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**The Role of Migration and Remittances
in a Growing Economy:
Perspectives on Social classes in Rural India and Bihar**

by

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**THE ROLE OF MIGRATION AND REMITTANCES
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PERSPECTIVES ON SOCIAL CLASSES
IN RURAL INDIA AND BIHAR**

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Abstract

This study aims to examine the current changes of domestic out-migration from rural areas and the impact of following remittances for the poorer rural households by economic and social strata, specifically focusing on the culturally and socially discriminated backwards, Dalits (in the official documents, expressed as “Scheduled Castes”: SC), during India’s remarkable economic growth from 1990s to the latter half of the 2000s decade, by using comparative household data sets provided by National Sample Survey Organization (NSSO) for those two decades. This paper also tries to measure the impacts of the recent economic development on Bihar, not only the poorest state but also of the fastest growing state in the 2000s.

In the 1990s, at the introductory stages of economic liberalization, the average per capita consumption expenditure (MPCE) levels of households which receive remittances from out-migrant to within India were much lower than non-migrant households. Conversely, in 2007-08, at the point of highest growth on Indian economy ever, there has been the evidence that remittances by out-migrants improved economic conditions of poorer households, since the levels of MPCE of out-migrant households with remittances are significantly higher than those of non-out-migrant households for all social classes. SCs also have benefitted from remittances via increased mobility, and this tendency is very notable in rural Bihar, where the most socially and economically backward group are better off by receiving remittances. In Bihar, the level of MPCE of agricultural labour SC households, the most backward social/economic group, with remittances far exceeds the MPCE level of the same types of households without remittances. As for the

determinants of out-migration, rather than pull factors, it appears that “rural distress” and “social distress” worked as push factors to be most influential to the rural poor

out-migrants who make remittances. Such rural distress and relative backwardness in a country could have been worsened because the recent economic growth has accelerated regional disparities. However, much increased remittances following out-migration by social backwards could play a role as means of poverty alleviation and as a means of possible empowerment for their backwardness.

Keywords : out migration and remittances, India and Bihar, Scheduled Caste, backwardness, poverty alleviation

JEL classification: J61, O15 and R23

Introduction

There are debates on the causes of migration from rural areas during the economic growth period in India. The traditional view emphasizes the aspect of rural distress which works as a “push factor” to push the poor people out from the economically backward areas. In such cases, relatively limited numbers of rural poor, who are relatively better off among the poor, can move out, while poorer and the poorest are often left out from the opportunities to migrate-out and thus stay put in the rural areas, due to their lack of mobility, in terms of being able to afford moving costs and the availability of useful contracts, contacts or outside information. However, in response to the rapid economic growth (even to the point of boom) which requires an increased labour force and the number of newly available jobs in the industrial sector since the economic reform period, the current characteristics of rural out-migrants look to have changed to show a more positive side to rural out-migration. As the whole economy grows, the speed of economic growth in the urban industrial areas becomes much faster than before, which widens the rural-urban economic gap. It may contribute to relative immiseration of rural areas via increased inequality between those regions. Moreover, the pattern of Indian economic development is characterized by the insufficient creation of economic demand and adequate jobs to meet the needs of huge labour force of India, and growing concerns and problems of unemployment have recently emerged in this globalization era (Sen [2007]). However, at the same time, recent Indian economic growth may have also created more access for the rural poor people to improved opportunities in advanced areas. Now, the question is whether lower or lowest earning rural household groups, such as economically and socially backward households become more mobile or are still left out from the percolation of recent economic development in the areas in rural India.

This study tries to follow the current changes of population outflow from rural areas in the form of intra-state migration, and to measure the role of remittances for the rural households. In order to specify the effect of migration and remittance on the households that are not supposed to be within the “better-off” strata, this paper specifically focuses on the economic condition of “Dalits,” the rural SC households, that account for more than 20 percent of rural population, and other backward class households (OBCs), during the growth period from the early 1990s to the latter half of the 2000s decade in India. Actually, the poverty incidence of SCs is quite high, 48 percent (1993-94) and 35 percent (1999-00) of rural SCs live below the poverty line while overall percentage of rural people below poverty line is 38 percent and 27 percent in each period (Planning Commission). Also, it is worth analyzing the pattern of migration by the SCs or other backward classes in the least economically developed region, Bihar, where intra-state out-migrants as agricultural labourers to Haryana and Punjab used to be very common, but currently the destination of the migrants in the 1990s shifted to the industrial areas, such as Maharashtra and Delhi, in the 2000s. By comparing the different data collected by the National Sample Survey Organization (NSSO) in the two different period, 1993 and 2007-08, this article analyzes the dynamics of changing intra-state

migration and the subsequent remittances by economic and social strata, particularly focusing on rural SCs and non-backward classes.

1. Research Background of rural-urban Migration: India and Bihar

The classic economic analysis sees that rural to urban migration is induced by the widened economic gap between rural and urban areas due to high economic growth in the urban sector (Harris and Todaro [1970], Lewis [1955]). Actually, in the Indian case, the contribution of the primary sector to the GDP is falling: 37% in 1981-82, 32% in 1991-92, and 25% in 2001-02. On the other hand, the percentage of the rural population to the total population is still high: 76.7% in 1981, 74.3% in 1991, and 72.2% in 2001. In spite of the rapidly falling importance of the rural economy' to total GDP, the ratio of the rural population does not accordingly decrease, and instead remains very high. That means that there is a relative worsening of the rural economy to the urban economy. Such rural distress caused by inequal growth between the rural and the urban sectors contribute as "push factor" for the rural poor people to migrate out, while urban and even rich rural prosperity induces the migration out from the rural to the urban sector by showing high real wages, as a "pull factor". In 1970s Indian rural villages, the rural push factor has been considered as main contributor to rural out-migration (Connel et al.[1976]) and remittances from pushed rural labour force even worsens the rural-urban gap because the amount of remittance is far from sufficient levels to make up the rural-urban disparities (Lipton [1977]). Studies from the urban side also follow the path which leads to rural-urban economic dispersion and further disparities even within rural people. Economic analysis on the wage data of in-migrants to Delhi showed that the mobility to an urban area like Delhi is strongly subject to the availability of pre-contract before migration, and information about the urban labour market. Thus, the mobility and the return of in-migration to Delhi areas for those from rural poor households are limited, but for those who are already better-off with good urban contact, migration is fairly beneficial in terms of wage (Banerjee [1984],[1986]).

Rural out-migrants often make remittances to their household back at home, and the role of remittances may differ by the characteristics of the households, such as by origin, region, income strata, and social environment. For rural households in India, remittances and migration appear to work as means of risk aversion of shortfall of household income, since migration itself diverse economic risks by relocating household members in regions under different climate conditions and remittances from migrants make up the shortage, fluctuation, or low level of households' income which is heavily influenced by weather (Rosenzweig and Stark [1989], Dréze and Sen [1989]).

On the other hand, focusing on regional characteristics, different perspectives, which could be described as "productive" ones, on the determinants and functions of migration and remittances emerge. In Kerala,

where historical labour movement to foreign countries has long been known, migration and remittances have contributed to poverty alleviation and accumulation of enhanced human capital, such as education in those areas, because the cheap and educated labour of Kerala has been long favoured by Arabic countries (Joseph [1988], Zachariah et al. [2003], Banerjee, et al. [2002], Ramachandran [1997], Irudaya Rajan, et al. [2007]). In spite of such a positive link between education level and remittances in South India, at an all India level, it is strongly suggested that there have been negative links between households' consumption levels and educational levels, as the households' possibility of receiving remittances increases when migrants are literate, by NSS data in 1993 (Kato [2010]).

In terms of productive aspects relating to migration and remittances, recent regional micro-level studies also support the positive effect of migration on the poorer households. Opportunities and benefits of migration expanded to the many rural poor to alleviate poverty incidence by improving their living conditions (Desingkar and Farrington [2009]). Urban research in Delhi slums supports that in-migration by the poor help to stop downward income mobility at least, despite rejecting income upward mobility by migration (Mitra [2007]).

As for lower castes, such as Scheduled Castes (SCs), it is still reported that most SCs remain poor and also they are excluded from the opportunities to migrate because of discrimination (Desingkar and Start [2003]). However, looking at the migrants from Bihar, which has been long known as the least economically developed state in India, out-migration from rural Bihar appears to gain importance for those social backward classes. The state also has a long history of migration from the colonial period (de Haan[2002],Awanish[2009]) and the main players to move out from Bihar were distressed rural landless poor towards agriculturally advanced rich areas like Haryana and Punjab in the 1980s (Singh et.al[2007]). With the coming of the age of economic reform since 1991, the destination of migrants and the characteristics of migrants seem to have changed. The destination of migrants shifted from rural Punjab or Haryana to the urban areas such as Dehli, Mumbai, and Goa (Awanish[2009]). The most notable point of population movement from Bihar is that many males who belong to the social backward classes like Dalits, Extremely Backward Classes (EBCs) become mobile, as did rural males from the economic backward households, rural landless households, and Muslims (Desingkar et. al [2006]). It is naturally supposed that there is caste discrimination in the job market for those backward classes to enter it via the official channel, and most of them are non-skilled and less educated. Accordingly, most of SCs and other backward classes from rural Bihar mainly engage in non-skilled jobs such as agricultural labour, casual construction work, brick kiln work, and rickshaw work (Desingkar et. al [2006]). Most of the rural people are landless, as 75% of rural households are landless or marginal landholders, according to the NSS 1999-2000, and SCs are certainly the least endowed of the rural population, in terms of social and economic resources. Moreover, the SCs are not able to choose jobs, due to caste discrimination. In

addition to the economic stagnation of the state and unequal land distribution in rural areas, social pressure mounts on the SCs and other backward castes in Bihar. Therefore, excess rural distress in Bihar looks to be the main factor to push poor people and SCs / social backwards out from those areas.

However, such an argument of excess rural distress in Bihar may not be enough to give reasonable explanation for out-migration by socially/economically backward people. Some studies argue that out-migrants from rural Bihar are from the regions with relatively high agricultural output (de Haan [1999][2002]), and, moreover, some journalistic sources suggest that Bihar witnesses increased rural out-migration by SCs as the economy of Bihar has dramatically improved, after Nitish Kumar's appointment as the minister of the state in 2005. Actually, Bihar's growth rates of Gross State Domestic Product (GSDP) increased by 11 per cent from 2004-05 to 2008-09, led by the growth of the construction sector, whose contribution to the growth is estimated at 29%, but the contributions of the agricultural sector and agricultural-related sector is low, but positive, at 7.1% and 7.7% respectively (Das Gupta[2010]). Therefore, not only "rural distress" but also recent improvement in the economy may have acted to expand the mobility of the rural poor and social backward in the state by enabling them to afford the expense to migrate-out. In addition, some studies claims that it is a symbol for the SCs and social backward households to migrate out from Bihar to get an outside job as freedom from the serious social constraints on them (Awanish [2009]). If the likes of SCs gain more mobility as the economy grows, such rural out-migration does not necessarily reflect rural distress and does not accompany inequalization of SCs in rural Bihar. It would rather imply the emerging importance of expanded opportunities that could give potential empowerment to those socially and economically backward in rural Bihar.

This study focuses on the recent changes in intra-state migration and its effect on the ecmp,u pf rural households' in the migrants' origin, by focusing on social strata, particularly rural SCs and other backward classes, from the early 1990s to the 2000s, in order to measure the influence of economic reforms on people in rural India and SCs in Bihar, in those periods.

1.2. Data

In this paper, raw data from large sampling data that are collected by the Indian Government Body, National Sample Survey Organization (NSSO) is used. For the purpose of measuring changes of migration in different periods in the 1990s and 2000s, two data setts provided by NSSO are compared for analysis; first, the 49th National Sample Survey, 49th round, Sch.1.2 "Housing and Migration Particulars" whose survey period is from Jan – July 1993 and whose content data collects about 76,000 sample households in rural areas; and second, 64th NSS, Sch.10.2. "Employment & Unemployment and Migration Particulars" whose survey period is from July 2007 – June 2008 and whose content date collects 79,000

households in rural areas.

2. Changes of Migration: between 1993 and 2007-08

2.1. Overview of rural Migrants

How many people migrate out from rural areas to another state or overseas? How poor / how rich are those households which sent out-migrants to outside destinations? Are there any changes between the early 1990 and 2000s? In order to clarify those points, some dynamic figures in rural India are shown in Table 1.

Table 1. Migration Rate (Household base) within 5 years

Rates of household with any migrant within 5 years		
(migration household rates = sample household number / total sample household number)		
	1993 (49 th NSS)	2007-08 (64 th NSS)
Male out-migrant	0.143	0.139
Female out-migrant	0.013	0.027

First, it should be noted that there are big differences in the way of data was collected in terms of categories between the 49th and 64th survey. The objective of the 49th NSS was to collect data of detailed characteristics of migrants who migrated out within 5 years: e.g., when they migrate out, where they first migrate out, what their educational status is, and so on. On the other hand, the main concern of the 64th of NSS lies in the characteristics of the current household members though the data also collect information of out-migrants within 5 years. In the 64th survey, where migrants first migrate out is not clear, but where those migrants currently live is provided. Thus, it is extremely difficult to compare the absolute number and migration rates on the same basis, yet it appears still useful to show those figures as good approximates to understanding the rough picture of current migration. Both estimates show that at least 1 out of 7 rural households have sent out male migrants somewhere, which is high propensity of out-migration, and it can be safely said that out-migration by males far exceeded that of females during the two periods.

Why do people migrate-out from rural areas? Graph 1 shows the reason of migration throughout those two periods by sex. The most dominant reasons for migration by males are related to employment, as around 40 percent of male migrants in the 49th survey and more than 50 percent of them in the 64th survey out-migrated for the reason of “In search of employment / better employment”. Also, around 25 to 30 percent of male out-migrants move for the reason of “Transfer of service / contract / take up employment” in those periods. Therefore, it can be concluded that most of out-migrants from rural areas are motivated by job-related reasons.

On the other hand, most of the reasons for female out-migration are marriage-related. This reflects the cultural background based on the Indian social system, where in-caste marriage and hypergamy are strongly preferred among Hindu families (Kato[2009][2010]).

Graph 1 Reason for migration by sex

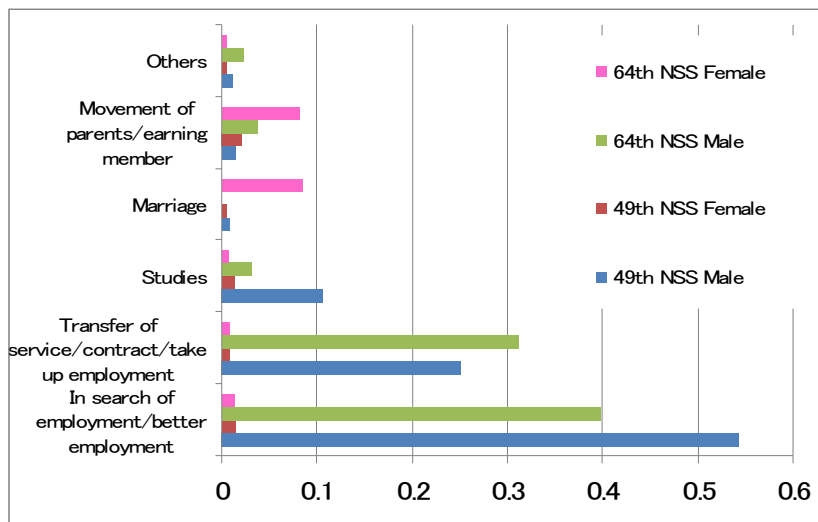


Table 2 shows the destinations of male out-migrants. Out-migration to outside states in India looks frequent for the rural household throughout these periods. As noted above, it is not easy to compare these two sets of data, but the increase in intra-state and overseas migration is observed in the estimated figures. This shows that rural people in India became more mobile in 2000s, by experiencing rapid growth in this period.

Table 2. Destination of Male Out-Migrants within 5 years: within India or overseas?

Destination of Male Migration Rates from rural India: within 5 years			
1993 (49thNSS)		2007-08 (64th NSS)	
Estimated rate		Estimated rate	
Overseas	0.006	Overseas	0.044
Intra-state	0.043	Intra-state	0.080
(Within India)		(Within India)	
-		Within State	0.168
		(Intra-district)	

Estimation is based on the number of households. migration rates= household with male migrants / total rural households. The definition of “overseas” and “intra-state” differs in the 49th and 64th. In the 49th, overseas migrants are collected as “migrants gone overseas within 5 years and no information on their present residence”. On the other hand, in the 64th, overseas migrants are collected as “migrants gone somewhere within 5 years and their present residence is overseas”.

According to the 64th NSS, as it provides some information on out-migrants, it is estimated that 43.7 percent of persons who migrated for job-related reasons within the last 5 years have come back to their home because they currently reside in the same district of their state of origin (Table 3). This means that the job-related out-migration by males is characterized as quite a temporal one. Conversely, since female migration by marriage is usually not temporal in nature, more than half of them move to another district within their home state, as shown Table 3. Those very recent figures of higher rates of marriage-motivated female migration to “other district nearby” are still consistent with the tendency that has been argued in the notable research on marriage in rural India because of economic and cultural conditions which females would face in rural India (Rosenzweig and Stark [1989]).

Table 3. Estimated return-home rates: based on the present place of residence of people who migrated within the last 5 years (64th NSS)

	same district / same state	other district / same state
Male: for job-related reasons	0.437	0.271
Female: for marriage	0.187	0.512

2.2. Economic status of the rural household: households with out-migrants VS. households without out-migrants

The main concern of this comparative analysis on migrant households is whether there are differences in the economies of rural households, with out-migrants and households without. Consequently, the levels of Monthly Per Capita Expenditure (MPCE) as a key economic indicator of Indian rural households are compared between these two periods.

Table 4. Estimated Mean MPCE of Rural Households by Out-migration types: With or Without Remittances

Mean MPCE of rural households by out-migration types: with remittances and without remittances ⁱ

	49th NSS (Below MPCE 400Rs)				64th NSS (Below MPCE 1500Rs)						
	Domestic out-migrants		Overseas		No Out migrants		Domestic out-migrants		Overseas		No Out migrants
	With	No	With	No	With	No	With	No	With	No	
	Remittance	Remittance	Remittance	Remittance	Remittance	Remittance	Remittance	Remittance	Remittance	Remittance	
SC	185.4 (4.13)	197.4 (9.95)	242.3 (15.50)	202.1 (25.85)	187.2 (4.45)	715.6 (25.43)	735.2 (31.36)	789.6 (61.53)	653.8 (52.48)	650.8 (4.86)	
OBC	-	-	-	-	-	770.9 (19.62)	756.9 (21.31)	819.6 (31.10)	906.1 (37.58)	731.5 (3.77)	
Others	202.3 (2.94)	225.8 (5.35)	238.8 (5.53)	257.8 (10.25)	216.4 (3.19)	858 (22.09)	923.1 (23.26)	891.9 (47.82)	1006.4 (64.91)	868.3 (4.71)	

Standard deviation in brackets

Table 4 shows that the mean MPCE level of the rural households with remittances from out-migrants within India in the 49th survey is, again, apparently lower than the one without out-migrants, considering the standard deviations of approximately 13-22 percentage points. Nevertheless, in the 64th survey, for all social groups, the mean MPCE of the rural households **with remittances** from domestic out-migrants, are significantly higher than the mean of households without out-migrants (at a 1 % level of significance), by about 5-15 percentage points. In the 49th survey, it appear that remittances from out-migrants overseas, which incurs high-costs for migrating, only improved household consumption levels. At present, however, the consumption levels of domestic out-migrant households have remarkably improved even for SCs. Also, these figures imply possible income mobility and reversal of households' economic conditions in rural India, via migration and remittances, during the rapid economic growth period. This is not necessarily consistent with the idea of push migration by rural distress.

As discussed above, what has made a difference on the economic level for the rural households looks to be whether they received remittance or not in the recent years. Although data on the amount of remittances is not available in the 49th survey, the 64th survey included that its scope. The estimated average amount of remittances received by rural households by social classes is shown in Table 5, and the estimated average amount of remittances received by rural households close to poverty lines by social classes is shown in Table 6 below. Preliminary estimates of poverty line MPCE in rural India in 2007-08 is 461.84 Rs (Planning Commission). In order to consider the level of poorer households and the impact of the amount

of remittance received by rural poor households, estimated average MPCE levels below poverty lines is also shown in Table 7.

Table 5. Estimated average amount of yearly remittances by social classes: 64th NSS

	Average amount of remittances	Estimated standard deviations
SC	21197.27	330.87
OBC	20799.03	327.47
Others	25053.39	487.39

Table 6. Estimated average amount of yearly remittances by social classes below poverty lines: 64th NSS

	Average amount of remittances	Estimated standard deviations
SC	9766.12	687.09
OBC	12526.56	362.285

Table 7. Estimated average Monthly Per Capita Expenditure below poverty lines by social classes: With or Without Remittances, 64th NSS

	with remittances	without remittances
SC	374.90 (3.50)	376.81 (1.98)
OBC	386.94 (2.13)	385.78 (1.446)

Note: Estimated standard deviation is in brackets.

Estimated figures of remittances received indicate that average levels of remittances are high enough to cause a crucial difference between households with remittances and households without remittances, if they are below the poverty line. The average amount of received remittances to the SCs are lowest among all the social classes, which reflect their least celebrated social positions (Table 5). Looking into the very poor people below the poverty line, the estimated average amount of remittances for the SCs below poverty line do not show little decrease in spite of remittances for OBCs below poverty line going down to less than half of the average amount of remittances received by all OBCs (Table 5 and Table 6). Considering the level of poverty lines, this yearly amount of remittance around 120 thousand rupees, almost equivalent to 3 years' expenditure per person, is extremely huge and influential to rural poor households. This means that, for SCs, the main beneficiaries of remittances are very poor households as os naturally supposed (because

of their social classes), but on the contrary, for other types of social classes, mainly remittances are sent to relatively better-off rural households. However, estimated MPCEs of rural SC and OBC households below poverty lines do not show significant differences between ones with remittances and ones without remittances. Therefore, there is no clear evidence to deny the traditional argument that only “better-off poor” are mobile but the poorest will stay still unable to make up their shortage of income, as seen from the analysis on an all-India level.

2.3. Factors of receiving remittances by rural household over all major states

Discussed as above, remittances sent to the rural household look to have seriously affected to their economic level and remittance becomes very important income source as possible means to improve their living conditions. As seen so far, amount of remittances significantly differs by social classes in rural India, so it is naturally supposed that the household characteristics would be crucial factors for the amount and possibility of remittances received. This section tries to find relationship between some key household characteristics and remittances received by those households.

Supposing the model in which the amount of remittances is affected by household characteristics such as social classes, residential areas, mainly engaged work, the regression model and to be tested here is:

$$R_{ri} = \alpha Y_i + \beta D_i + \gamma_i$$

R_{ri} : yearly amount of remittances received by household i in rural areas

Y_i : realized monthly per capita consumption level of household i in rural areas

D_i : social and economic characteristics of household i in rural areas

Regression results using NSS 64th, which first ever provides the information on the amount of remittances, are shown in Table 8 and Table 9 over non rich households whose MPCE below 700 Rs, as the estimated mean MPCE level for the selected regions of major statesⁱⁱ is 778 Rs .

Table 8 Regression results on amount of remittances and household characteristics: poor households below 500 Rs MPCE

		coefficient	std errors	t-value	
MPCE		4.15	0.28	14.97	*
household size		-668.95	116.20	-5.76	*
land dummy	Landless (less than 0.05ha)	1181.55	344.67	3.43	*
religion dummy	non-Hindu	-1058.28	344.76	-3.07	*
Dowry dummy	remittances used for Dowry	2162.21	570.15	3.79	*
house dummy	remittances used for house / estate	1376.73	449.51	3.06	*
savings dummy	remittances used for savings / investment	4576.90	595.05	7.69	*
social dummy	SC	660.44	359.84	1.84	*
("Others" as base estimation)	OBC	2232.98	314.04	7.11	*
regional dummy	South	3096.58	472.25	6.56	*
(Central and West regions* as base estimation)	East	1386.08	428.01	3.24	*
	North	1548.37	443.01	3.5	*
household type dummy	agricultural labourer	1623.66	412.67	3.93	*
(self-employed in non-agriculture base as base estimation)	other labourer	1059.28	556.93	1.9	*
	self-employed in agriculture	2200.89	406.53	5.41	*
	others	8579.81	448.88	19.11	*
const.		-1983.02	723.67	-2.74	*

R²=0.15, sample no=7843

* Madhya Pradesh and Gujarat as "Central and West", Andhra Pradesh, Karnataka, and Tamil Nadu as "South", Bihar, Orissa, and West Bengal as "East", Haryana, Punjab, Rajasthan, and Uttar Pradesh as "North"

Table 9 Regression results on amount of remittances and household characteristics: households from 500 Rs to 700Rs MPCE

		coefficient	std errors	t-value	
MPCE		7.62	0.57	13.48	*
household size		-3718.16	472.24	-7.87	*
land dummy	Landless (less than 0.05ha)	3108.82	797.40	3.9	*
religion dummy	non-Hindu	-7511.54	667.37	-11.26	*
Dowry dummy	remittances used for Dowry	5099.77	1180.26	4.32	*
house dummy	remittances used for house / estate	9807.31	800.36	12.25	*
savings dummy	remittances used for savings / investment	15173.50	894.55	16.96	*
social dummy	SC	382.99	679.11	0.56	
("Others" as base estimation)	OBC	-108.14	541.33	-0.2	
regional dummy	South	7677.97	867.92	8.85	*
(Central and West regions* as base estimation)	East	4475.40	878.23	5.1	*
	North	8791.90	847.73	10.37	*
household type dummy	agricultural labourer	-2894.02	930.07	-3.11	*
(self-employed in non-agriculture base as base estimation)	other labourer	-2047.75	1274.49	-1.61	*
	self-employed in agriculture	-1797.67	793.70	-2.26	*
	others	8240.35	832.86	9.89	*
const.		2533.64	1357.63	1.87	*

R²=0.19, sample no=10083

Both of the regression results show that the higher amount of remittances received by landless and remittance is positively correlated to the consumption level among poorer households, so the remittance from outside could help rural households without productive asset. However, there is notable difference between relatively poor, 500 to 700Rs MPCE, and very poor below 500 Rs, almost below poverty line. Among the very poor households, below poverty lines, both of SCs and OBCs receive more remittances than non-backward households and the amount of remittances for the agricultural labourer households is higher than self-employed in agriculture. As discussed later, the agricultural labour households are usually landless and the poorest types of households, and SCs and landless are supposed to be the poorest in the society. Those results indicate that severity of economic and social backwardness of household characteristics looks highly correlated to the received remittances, and thus work as push factors of out-migration. This logic clearly follows the argument of "push migration". While there is some evidence of "pull factor" as the economic levels of backward households improved, this analysis support "push factor" much strongly affected to determine out-migration followed by remittances to rural poor home.

3. Out-migration from the poorest states in India - Bihar: Migration and Remittance by SCs and other Social Backward Classes

3.1. Background of Bihar

As mentioned above, the main stream of frequent out-migration is initiated by males who are motivated by employment and job-related reasons, and most of them make remittances to their rural home to come back in a short period. The increase in household consumption levels from 1993 to 2007-08 suggests that out-migration may have helped social backwards' economic levels in rural India. Even the analysis above provides the evidence that poorest and much more depressed social and economic classes in rural areas have become better-off via increased mobility and receiving huge remittance. Therefore, this paper tries to focus on the "poorest of the economically poorest areas", SCs in Bihar.

Recently, Bihar has become known as the "fastest growth state" in India as Bihar hit remarkable growth in Gross State Domestic Product at 11.44 percent in 2008, and this is the second time to record over 11 percent growth since Nitish Kumar was appointed as Chief Minister of the state in 2005. Such rapid growth is owed to the growth in the construction oriented secondary sector, exceeding 11 percent growth, under Nitish Kumar's initiatives (Nagaraj and Rahman [2011]). However, the economic level is still lowest among all major states, as shown in Table 10, due to its long history of economic backwardness.

Table 10. Gross State Domestic Product by states in 2007-08

2007-2008 Per capita net state domestic product at factor cost – state wise (current prices)														
Andhra	Bihar	Gujarat	Haryana	Karnataka	Kerala	Maharashtra	Orissa	Punjab	Rajasthan	Tamil Nadu	Uttar Pradesh	West Bengal	Delhi	All India
40902	11074	45773	59008	36266	43104	47051	26654	46686	23986	40757	32884	32065	78690	33283

Source: Economic Survey [2010]

Such backwardness in the economy of Bihar is hugely attributed to the low productivity in rural areas. In rural Bihar, whose population constitutes about 90% of the whole state, it is estimated that about 20 % of the total rural population is SCs (20.1% in the 49th survey and 23.7% in the 64th survey) 56.4% is other backward classes, and pure "other" households are only 17.7 %, according to the estimation based on the 64th. The rest of the population is classified as "Scheduled Tribe". Thus, the main composition of the population in Bihar is socially and economically backwards, and this is part of the reason why Bihar has been known as the "poorest state" in India. Backwardness in social classes is strongly related to the occupations in rural Bihar, as well. Around (more than) 60 percent of SC households are categorized as "agricultural labour" without owning land for cultivation in both of the survey periods, (the 49th and 64th

NSS). Incidentally, the Planning Commission of India reports as an official figure that poverty incidence (population below the poverty line) of SCs in 1999-2000 is almost 60 percent. By applying the preliminary all-India poverty line MPCE of 461.84Rs onto the 64th survey data, it is estimated that 52.4 percent of agricultural labour SC households' MPCE level is below that line, and, SC households show the highest poverty incidence in all types of rural households in Bihar. Using the same poverty criteria on the 64th data set, 49 percent of all SCs, 30 percent of all OBCs, and 19 percent of all "Others" live below that MPCE line.

Table 11. Estimated rates of population below the poverty line of 461.81 Rs in 2007-08: by household type and social classes in rural Bihar

	agricultural labour	self –employed in agriculture	self –employed in non–agriculture
SCs	0.5242	0.3766	0.4323
OBCs	0.4165	0.2184	0.2737
Others	0.4683	0.1269	0.1792

Those arguments above, however, are based on the findings of all-India level investigation. Then, what happens in more economically backward areas? In this section, considering such regional difference, it is aimed to measure the changes of the implications of migration and remittances to the most backward people in the least economically developed area, rural Bihar, by comparing the data obtained from the two NSS round in 1993 and 2007-08 as above. In addition to the argument in the section 1 of this paper, some journalistic sources revealed that after Nitish Kumar's appointment in 2005, there has been growth of out-migration by SCs, who were unable to find jobs other than as agricultural labourers or highly discriminated jobs such as cleaners (*Livemint* [2010]). According to the research initiated by the Indian Institute of Public Administration [2010], they have found that more and more people from Bihar are migrating out all over India to find short-terms job to earn extra money, and also have found that money sent home as remittance is mostly spent for consumption and seldom saved, as based on the survey of 150 rural households in Bihar in 2010. It looks that there has been a coincidence of the benchmark years of economic growth and the increase in migration in Bihar – welcoming Nitish Kumar's appointment and economic growth in the area. If such domestic out-migration by socially and economically backward classes has been encouraged by recent economic development, migration affected by economic growth not only worsens inequality but also could help the realization of self-empowerment for the least celebrated in India via increased mobilization of rural populations to outside areas.

Figures calculated by those NSS periods used in this paper also support the out-migration-prone character of rural Bihar. Estimated out-migration rates to domestic destinations is 12.2 percent in 1993 and 15.7

percent in 2007-08, whose figures both exceed the average rate of migration rates of All-India (Table 12).

Table 12. Estimated out-migration rates for rural SCs: Bihar and All-India Comparison

	49 th		64 th	
	Bihar	All-India	Bihar	All-India
outside the state, within India	0.1223	0.0358	0.1572	0.1

3.2. Migrant households and Non-Migrant households by social classes in rural Bihar

Based on the special regional background of rural Bihar, this section tries to specify the changes of economic conditions by social strata by using these two sets of NSS data from the 49th and 64th surveys. In order to provide the simple pictures of changes between those two period, first, the average levels of MPCE are estimated by social strata and occupation-related household types in Bihar and All-India. Secondly, deducting the MPCE levels of the households which receive remittances made by out-migrants within India from ones without out-migrants in each period. The difference in MPCE between households with remittances and non-migrant households obtained should be compared by social classes and household types, both in Bihar and All-India. It should be noted that the figures displayed here are not deflated by prices and thus it is not possible to compare the crude numbers in those different periods.

Table 13 Rural Estimated Mean MPCE by social group and household types: Bihar VS. India

Rural Household with "within India" out-migrant (A)												
	49 th				64 th							
	Bihar		India		Bihar		India		Bihar		India	
	SC	SC	Non SC/ST	Non SC/ST	SC	SC	OBCs	OBCs	Non ST /SC/OBC	Non ST/ SC/OBC		
Self employed in non agriculture	118 (15.4)	182.9 (10.86)	148.6 (17.24)	231.8 (10.55)	497.1 (36.32)	678.8 (20.28)	655.3 (22.45)	788.2 (25.94)	802.2 (67.05)	920.1 (31.31)		
Agricultural labour	148.9 (8.89)	175.3 (5.52)	184.8 (8.14)	200.9 (5.10)	532.99 (15.60)	589.2 (12.17)	514.7 (9.56)	572.4 (9.75)	514.7 (50.18)	644.9 (27.30)		
Other labour	178 (13.87)	218.1 (13.63)	252 (21.72)	278.7 (13.66)	614.3 (33.67)	656.5 (27.38)	512.5 (25.80)	726.1 (40.23)	396.5 (28.45)	764.8 (55.38)		
Self employed in agriculture	176.89 (11.3)	214.2 (10.01)	200.6 (6.77)	232.6 (3.59)	523.7 (24.73)	656.6 (13.44)	610.5 (12.27)	740.5 (10.29)	787.8 (27.26)	998.6 (26.17)		
Others	197.9 (17.7)	214 (9.13)	186.8 (9.21)	235.6 (6.45)	537.2 (22.81)	741.3 (20.66)	642.6 (18.11)	869.2 (27.90)	711.6 (34.35)	1172.7 (53.08)		

Rural Household without out-migrants (B)												
	49 th				64 th							
	Bihar		India		Bihar		India		Bihar		India	
	SC	SC	Non SC/ST	Non SC/ST	SC	SC	OBCs	OBCs	Non ST /SC/OBC	Non ST/ SC/OBC		
Self employed in non agriculture	144.3 (9.3)	200.7 (3.53)	203.7 (12.97)	234.5 (2.88)	507 (19.38)	624 (10.53)	561.9 (9.27)	714.4 (9.86)	636.2 (29.38)	821.7 (14.76)		
Agricultural labour	148.6 (4.53)	184.5 (1.85)	170.9 (3.62)	201.6 (2.10)	463.5 (7.41)	548.9 (4.73)	498.8 (11.15)	573.9 (4.36)	487.1 (27.56)	589.6 (7.80)		
Other labour	197.5 (8.2)	226.4 (4.70)	212.4 (7.30)	281.6 (3.96)	432.6 (14.59)	620.2 (8.47)	498.8 (11.15)	688.9 (10.41)	547.2 (35.77)	798.2 (19.67)		
Self employed in agriculture	177 (8.05)	203 (2.42)	208.9 (7.54)	238.4 (1.59)	558.3 (23.18)	657.3 (12.28)	625.3 (10.16)	696.9 (5.25)	658.7 (13.92)	828.2 (9.10)		
Others	142.2 (9.08)	206.9 (4.61)	185.9 (17.04)	246.8 (4.07)	536.9 (39.61)	810.1 (28.24)	610.5 (24.06)	1204.3 (121.95)	742 (43.79)	1486.8 (125.61)		

*Standard deviation in brackets

Table 14 Differences in the rural estimated mean MPCE of the households with out-migrants / without out-migrants: Bihar VS. India

(A)-(B)										
	49 th				64 th					
	Bihar	All India	Bihar	All India	Bihar	All India	Bihar	All India	Bihar	All India
	SC	SC	Non SC/ST	Non SC/ST	SC	SC	OBCs	OBCs	Non ST /SC/OBC	Non ST SC/OBC
Self employed in non agriculture	-26.3	-17.8	-55.1	-2.7	-9.9	54.8	93.4	73.8	166	98.4
Agricultural labour	0.3	-9.2	13.9	-0.7	69.49	40.3	15.9	-1.5	27.6	55.3
Other labour	-19.5	-8.3	39.6	-2.9	181.7	36.3	13.7	37.2	-150.7	-33.4
Self employed in agriculture	-0.11	11.2	-8.3	-5.8	-34.6	-0.7	-14.8	43.6	129.1	170.4
Others	55.7	7.1	0.9	-11.2	0.3	-68.8	32.1	-335.1	-30.4	-314.1

According to the estimates in Table 13, the levels of the mean MPCE for the all social groups and household types are considerably lower in Bihar than in the rest of India. Moreover, the degree of the differences in MPCE between Bihar and India widens for all types of households, from 1993 to 2007-08. Thus, there are growing economic gaps between Bihar and outside Bihar in recent years.

Table 14 shows the differences in the mean MPCE between the households with out-migrants (A) and ones without out-migrants (B). As for SC, there are no significant differences in MPCE in the categories in agricultural labour and self-employment in the 49th survey, even if standard deviation is considered.

Nevertheless, on the other hand, the estimates in the 64th survey provide a completely different picture: the value of (A)-(B) for the SC households engaged in agricultural labour in Bihar is positively large. This means that the economic situation of SC households which sent out migrants to within India is far better-off compared to the SC agricultural labour households without out-migrants in Bihar. A similar tendency is common for both of the SC and other backward classes in the category of any labour households - MPCE levels with migrants are significantly higher than those without migrants in the 64th survey. In the 64th survey, while even for "other" households (non-backward or non-STs) the average levels of MPCE with out-migrants are relatively higher than non-migrant households. The difference in MPCE, (A)-(B), is biggest for the self-employed in agriculture and also is the largest of all types of households and social classes. The MPCE level of the household group whose combination is "other households" and "self-employed in agriculture" is the richest of all groups in rural Bihar, so, migration looks to have helped not only socially and economically backward groups but also the richest groups.

In order to measure the effect of remittances, similar analysis is employed for the average MPCE levels of households with remittance from out-migrants and ones without out-migrants.

Table 15 Differences in estimated mean MPCE of the households with remittances / without out-migrants: Bihar VS India

Rural Household with remittances from "within India" out-migrants (C)										
	49 th				64 th					
	Bihar	India	Bihar	India	Bihar	India	Bihar	India	Bihar	India
	SC	SC	Non SC/ST	Non SC/ST	SC	SC	OBCs	OBCs	Non ST /SC/OBC	Non ST SC/OBC
Self employed in non agriculture	113.1 (17.33)	177.6 (12.88)	134.1 (19.18)	223.8 (14.62)	484.9 (44.63)	650.52 (28.24)	665.2 (30.60)	715.2 (28.54)	734 (62.33)	850.3 (29.15)
Agricultural labour	146.3 (5.02)	168.4 (4.58)	185 (8.97)	198.2 (6.00)	555 (17.87)	583.2 (14.61)	519.2 (10.82)	560.8 (11.08)	528.3 (60.40)	609.5 (24.01)
Other labour	185.3 (17.23)	213.9 (14.45)	221.7 (14.86)	244.6 (11.70)	620.6 (47.64)	573.7 (28.63)	536.1 (36.83)	682.8 (40.00)	399.3 (35.11)	683.8 (49.57)
Self employed in agriculture	170.6 (9.82)	208 (13.63)	192.8 (8.27)	220.7 (3.80)	509 (28.14)	628.3 (17.3)	595.1 (14.36)	711.9 (12.65)	702.7 (25.21)	904.9 (24.14)
Others	195.5 (19.21)	213.4 (9.96)	181.6 (9.68)	229.6 (7.12)	526.8 (26.16)	651 (16.91)	599.4 (16.64)	784.9 (28.51)	703.4 (36.44)	1060.4 (61.60)
(C) – (B)										
	49 th				64 th					
	Bihar	India	Bihar	India	Bihar	India	Bihar	India	Bihar	India
	SC	SC	Non SC/ST	Non SC/ST	SC	SC	OBCs	OBCs	Non ST /SC/OBC	Non ST SC/OBC
Self employed in non agriculture	-31.2	-23.1	-69.6	-10.7	-22.1	26.52	103.3	0.8	97.8	28.6
Agricultural labour	-2.3	-16.1	14.1	-3.4	91.5	34.3	20.4	-13.1	41.2	19.9
Other labour	-12.2	-12.5	9.3	-37	188	-46.5	37.3	-6.1	-147.9	-114.4
Self employed in agriculture	-6.4	5	-16.1	-17.7	-49.3	-29	-30.2	15	44	76.7
Others	53.3	6.5	-4.3	-17.2	-10.1	-159.1	-11.1	-419.4	-38.6	-426.4

Table 15 provides the differences in the estimated mean MPCE of the households which receive remittances from out-migrants(C) and ones from which no out-migrants are sent out (B). By the estimates

in the 49th survey, unlike the value of (A)-(B), the value of (C)-(B) is significantly negative for most of the social groups and household types (at 1% of significance). These mean that the remittance-receiving households are worse off than ones without out-migrants and also that the initial economic conditions for the households that sent out-migrants out are at considerably low levels. Thus, in the 1990s, the economic level of out-migrant households is so low compared to other households that it can be interpreted as evidence of “push-factor” for the poorer populations to be pushed-out from the rural areas of Bihar.

Contrary to these findings from the estimations based on the 49th survey, in the 64th survey, the value of (C)-(B) for SC agricultural households is far higher than the values for the other types of households, and also, much higher than (A)-(B) for the same category of the household, SC agricultural labour. Therefore, in 2007-08, the average economic level of **the most backward social group, SC agricultural households**, is remarkably improved by remittances, unlike in 1993. Moreover, remittances look to have contributed to the improvement of these household’ consumption level, as compared to the mean MPCE levels of the SC households that just sent out-migrants out, and similar situations, in 2007-08. Such tendency has never been found by the data obtained in 1993. Also, the differences in economies between rural Bihar and other regions outside are still large enough in 2007-08 to support rural distress in Bihar, but the idea of pure forms of push migration is not enough to give reasonable explanation since there is evidence that the out-migrant SC household is getting especially richer in recent years.

Unlike the 49th survey data, information on the amount of remittances is disclosed in the 64th survey and the amount of average remittances for the poor households in rural Bihar are estimated in Table 16. Obviously, the worst-off group is SC agricultural labour households without remittances, as the estimated mean MPCE level shows. However, the MPCE of rural agricultural SC below the poverty line, naturally supposed to be the poorest, with remittances and recent out-migrants is higher than those without remittances (at a 10% level of significance). As for other social classes, OBCs and Others, below the poverty line, estimated MPCE shows a rather higher value for the households without remittance than households with remittances, a despite significance level that is very low. Moreover, the mean amount of remittance that is received by SC households is extremely high, taking account of their level of MPCE for poor families. Recalling the result of an all-India level, as shown in Table 7, Bihar’s clear tendency, which suggest that very poor SC households with remittances are becoming better-off than those without remittances, is never observed from all-Indian data. In addition, the estimates which are calculated in the same way as Table 7 brings much clearer evidence of differences in economic conditions for the social backward classes in rural Bihar from remittances (Appendix Table 3), since the poor backwards with remittances in Bihar are significantly better off than no-remittance households, while poor “Others”, not socially backwards, are even worse off in they receive remittances.

Thus, it is concluded that rural SCs could benefit from out-migration most of all the social classes in Bihar because of improved mobility in the recent years. However, it does not necessarily mean those SCs are gaining wealth of it, as most of the remittance is used to make up the expense on the food purchases – 80 percent of SC rural households reply that the first reason to use remittance is for food items and no SC households regard education and savings as the primary use of remittances (Appendix Table 4). Therefore, remittances following out-migration for the SC households in Bihar look to play an important role as a means of poverty alleviation or as a means of easing their income liquidation, by allowing them to consume more food.

Table 16. Estimated amount of average MPCE and remittances received by rural households which sent out any migrant in the last 5 years in Bihar in 365 days in 2007-08: below poverty line*

		Estimated MPCE	Estimated average amount of yearly remittances received	F-value * (difference between without remittance and with remittance)*	Sample household numbers
SC	Agricultural labour	370.01	7345.77	2.7	208
	with remittances	(7.16)	(460.48)	(10.10%)	
SC	Agricultural labour	346.52	–		69
	without remittances	(12.36)	–		
OBC	Agricultural labour	360.46	7958.36	1.8	239
	with remittances	(5.94)	(428.16)	(18.02%)	
OBC	Agricultural labour	371.8	–		109
	without remittances	(6.00)	–		
Others	All households***	381.79	11491.8	0.5	128
	with remittances	(10.08)	(940.26)	(47.88%)	
Others	All households	394.74	–		36
	without remittances	(15.22)	–		

* Using the national rural poverty line of 461.84Rs in 2007-08

** Estimated significance of the difference in brackets.

*** “Others” in agricultural labour and the sample size is too small.

In former studies, it has been thought that remittances to the rural poor households are not enough to improve their living conditions (Lipton [1977]) and very poor households cannot afford to migrate out from rural areas because only richer and relatively well-off poorer households looked at are most likely to move out from rural areas (Kato [2009][2010]). However, contradictory results which indicate that much worse rural households, and even the most backward social/economic classes are mobile enough to be able to

earn outside income in order to make remittance, have obtained from these recent estimates using the data of Bihar in 2007-08 in this paper. In addition, economic and social backwardness is strongly correlated with the amount of remittance received shown in the section 4. Bihar's case shows clear evidence that social classes like rural agricultural labour SCs, who are naturally regarded the poorest in the society, now look not only mobile, but also have even made up their consumption expenses with remittances by sending migrants outside.

3.3. Remittances, household characteristics, and migrant's profile for the poor in Bihar: analysis

This section tries to examine the factors and determinants of remittances by considering the characteristics of rural poor migrant's household and male migrant's personal profile in Bihar. Assuming the model where amount of remittances made by a male migrant¹ is affected by household and his personal profiles,

$$R_{ij} = \alpha Y_i + \beta D_j + \delta P_j + \gamma_{ij}$$

R_{ij} : yearly amount of remittances made by male migrant j and sent to household i of his origin

Y_j : realized monthly per capita consumption level of household i of migrant j 's origin in rural areas

D_i : social and economic characteristics of household i in rural areas of migrant j 's origin

P_{ij} : personal characteristics of migrant j

Education levels are good indicators of human capital accumulation, so here educational levels are indexed to obtain proxy of average level of household education: not literate=1, literate below primary school=2, primary to middle school=3, secondary school=4, higher secondary=5, above diploma=7.

¹ See Appendix Table 5. Sex ratio of out-migrants who make remittances is 96 to 97 percent is male.

Table 17. Regression analysis on amount of remittances, household characteristics, and migrant's profile for the poor in Bihar: below 400Rs MPCE, 64th NSS

		coefficients	std errors	t-value	
MPCE		19.12	4.40	2.17	*
average level of household education		-1146.03	493.12	-2.32	*
migrant's education		-45.27	245.88	-0.18	
marital status dummy (estimation base=single)	currently married	-678.78	417.22	-1.63	
migrant's generation	20s	2024.54	734.87	2.75	*
(estimation base=10s)	30s	6385.81	725.29	8.8	*
	40s	6080.82	826.87	7.35	*
social class dummy	SCs	-4346.47	860.01	-5.05	*
(estimation base="others")	OBCs	-3362.59	803.06	-4.19	*
household land holdings dummy	less than 0.01ha	209.68	479.98	0.44	
agricultural labour dummy	agricultural labour	-2534.76	450.78	-5.62	*
household size		53.16	91.30	0.58	
Hindu dummy (estimation base=non Hindu)	Hindu	19.12	4.40	4.34	*
const		-146.56	612.04	-0.24	

R² = 0.2684, sample =704

Table 18. Logit analysis on making remittances (=1), household characteristics, and migrant's profile for the poor in Bihar: below 400 Rs MPCE, 64th NSS

		coefficients	std errors	t-value	
MPCE		0.00	0.00	1.87	*
average level of household education		-0.96	0.13	-7.59	*
migrant's education		0.02	0.06	0.35	
marital status dummy (estimation base=single)	currently married	-0.15	0.10	-1.41	
migrant's generation	20s	0.29	0.16	1.79	*
(estimation base=10s)	30s	1.06	0.17	6.17	*
	40s	1.59	0.22	7.23	*
social class dummy	SCs	-0.11	0.22	-0.49	
(estimation base="others")	OBCs	-0.19	0.20	-0.95	
Household land holdings dummy	less than 0.01ha	-0.66	0.12	-5.41	*
agricultural labour dummy	agricultural labour	-0.19	0.11	-1.69	
household size		-0.08	0.02	-3.76	*
Hindu dummy (estimation base=non Hindu)	Hindu	-0.93	0.18	-5.3	*
const		1.60	0.50	3.2	*

R² = 0.1000, sample =1888

Besides the regression analysis of the amount of remittances received, logit analysis on making remittances (making remittances=1) by male migrants is also examined, in order to capture possibilities of making remittances by social classes (Table 17 and Table 18). The latter table shows that there is no significant difference in possibilities of making remittances by social classes among very poor households. Also, household type as agricultural labour household does not affect the possibilities. On the other hand, the former table shows amount of remittances significantly declines most if the migrant is SC and from agricultural labour households. However, for both of the estimation, possibilities of making remittances and amount of remittances, migrant's educational level does not affect them at all and even the average education level of the household of his origin shows negative effects on them – indicating less remittances sent to more educated families and less possibilities for the educated families to receive remittances from out-migrants. Households which have lower human and physical capital, logically worse off group, are remitting more so human capital accumulation is not important for them to earn outside, but the SC out-migrants appear to make considerable lower remittances compared to others while the possibilities of remitting is indifferent among all the social groups. Therefore, these results should be interpreted by the context of social and cultural perspectives that migrants from the backward households could face poorer conditions of even outside jobs due to social discrimination.

4. Conclusion

This paper aimed to measure the changes of the role of migration and remittances for the rural poor households, particularly focusing on SCs and social backwards in India-wide and Bihar, in the recent economic growth from the 1990s to 2000s. It was found that there have been significant increases in opportunities for the least socially and economically celebrated in rural areas, such as SCs and other social backwards, as there is evidence that they became more mobile to migrated out to earn more outside of their natal place, between 1993 to 2007-08. While out-migrants to overseas only came from these well-off among the out-migrant households in the 1990s, recent figures obtained by 2007-08 NSS data have shown that within India, out-migrant households for all social classes even from the very poor families show remarkable improvement in terms of economic conditions. This could reflect that current Indian economic growth eased mobility of all kinds of people in rural areas, and this could support some aspects of pro-poor growth of India recently. Furthermore, increased opportunities of migration and remittance in 2007-8 seem to have contributed to improve consumption levels of rural SC households most of all the social groups. However, at the same time, these increased needs of domestic mobility and remittances imply that regional economic disparities are rising within a country, because people would not move unless they think there is considerable difference in expected wage outside and realized wage at home, as the classical theories of Lewis and Todaro predict.

As for the argument on “rural distress” which pushes people out to economically better-off areas, this argument still looks applicable. However, it does not necessarily connote negative aspects, as the economic conditions of SCs and other social backwards significantly improved by increased mobilization. Also the evidence from Bihar’s case is - that SC agricultural labour households in Bihar, who are considered to be one of the poorest social strata because of social discrimination, are the group that benefited most from by the increased mobility and receiving remittances in 2007-08. Although mobility for the backward classes look to be confined yet, more remittances sent by those migrants could play a role to give possible empowerment to the SCs in rural Bihar, as the amount of remittances are considerably large enough to support considerable part of their household consumption. This could reflect the importance of “getting out of Bihar” as very important for those social backwards. In future, going outside Bihar by social backward classes may potentially affect the rigid social structure of rural Bihar. It should be noted that the growing economic gaps between Bihar and other parts of India in these times of rapid economic growth might be crucial to increase mobility and remittances of SCs, since the backwardness of Bihar’s economic conditions gives strength to provide relative cheap labour to all parts of India and, of all labour.

While this analysis has limitation lacking price factors between different regions by applying appropriate deflators, this paper has shown a rough picture of the role of out migration and remittance for the economically and sociologically backward households in rural India and Bihar. It cannot be denied that remittances and rural out-migration could contribute as a means of “inclusive growth” or positive paths of distribution of economic growth in the era of globalization for the social backward like Dalits in Indian society.

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Appendix

Appendix Table 1. Estimated composition of the population by social classes in rural Bihar

	49th (1993)	64th (2007-08)
ST	0.089	0.022
SC	0.201	0.237
Other Backward	–	0.564
Non ST/SC	0.710	0.177
Total Population of the state	64531000*	82999000**
Rural / Urban Ratio	89.59	89.53

*1991 Census, ** 2001 Census

Source: Kato [2011]

Appendix Table 2 Estimated composition of household types by social classes in rural Bihar

	49 th		64 th		
	SC	Non SC/ST	SC	Other Backward	Non SC/ST
self-employed in non-agriculture	0.085	0.112	0.102	0.188	0.141
agricultural labour	0.604	0.272	0.606	0.152	0.020
other labour	0.081	0.098	0.055	0.055	0.043
self-employed in agriculture	0.127	0.419	0.127	0.486	0.648
Others	0.104	0.100	0.110	0.120	0.148
Total	1.000	1.000	1.000	1.000	1.000

Appendix Table 3 Estimated amount of average MPCE and remittances received by rural households in Bihar in 365 days in 2007-08: below poverty line

	Estimated MPCE	Estimated average amount of yearly remittances received	F-value * (difference between without remittance and with remittance)*	Sample household numbers	
SC	All households with remittances	378.04 (4.66)	9988.95	6.4 (0.01%)	338
SC	All households without remittances	363.54 (3.35)	–	–	634
OBC	All households with remittances	386.15 (2.79)	14548.7 (740.99)	8.02 (0.00%)	1156
OBC	All households without remittances	375.91 (2.31)	–	–	704
Others	All households with remittances	381.79 (10.03)	11491.8 (940.26)	1.34 (24.88%)	128
Others	All households without remittances	367.86 (6.69)			546

Appendix Table 4 The “first reason” for use of remittances in rural Bihar: by social classes

	SCs	OBCs	Others
for household consumer expenditure: on food items	0.799	0.689	0.534
education of household members	–	0.004	0.005
household durables	0.003	0.003	0.018
marriage and other ceremonies – 04	0.018	0.023	0.058
health care	0.031	0.078	0.083
others items of household consumer expenditure	0.084	0.112	0.137
for improving housing condition (major repairs, purchase of land and buildings, etc.)	0.018	0.043	0.040
debt repayment– 08	0.003	0.007	0.011
financing working capital	0.002	0.003	–
initiating new entrepreneurial activity	–	0.000	0.001
saving/investment	–	0.002	0.013
others	0.043	0.036	0.102
sample households	1026	2892	950

**Appendix Table 5 Estimated ratio of making remittances by out-migrant out within 5 years by sex:
64th NSS, within 365 days**

	Male	Female
All India	0.9579	0.0421
Bihar	0.9679	0.0321

i Each of the figures is estimated by multipliers.

ii Here, major states are Madhya Pradesh, Gujarat, Andhra Pradesh, Karnataka, Tamil Nadu , Bihar, Orissa, West Bengal, Haryana, Punjab, Rajasthan, and Uttar Pradesh.