mohali Area Development Authority) is an Aero City Expansion project. The study will focus on only 3 villages **Patton, Kurai** and **Seon** out of 14 villages, where 1305 acres of land have been proposed to be acquired. This research paper attempts to explore the blatantly used land grab practices by the state authority in the name of development which turn out to be a great threat to the food security and loss of livelihood options for those whose land will acquired in the near future. The study will further focus on people's perception regarding new development project initiated by GMADA.

Introduction

The phenomenon of Large-scale Land Acquisitions in developing countries encompasses public and private investment in land (both purchase and long-term lease) in Africa, Central and South East, South Asia and Latin America. (Montgomery, Sessions 2002, Nalle, Arthur, Voget-Kleschin and Ott 2013). Acquiring land for development projects for any state has always been a challenge.

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It accompanies complex narratives of displacement and destruction of existing land-use practices. Urbanization is perceived by the developing economies as its most potent vehicle for achieving higher rate of growth (Bardhan and Tewari 2010; Hossain and Green 2011; Lavers 2012). Development planners and political pundits have been dismissive of 'unintended consequences' that pose serious threat to livelihood concerns of the displaced in economies that are primarily agricultural. In one of the previous publication (Singh 2015) in the book entitled Averting a Global Environmental Collapse: The Role of Anthropology and Local Knowledge which was edited by Professor Thomas Reuter in 2015. We have drawn attention to this looming threat. In this article, subtexts of livelihood and food security acquire primacy in the texts of urbanization with empirical inputs from a recently concluded study on the subject from prosperous agricultural state of Punjab in India that is commonly addressed as 'food bowl' of India (Parthasarathy and Joshi. 2009; Sonika and Sharma 2010). In a quest for more control over their food supply, many capital-rich, natural resource-poor nations are setting their sights on farmland acquisitions. This phenomenon is colloquially known as land grabbing-the large-scale purchase or lease of farmland in natural resource-rich developing countries. The cheap and abundant farmland in such nations, particularly in Africa, India, drives capital rich nations to outsource their food production(Dell'angelo et. al., 2016, Godfray, et al., 2010, Robertson and Pinstrup-Andersen 2010, Wolford et al., 2013,).

Technological revolutions have altered human habitations and precept of healthy living creating city structures corresponding to the demands of a certain section of its population. Previously inscribed rural hinterlands are now acquiring characteristics as also vulnerabilities of urban spaces (Ichimura 2003; Kingsley and Golden 1954; Kingsley 1962; Moomaw and Shatter 1993; Vesterby and Heimlich 1991). A newly published study in IOP Science shows how up to 550 Million people could be fed by crops grown on the land that is acquired for urbanization in developing countries. This is feasible if crop production and yields also improved. Currently, however 827 million people live in the developing world with daily concerns about food security[5].

The popular models of growth and development have overtly stated the requirement for urban infrastructure to absorb consumption needs of gradually emerging middle and upper-middle classes (Bapat and Agarwal 2003; Becker and Morrison.1998; Bhagat and Mohanty. 2009; Cali

[5] http://www.facing-finance.org/en/2014/07/deutsch-landraub-und-seine-ausmase-fur-die-ernahrungssicherheit-in-den-entwicklungslandern/ (Accessed on 8/05/2019)

and Menon 2009; Gugler 1988). This has necessitated erosion of rural areas and agriculture base of traditional economies. In recent years contestations are growing on this commonly accepted model. Arguments suggest that the continuous process of development of cities will lead to the destruction of agricultural land (Del Mar, Aide, Thomlinson 2001, Fazal 2000, Kim , Mizuno and Kobayashi 2003, Pandey and Seto 2015, Rao *et al.,* 2004). There are visible evidences that climate change; consumption practises and inequity in food resourcing have created fears of food security in Asia and Africa. In India, more than 50,000 hectares of valuable croplands are lost every year to urbanization (Davis 2006: 135). Diversion of agricultural land to non-agricultural uses is an issue of public debate in every agrarian economy experiencing rapid urbanization and industrial development (Blank, C., Steven 2001; Dalwai 2012).

The concern has become more complex and politicised in India due to varied perceptions about the extent of diversion of agricultural land for infrastructure and urban development and its potential consequences that are likely to impact agricultural production (Sharma 2015). However, the benefits of this additional agricultural production are often not felt locally (Anseeuw et al., 2012; D'Odorico and Rulli 2013), so that the loss of access to land can ultimately spell significant dietary, social, cultural and economic consequences for rural communities in the targeted areas (Amnor 2012; Borras et al., 2011; Davis, D'Odorico and Rulli 2014; De Schutter 2011). Different states in the country are in competition with each other to create urban and industrial hubs to assert its progressive capital (Bhramanand, P.S., *et al.,* 2013). Observations suggest that some of these states are in the race to urbanize and industrialize without taking cognizance of the fundamental character of the populations inhabiting these areas. Urban areas require different kind of skill inputs. Young people brought up in rural and agricultural economies lack essential skills to find employment in urban and industrial economies. Planners often overlook the mandated need to skill them for alternative occupations before displacing them. This has resulted in large-scale issues of joblessness and underemployment. Some states have also reported increasing drug abuse, rising crime and simmering of social unrest.

Field Area

The state of Punjab in India is often called the 'food Bowl of the country'. It is primary provider of rice and wheat that are essential ingredients of an average Indian's daily diet. It was one of the first states in the country to witness green revolution. The agriculture sector has also been the engine of financial growth in the state. In modern economies agriculture, despite the evolution of technologies and society, continues to play key roles and become major instrument in designing the economic growth and assuring the social wellbeing. (Constantin, Luminita and Vasile 2017).

More than 39 percentage of the total work force of the state depend upon the agriculture (Singh, Singh and Kingra 2007). Following data table gives us an idea of the agricultural growth and its spread in the state.

Table 1: Performance of agriculture in Punjab (area: 000, ha; production: 000, metric tonnes Yield: Kg/ha)

Crop		**2010-11**	**2012-13**	**2013-14**	**2014-15**	**2015-16**	**2016-17**
Rice	Area	2826	2849	2849	2895	2970	3046
	Production	10819	11390	11259	11111	11803	12638
	Yield	3828	-	3952	3838	3974	4149
Wheat	Area	3510	3517	3510	3505	3506	3500
	Production	16472	16614	17610	15086	16068	17600
	Yield	4693	-	5017	4304	4583	5743
Maize	Area	133	131	131	126	127	116
	Production	491	482	510	460	468	445
	Yield	3693	-	3898	3652	3683	3845
Bajra	Area	3	3	1	-	-	1
	Production	3	3	1	0	-	1
	Yield	900		895	-	-	580
Barley	Area	12	13	12	11	12	12
	Production	44	50	46	39	44	44

	Yield	3652	-	3836	3580	3696	3667
Total Cereals	Area	6484	6513	6503	6537	6615	6675
	Production	27829	28539	29426	26696	28383	30728
	Yield						
Total Pulses	Area	20	20	19	16	20	51.2
	Production	14	9	14	10	8	42
	Yield						
Total Food Grains	Area	6504	6533	6522	6553	6635	6726.2
	Production	27846	28551	29443	26708	28393	30774
	Yield						
Total Oilseeds	Area	56	57	47	48	48	49
	Production	73	70	64	53	51	66
	Yield						
Sugar Cane	Area	70	82	89	97	92	88
	Production	417	483	552	600	624	682
	Yield	5952		5888	6186	6930	7208
Cotton	Area	483	481	445	421	335	285
	Production	1822	1627	1491	1346	389	1257
	Yield	646	-	577	546	197	754
Sunflower	Yield	1620	-	1878	1762	1792	1810
Milk (Lakh tonnes)	Production	9551	-	9724	10013	10351	10774

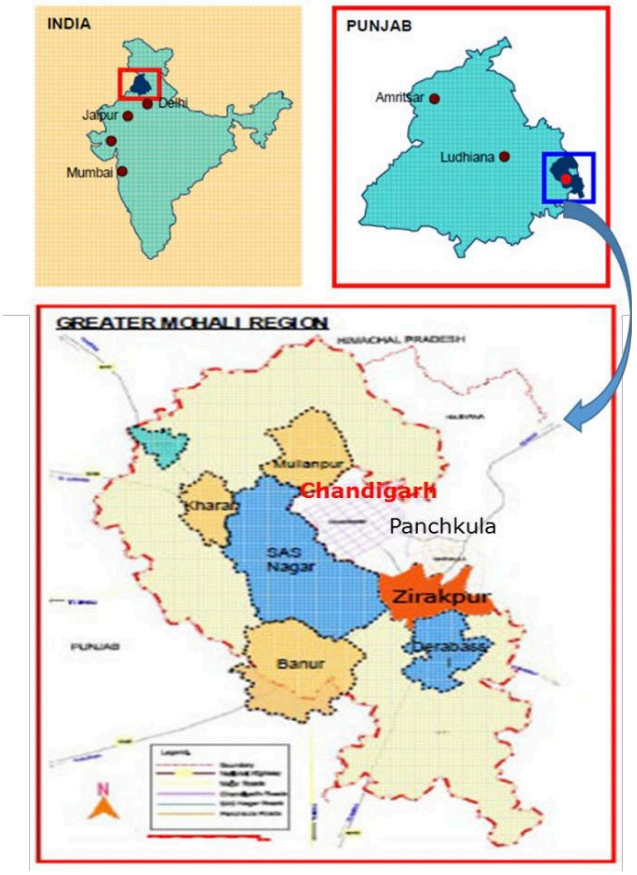
Source: Economic and Statistical Organization of Government of Punjab: Economic Survey report (2016-2017).

In recent years, a large number of farmers from this rice and wheat belt have started moving towards production of floriculture, mustard and exotic vegetables reducing the production of daily commodities in the food basket. This has impacted not only the local population but also adjacent states that were dependent on it. Massive urbanization in several pockets of the state is making further dent in the agricultural commodity markets.

Rising expectations of local populations and demands of prosperous farmers, to have a better quality of life and urban comforts, are added catalyst in the acceleration of urbanization process. Punjab government has responded to this challenge by setting up several urban development bodies under the umbrella organization called Punjab urban development authority henceforth addressed as PUDA. One of these is Greater Mohali Area Development Authority (GMADA). Importance of this urban development body is its location in the vicinity of the city of Chandigarh. Chandigarh is a modern urban township developed by famous French architect Le Corbusier. First modern city developed in independent India is capital to two states of Haryana and Punjab and provides important connectivity to the Hill state of Himachal Pradesh.

District Map of S.A.S. Nagar (Punjab)[6]

[6] Source: http://puda.gov.in/sites/default/files/Zirakpur_rpt_2011.pdf (Accessed on 13/04/2019)

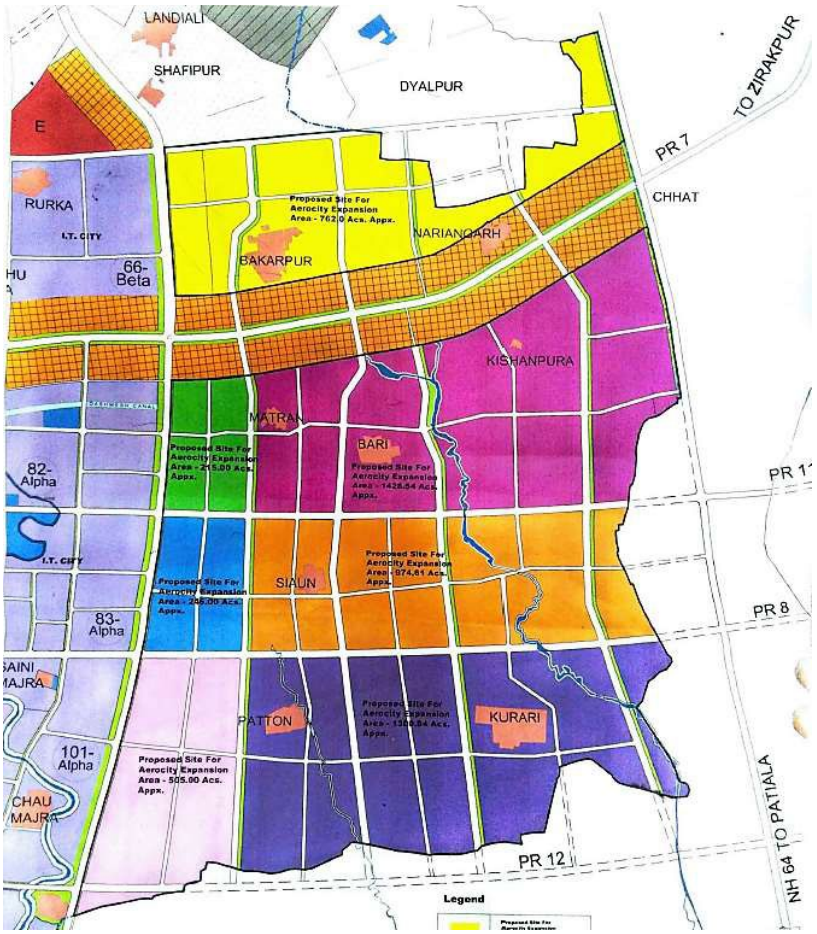


Development activities undertaken by GMADA have critical impact not only within the region covered by it but also in its periphery. Villages being uprooted are the primary provider of milk, fresh vegetables and grains to the urban dwellers in the surrounding areas. It is a well-known fact that the land being acquired in this area is one of the most fertile areas in Punjab.

For the present study villages of *Patton, Kurari* and *Seon* in reconstituted district Mohali[7] are selected. 1306 acres of agricultural land from these villages is in the process of being acquired for the expansion of the Aero-City in the vicinity of newly developed Chandigarh international Airport. The main purpose of this newly developed district is to reduce the burden of population (residential and commercial area) in adjacent Ropar district.

Map of Proposed Aero City Expansion Project[8]

[7] To develop Mohali as a new district, Punjab government has reshuffled some of its villages from nearby Ropar district to Mohali district. This comprises of 350 villages spread over an area of 1000 Sq.km.
[8] Source: Govt. Brochure GMADA Urban Estate



Aerotropolis, as it has been christened, will be developed after acquiring land of 14 villages in the vicinity of newly constructed Chandigarh International Airport. This will be the fourth independent township being developed by GMADA. It had earlier developed Knowledge City, Aerocity and IT City (1693.8124 acres in sector 66-B, 82-A, 83-A, 101-A, Mohali). In the last decade in all eight projects have been developed in the Greater Mohali area that includes Eco-City (Appx. 419 Acres), Edu-City (1700 Acres proposed) and Medi-City (350 Acres) in New Chandigarh[9]. The proposed acquisition for the new project would entail about 5438 acres of land. This acquisition falls in fourteen revenue villages namely *Bakarpur, Naraingarh, Kishanpura, Safipur, Rurka, Matran, Bari, Chatt, Saini Majra, Seon, Kurari, Chau Majra, Manauli and Paton.* Table 2 gives the details of the proposed land to be acquired from these villages:

[9] We have earlier studied development projects in the area and found the responses of the locals very similar to the narratives in the present study.

Table 2: Notifications of proposed Aero City Expansion

Notification no.	Name of Villages	Proposed Acquisition (land in Acres)
6/05/2017-6HG1/1118721/1	Bakarpur, Naraingarh, Kishanpura, Safipur and Rurka	762
6/05/2017-HG1/1118750/1	Bakarpur, Manuali, Matran and Chachu Majra	215
6/05/2017-6HG1/1118766/1	Matran, Bari, Kishanpur and Chatt	1429
6/05/2017-6HG1/1118793/1	Manuali, Saini Majra and Seon	246
6/05/2017-6HG1/1118805/1	Seon, Bari, Kurari and Kishanpura	975
6/05/2017-6HG1/111825/1	Paton, Saini Majra and Chau-Majra	505
6/05/2017-6HG1/1118834/1	**Paton, Kurari and Seon**	1306

Source:- GMADA Administration

Urbanization projects in this are within a radius of 20 kilometres from the City of Chandigarh. These are being planned to accommodate urban spill that would happen from Chandigarh and semi-urban pockets of other districts of Punjab. As in the case of Eco-city new Chandigarh, there is a possibility that some migration to these newly developed townships would also happen from other states of the country. Middle class families looking for ownership of affordable residential properties in environment friendly areas are also investing in land and built flats in the area. This is bound to create pressure on local commodity market and availability of grains and vegetables

as their production has significantly gone down. One of the primary objectives of the present research is to assess the loss of agriculture to non-agricultural activities.

Urban planners in the region are focused only on index of urbanization and have not taken cognizance of accompanying changes that have potential of creating social tensions. This is likely to happen because of changing demography and declining resource capacity of these localities. We explore some of these trepidations in the data generated from the field.

Research Methodology

For the present study, a sample of 50 respondents affected by the process of land acquisition is drawn from three villages in the locality. According to the revised norms for compensation, the displaced farmers are given the option to opt for either cash compensation or join land-pooling scheme introduced by the Punjab Government in 2013. In a recent meeting of the Punjab Cabinet, provisions of the land-pooling scheme are further tweaked. The state has agreed to give 15% of the cost of the land acquired as cash compensation after a there is a registered sales deal. We collected narratives from both sets of displaced farmers. Ten special interviews were also conducted with various members of the local governance institutions that included members of *Panchayats*, builders and GMADA officials to get their perspective on the project.

Narratives generated from displaced members of the families comprise the primary database. Whenever necessitated, data gathering tools comprising of in-depth interviews, observations and Schedules with structured and unstructured questions were also resourced. Fieldwork for the present research lasted for one month (April 2019).

Demographic profile of the Field villages

To give our readers a comprehensive view of the populations being impacted, a brief profile of the field villages is presented here.

Field Village 1. Village *Kurari* is a medium sized village with a total of 358 households. It has a population of 2033 comprising of 1092 males and 941 are females. Child population (0 to 6 years) is 238. Important it is to note that the sex ratio of these villages is 862, which is lower than average for Punjab at 895 and much lower than the national average of 940.

Field Village 2 & 3. *Seon* and *Patton* are relatively small villages and are dependent on *Kurari* village for getting support services like *Suwidha* Centre, Education and health faculties. Seon has 119 and Patton has 94 households. Total population of *Patton* is 548 and *Seon* is 650. Consolidated demographic profile of the three field villages is given in the following table (Table 3).

Table 3: Demographic Constitution of Field villages (Census of India 2011)

S.no.	Demographic Variables	VILLAGES		
		Seon	**Patton**	**Kurari**
1	Total Households	119	94	358
2	Total Population	650	548	2033
	Males	360	301	1092
	Females	290	247	941
3	Total Sc Population	220	173	562
	Males	124	99	319
	Females	96	74	243
4	Population under age 0-6	69	51	238
	Males	42	28	136
	Females	27	23	102
5	Literacy rate	77.45%	71.83%	77.21%
	Males literacy rate	82.08%	77.66%	79.92%
	Females literacy rate	71.86%	64.73%	74.14%

Demographic profile highlights the fact that a significant number of residents of these villages belong to the scheduled caste population (955/3031). They are the most marginalized section of

the rural population. Many of them are landless labourers; some do tenure farming on leased land while others provide menial services. Displacement impacts them most as they loose their livelihood and symbiotic relation they had developed with higher caste landowners. When land acquisition occurs, they become homeless and get no compensation, as they are not the owners of the land. In the present research sample the scheduled caste community of Patton village are marginal farmers who possess only 1-2 acres of land. The schedules caste community of Kurari and Seon villages do not own any land and they were totally dependent on agricultural related activities for their sustenance.

Evidently literacy rate in these villages for both men and women is above 70% with the exception of Patton where literacy rate for women is 64.73%. But to say that given literacy rate empowers both men and women to make independent decisions is fractious. It also fails to provide necessary skills for the local populations to move from agricultural to non-agricultural remunerative activities. As per the Census 2011, the working population of these three villages are divided into two main categories as shown in Table 4. These include main workers comprising of individuals from the marginalised sections regularly hired by affluent farmers for working in their fields. Main workers are also engaged in pastoral activities and are relatively economically better off. Marginal workers comprise of migrant workers primarily from the states of Uttar Pradesh and Bihar. They are seasonal workers coming to the state at the time of harvesting of Paddy and wheat. Land acquisition and switch from Paddy and wheat cultivation to floriculture and other farm produce would also impact livelihood of marginal workers from other states. In the present sample, presence of marginal workers is rather low and that is probably because of declining opportunities for work.

Table 4: Working population of the villages

Villages		**Seon**	**Patton**	**Kurari**
	Total Workers	224	166	928
	Males	209	160	638
	Females	15	6	290

	Main Worker	222	157	896
	Marginal Worker	2	9	32

Source: Census of India (2011)

Primary economic activity in the three villages is agriculture. Allied to it are pastoral activities that are largely pursued by the women of the household. Women wake up early and after milking cows and buffaloes on their dairy farm, they go to get fodder for them. Men take collected milk to the market or milk cooperatives or distribute it in the morning from house to house to their regular customers. When land acquisition takes place, women are deprived of their primary economic responsibility. This makes them far more vulnerable, particularly where they are running single parent households. Loss of agricultural land also brings to cessation pastoral activities, as most displaced household are not compensated with enough land that could accommodate their dairy animals.

Livestock is considered as one of the most important components of the economic set up of every village in Punjab. This subsidiary source of income along with agriculture adds a lot to the existing revenue of farmers in these villages. Villagers reared cattle for milk and manure. Cows and buffaloes are mainly reared for milk. Bulls are used in the various agricultural activities. Few villagers also domesticated horses and dogs. Several farmers have modern farming equipment like tractors, tiller, harrow and adequate irrigation facilities with tube wells for which free electricity is provided by the state. They also get high yielding variety seeds, fertilizer and pesticide at subsidized rates. When they get cash compensation for the agricultural land they surrender, they tend to loose all these subsidies and support that state provided to them as farmers. In addition state provides support price that covers the cost of production, labour and profit[10] for cereal crops produced in these fields.

[10] The State Food & Civil Supplies Department Punjab is the nodal agency for procurement of food grains viz. wheat and paddy under MSP. Department is the nodal department for procurement and Punjab Agriculture University, Economics Department for cost estimation. MSP made known to the beneficiaries only after the commencement of their sowing activities; produce valued less than the expected rate due to the moisture factor. ----- Fallow land and % to irrigated area to net cropped area that need to be undertaken while deciding Minimum Support Price (Evaluation Report on Minimum Support Price NITI AAYOG 2016:48)

Table 5: Extent of land being acquired from each affected household

S. No.	Name	Village	Religion	Caste	Total Land	Total affected land	Type of land
1	Utej Singh	Seon	Sikh	Jatt Sikh	5 Acres	5 Acres	Cultivable
2	Malara Singh	Seon	Sikh	Jatt Sikh	8 Acres	7 Kanal, 17 Marla (Appx 1 Acre)	Cultivable
3	Skat Singh	Seon	Sikh	Jatt Sikh	9 Acres	9 Acres	Cultivable
4	Harnam Singh	Seon	Sikh	Jatt Sikh	14 acres	8 Acres	Cultivable
5	Hardeep Singh	Patton	Sikh	SC	Landless	NA	NA
6	Badesha Singh	Patton	Sikh	Jatt Sikh	Didn't reveal	8 Acres	Cultivable
7	Karnail Kaur	Patton	Sikh	Jatt Sikh	Didn't reveal	1/2 Acres	Cultivable
8	Hari Singh	Patton	Sikh	Jatt Sikh	Didn't reveal	4 Acres	Cultivable

(https://www.niti.gov.in/writereaddata/files/writereaddata/files/document_publication/MSP-report.pdf (Accessed on 08 August 2019)

9	Harjit Singh	Patton	Sikh	Jatt Sikh	Didn't reveal	1 Acre	Cultivable
10	Karam Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	4 Acres	Cultivable
11	Harnam Kaur	Seon	Sikh	Jatt Sikh	Didn't reveal	6 Acres	Cultivable
12	Gurdeep Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	7.5 Acres	Cultivable
13	Surjeet Kaur	Seon	Sikh	Jatt Sikh	Didn't reveal	4 acres	Cultivable
14	Gurtej Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	2 Acres	Cultivable
15	Somail Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	2.5 Acres in Seon and 3.5 Acres in Patton	Cultivable
16	Kartar Singh	Kurari	Sikh	Jatt Sikh	Didn't reveal	5 acres	Cultivable
17	Jagir kaur	Kurari	Sikh	Jatt Sikh	Didn't reveal	1/2 Acre	Cultivable
18	Ghaba Singh	Kurari	Sikh	Jatt Sikh	12 Acres	12 Acres	Cultivable
19	Sardara Singh	Kurari	Sikh	Jatt Sikh	3 Acres	3 Acres	Cultivable

20	Harnek Singh	Kurari	Sikh	Jatt Sikh	Didn't reveal	Don,t Know	Cultivable
21	Kuljeet Singh	Kurari	Sikh	Jatt Sikh	Didn't reveal	5 Acres	Cultivable
22	Pala Singh	Kurari	Sikh	Jatt Sikh	19 Biswas	19 Biswas (Apprx 843.075 Sq.meter)	Cultivable
23	kultaj Kaur	Kurari	Sikh	Jatt Sikh	Didn't reveal	Don't know	Cultivable
24	Harbans Kaur	Kurari	Sikh	Jatt Sikh	Didn't reveal	5 Acres	Cultivable
25	Satnam Sigh	Kurari	Sikh	Jatt Sikh	Didn't reveal	1.5 Acres	Cultivable
26	Baljeet Singh	Kurari	Sikh	Jatt Sikh	Didn't reveal	843.075 Sq. meter	Cultivable
27	Harpreet kaur	Kurari	Sikh	Jatt Sikh	Didn't reveal	Don't Know	Cultivable
28	Malagar Singh	Kurari	Sikh	Jatt Sikh	Didn't reveal	7 Acres	Cultivable
29	Jaswant Singh	Kurari	Sikh	Jatt Sikh	17 acres	10 Acres	Cultivable
30	Amro	Kurari	Sikh	Jatt Sikh	Didn't reveal	4 Acres	Cultivable

31	Bhag Singh	Kurari	Sikh	Jatt Sikh	Didn't reveal	1 acre	Cultivable
32	Gurmeet Kaur	Seon	Sikh	Jatt Sikh	Didn't reveal	5 Acres	Cultivable
33	Sandeep Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	3 Acres	Cultivable
34	Kulwinder Singh	Seon	Sikh	Jatt Sikh	12 Acres	12 Acres	Cultivable
35	Nirmail Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	8 Acres	Cultivable
36	Harcharan Singh	Seon	Sikh	Jatt Sikh	10 Acres	6 Acres	Cultivable
37	Randhir Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	12 Acres	Cultivable
38	Lakhvir Singh	Seon	Sikh	Jatt Sikh	15 Acres	12 Acres	Cultivable
39	Manna Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	8 Acres	Cultivable
40	Devi Diyal Sharma	Seon	Hindu	Barahman	Didn't reveal	1 Acre	Cultivable
41	Kulwant Singh	Seon	Sikh	Jatt Sikh	Didn't reveal	1.5 Acres	Cultivable
42	Bhana Mal	Patton	Sikh	Jatt Sikh	27 Acres	26.5 Acres	Cultivable

43	Harbant Singh	Patton	Sikh	Jatt Sikh	7 Acres	7 Acres	Cultivable
44	Harjeet Singh	Patton	Sikh	Jatt Sikh	12 Acres	12 Acres	Cultivable
45	Lal Singh	Patton	Sikh	Jatt Sikh	8 Acres	8 Acres	Cultivable
46	Harman Singh	Patton	Sikh	Jatt Sikh	3.5 Acres	3.5 Acres	Cultivable
47	Bhajano	Patton	Sikh	Balmiki	Landless	NA	NA
48	Hardiyal Singh	Patton	Sikh	Jatt Sikh	8 Acres	Don't Know	Cultivable
49	Puja	Patton	Sikh	Balmiki	NA	NA	NA
50	Ravinder Kaur	Patton	Sikh	Jatt Sikh	6.5 Acres	Don't Know	Cultivable
Total Land Affected land							

Source: Data sheet compiled on the basis of information provided by the respondents

Narratives

The first narrative that we place before you is that of Ujjagar Singh (59)[11]. He occupied important position of village head of one of the field villages. He informed:

In 2001, Sahara group of builders acquired 100 acres of land in the vicinity of the village Kurari as a pilot project. There was a sudden escalation in the cost of the land in the village. Many villagers were prompted to sell their land because of lucrative compensation. Builders and other urban planners approached them for their prospective projects. Thus started the process of conversion of agricultural land for non-agricultural use. Then came GMADA with its satellite Aero-City Expansion project that included village *Kurari* among 14 villages to be acquired by the government body.

Every village has *Shamlat* land[12] that falls under the jurisdiction of the state for common use. To avert that, village *Panchayat* decided to allot 2 Marla plot to each BPL (Below Poverty Line) family on the *Shamlat* land. This would have facilitated compensation to these landless families, once the land is acquired by GAMDA. But there was opposition from within the village and the matter was stayed in the court.

He grieved that the pace at which agricultural land is being urbanized; the lush green fields would soon convert into concrete jungle. His apprehension is that the cereal crop like wheat, Maize, Rice etc. would soon disappear from the area. Another point of contention that he brought to our notice was different compensation packages that are offered by private builders as also by GMADA. This has created frictions not only among those who surrendered prime agricultural land but also between the state and the farmer. This resulted in fresh litigations and delay in land acquisition as also launch of proposed construction activities.

Another respondent from Patton village shared his views on the on-going process of land acquisition. He emphasized that a decade ago, no one wanted to come and settle in this village, as

[11] Name changed

[12] Shamlat land is the one, which does not come under habitation and cultivation and is considered as *Jumla Mushtarka* (Consolidation of land holdings of common use) under the village common land Regulations (Rules), 1954 later amended in 1961 and 1964. (http://timesofindia.indiatimes.com/articleshow/68408530.cms?utm_source=contentofinterest&utm_medium=text&utm_campaign=cppst (Accessed on 02-08-2019)

the land here was not suitable for farming. But then the residents worked very hard and in less than two years made all the available land for agriculture most fertile. Land was relatively cheaper here selling at rupees two lakhs per acre[13]. Most farmers in the area grow vegetables and cereals and sell it in the nearby *Kisan Mandi* (farmers market). Their hard work was barely bearing fruit, when GMADA decided to notify the village for land acquisition for Aero-city expansion project. Fearing compulsive acquisition, farmers started selling their land to private builders.

He reasoned that private builders gave much better compensation and the money was quickly released. When government acquires land, compensations are not adequate and the process of payment often gets trapped in legislation. He acknowledged that he also sold his land to a private builder as soon as he learnt that his land also falls in the notified area for acquisition. With that money, he went and bought five acres of land after selling one acre in a far away area. His regret is that he had worked very hard on the piece of land that he was forced to sell. Though he bought a much larger piece of land, he is not sure about the production capacity of the new land and also laments that he would have to move away from his traditional roots.

These narratives tell a story of planned urban development that has displaced fertile agricultural land and brought misery to the farmers tending these fields. One of the major fallouts of this displacement for the local farmers was the question of livelihood and alternate occupation. Conversations with the Urban Development Authorities reveal apathy towards the ousted. One of them argued, "these farmers have no reason to complain, they have received large sums of cash that they are busy spending on luxury cars and sending their children abroad". He was not even aware of the fact that most of those displaced were trained only to pursue agriculture as their primary occupation. Their children were not professionally qualified to do anything else. Some of them did travel abroad but had to return after wasting large chunk of money, as they were not qualified to work in any other sphere. Unscrupulous travel agents duped some of them. Many others wasted money trying to establish enterprises that failed, because of lack of skills.

Sajjan Singh, whose land is acquired in Seon village for the Aero-City project regretted that he has no hold on this land. GMADA has acquired it and has not even paid adequate compensation for it. He has six acres of landholding at the border of Patton and Seon village and there is a possibility

[13] One square yards = 9 square foot, *Kila* or One Acre = 4840 square yards, *Biswa* = 50.41 square yards, *Bigha* = 3025 square yards, *kanal* = 500 square yards

that even that land would fall under the proposed land acquisition plan for the development of the aero-city expansion. If that happens, he will be deprived of his existing landholdings and without any means for livelihood.

There is no denying that local residents of these villages were happy as long as small portions of land along the side of roads was acquired as it ensured better connectivity for them. But when their fertile agricultural land is acquired for developing housing for the urban rich and for creating infrastructure in which displaced communities from these villages are not equal stakeholders, the response is entirely different. Locals feel cheated! Upheavals have marked their lives. They built close-knit social networks and now with mandated displacements, those networks are under persistent threat. Their social support systems also stand collapsed, as urban values are distinctively different from cherished foster ties, still prevalent in Punjab villages.

The state of Punjab is experiencing deceleration of its economy and is under constant pressure of mounting debts for the past few years. This has forced the authorities at the helm of the affair to acquire land to generate extra revenue to fill the coffers of the state. To achieve that objective, Punjab state has given the work of land acquisition to its urban development authority that has created several subsidiaries as stated earlier in different districts of the state for focused urbanization. These bodies essentially comprise of land developers, bureaucrats and politicians. Social scientists, social activists and village stakeholders were not even made part of the land acquisition process. Land was acquired, under the 1894 land acquisition Act, formulated by the British, and the practise continued from 1950 to 2013. For all these years it was acquired in a cavalier and colonial manner. Independent India continued to perceive it as the property of the state that could be acquired at short notice by official notifications. Compensation for such projects was much lower than the compensation paid by the private developers.

Some changes are brought in by the Land-Acquisition act of 2013. It has now mandated social impact analysis for these projects and affected and effected peoples voices are compulsorily recorded. However, this has only resulted in some kind of nudging but experience suggests that very little is heeded to the demands of the locals. On paper these development bodies started with lofty ideals, goals and vision statements. But in reality displaced have by and large remained mute victims. While planning, development module for the Aero City Expansion, attempt was made to bring together all the stakeholders that included local body representatives and common masses along with developers. But these meetings remained confined to only those individuals that had

vested interest in the real estate in the area. Many stakeholders on grounds of anonymity said that given the existing state structure and administration, any voluntary participation in the project appeared only superfluous. The regime exercises centralized control and there is rampant corruption in almost all the departments, involved with any construction activity in the state.

Contentious Issues

Once the process of urbanization essentially intertwined with land acquisition starts unfolding its various facets, the first essential chord of 'social organisation' farm as the 'basic multi-functional unit' starts collapsing. Families disintegrate because land holdings are no longer in their possession. Next is husbandry-integral part of the rural economy that starts crumpling. The case studies cited in this research paper suggest that animal rearing as a means of livelihood became unsuitable because pasturelands were no longer in their possession.

Family ties were under pressure and ruptures were beginning to appear in close-knit family units. Swarbrooke (2002: 261-262) had warned that in the practice of sustainable development, it is critical to establish 'socio-cultural holding capacity and measure quantity of inhibitors' before the host community's culture and society starts to be permanently affected. These case studies also reflect respondent's contention of the state being an adversary rather than an enabler of their welfare. The state is expected to be the protector of pe. ople's interests. When a project is viewed as inhibiting common masses welfare, the project is bound to experience difficulties.

Conclusion

This research paper reveals that the Aero-City Expansion project was an ambitious idea but executed without due diligence and preparedness. This kind of development has become a case of political expediency for land acquisition in a process that brings instant revenue to the state. Interests of the local residents and their ability to cope with enforced changes become perfunctory. To build a sustainable city, however, all the stakeholders are expected to contribute and benefit evenly. Taking care of displaced people and ensuring their welfare is key to it.

The other ignored key-sector is agriculture. Agriculture has remained the engine of economic growth in Punjab. Due to the poor state of soil health and noticeably declining underground water table, this sector is under threat. If agricultural growth is not sustained in rural areas, however, consumption will outstrip production levels, resulting in insufficient supply and food price inflation in urban. Three years ago, for example, India witnessed huge shortage of pulses

(legumes), which constitute an essential part of most Indians' daily meal. Due to the rising cost of pulses, emergency measures for import of these essential food items were required. It created unwarranted stress on the country's limited foreign reserves. Such a shortage asked for emergency interventions from both state and centre. Incentives were also given to farmers to grow more pulses as well as cereals under the National Food Security Mission.

Farmers in Punjab are currently under dual pressure. Rising pollutions levels in Delhi and other adjacent urban areas have compelled them to change the cropping pattern, given that a significant portion of air pollution is attributed to the burning of rice straw husk. Land use patterns are also being altered at a rapid pace. A steady urbanization process in Punjab is dissuading people from farming. The state is actively promoting and providing subsidies for the growth of the industrial sector. Industrialization and high-tech enterprises in turn cause an inflow of skilled people from outside. This is impacting the demographics of the state, and often unskilled local people become marginalised. Such trends lead to an increasing ethnical and economic separation, deterioration of the environment, loss of agricultural land and wilderness, and the erosion of society's architectural heritage (Hossain and Green 2011; Leccese et al, 2000).

Urban planners are convinced that industry and technology would bring additional and alternative livelihoods. They fail to foresee the risk of social tensions when outsiders replace local human resources. To preclude that possibility, the up-skilling of local people in the state is critical, particularly for young people. For any process of urbanization to succeed, it is imperative to discuss the propensities of resources in the built environment, along with the role of political resistance and the societal strengths (Harvey 1983). The existing Aero-city expansion project has completely overlooked these propensities and created an environment for social and political instability. Agricultural decline is imminent and food insecurity has become a real prospect for the near future.

Abbreviations

IOP Science: IOP science is an online service for journal content published by IOP Publishing; ha: Hectare; Kg/ha: Kilogram per Hectare; PUDA: Punjab Urban Development Authority; GMADA: Greater Mohali Area Development Authority; S.A.S. Nagar: Sahibzada Ajit Singh Nagar; IT City:

Information Technology City; MSP: Minimum Support Price; NITI AAYOG: National Institution for Transforming India;BPL: Below Poverty Line;

Land Measurment:

One Karam:1.6764 meter; One Marla: 25.2928 Sq. meter; One Kanal or 20 Marla: 505.857; *Kila* or 160 Marla or One Acre = 4046.856 Sq.meter (Singh 2013)

Ethical Approval and Consent to participate

All the data was collected after taking due consent from all the respondents and They were informed about the presentstudy being conducted in their villages.

Consent for publication

All the formalities and consents were taken in consideration for this publication.

Availability of supporting data

Not Applicable

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