



MIGRATION, SCIENTIFIC DIASPORAS AND DEVELOPMENT : IMPACT OF SKILLED RETURN MIGRATION ON DEVELOPMENT IN INDIA

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Migration, Scientific Diasporas and Development: Impact of Skilled Return Migration on Development in India

Final Research Report

Prepared jointly by:

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1. Background and Objectives

1.1 The “Migration, Scientific Diasporas and Development” project

Over the past few years, the increase in international migration and its complexity have intensified the interest that researchers and policy makers have shown in minimizing the negative effects and maximizing the positive effects of migration. With the discourse on skilled migration shifting from the view that it is an obstacle to development to viewing it as a development leverage (Khadria, 1999, de Haas, 2010), recent research provides evidence of the possible benefits of skilled migration in the form of the transfer of skills and knowledge through diaspora networks, business and entrepreneurial investments, and eventual return to the home country.

Given the strong links between return migration and development and the increasing number of migrants heading back to their home countries, the return phenomenon has gained momentum in recent years, with studies showing a variety of interpretations of this issue. However, the empirical evidence does not support the benefits of return migration in a systematic manner, and there is still a shortage of conclusive studies of the specific conditions that facilitate a positive impact. Cassarino (2004) argues that until and unless we critically analyse the phenomenon of return migration, the relationship between migration and development will remain an ambiguous one. Various theories and types of return flows have been proposed in migration research to show that return migration is far from being free of complexities (Cassarino, 2004; Black et al., 2003; Constant and Massey, 2002; King, 2000; Khadria, 1999; Stark, 1991; Gmelch, 1980; Laumann et al., 1978; Bovenkerk, 1974; Cerase, 1974).

The study of diasporas has also garnered attention within the migration and development nexus in recent years, with scholars examining the linkages between migrants and their real or imaginary homeland, for the cause of socio-economic advancement in those countries (Meyer, 2001; Tejada and Bolay, 2010). Different diaspora groups have attracted interest because of their ever-increasing global presence and their growing influence in negotiations at a national and international level. This is especially true for the Indian diaspora - the third largest after the British and the Chinese in terms of size and spread. Due to its development potential, the Indian diaspora has emerged as a strong strategic partner for the government to engage with (Kapur, 2003; Kapur, 2010; MOIA, 2012). Although members of the diaspora may not be physically present in their home country in the way return migrants are, nonetheless they can also provide benefits through their accumulated knowledge, skills and financial capital, and through networks established in the host countries (Khadria, 1999; Saxenian, 2006; Yingqi and Balasubramanyam, 2006; Brinkerhoff, 2008; Faist, 2008; Tejada, 2012). Indeed, recent studies on diasporas argue that in addition to physical return, there are other crucial channels, such as remittances and financial investments, work related knowledge transfer and the transfer of social capital, through which highly skilled people can have a positive impact in their home country (de Haas, 2006; Lowell and Gerova, 2004; Saxenian, 2006).

Host countries can make a contribution to shaping enabling environments in the form of policies, bilateral cooperation agreements and further institutional and structural settings that can enhance the transnational activities of skilled migrants in their home country (Tejada et al., forthcoming). Continental European countries, which were hardly present on the destination map of Indian mobile professionals until quite recently, are faced with questions about how to attract and retain foreign talent while stepping up their cooperation with developing countries. With the official discourse claiming that attracting foreign talent should not be at the cost of a brain drain for the countries of origin, these destination countries represent a good case for studying the contemporary links between skilled migration and development.

The contemporary discourse on migration and development is starting to consider the agency role of both diaspora communities and highly skilled returnees on equal terms, and we can observe how several countries of origin have been introducing special measures both to engage with their diaspora and to attract their highly skilled personnel back home. However, at an academic level very few approaches have focussed their attention on the role that highly skilled returnees and diaspora communities play in home country development in one single study. Our research into Indian skilled migration and return aims to fill this gap by offering an empirical investigation of these two components. While India is seen as a country that has benefitted from reverse flows of investments and the world's highest remittances and expertise partly acquired abroad, it lacks a comprehensive understanding of the various hindrances and drivers that influence the process of transferring the accumulated knowledge and resources of skilled Indians in destination countries and skilled migrants who return to the home country.

The international research project “Migration, scientific diasporas and development: Impact of skilled return migration on development in India” sought to expand the knowledge-base on skilled return migration and its impact, and to explore strategies to leverage the potential of scientific diasporas. Taking the example of Indian skilled migration, the study offers an evidence-based analysis that shows the effects that both return and diaspora transnationalism have on home country development. The study draws

on data collected simultaneously in the host and home countries between 2011 and 2012. On the one hand, it examined skilled Indians in four European destination countries (France, Germany, The Netherlands and Switzerland) while on the other, it studied skilled Indian returnees in India. Using the framework of diaspora contributions as well as the return channels to study the impact on India, the study examines skilled migrants' commitments to development through engagement in four channels of migration for development: financial remittances and investments, knowledge transfer, social remittances and physical return to the home country. The study illustrates the development aspirations of skilled Indians in Europe and their transnational networking actions to encourage knowledge circulation and to create positive linkages with their home country. It also shows the influence overseas exposure has on the professional and social position of skilled Indian returnees after they return to their home country and the problems they face when transferring the specialized knowledge and technical skills they have gained abroad.

The project was coordinated by the Cooperation and Development Center (CODEV) of the Ecole Polytechnique Fédérale de Lausanne (EPFL) and it was implemented in collaboration with the International Migration Branch (MIGRANT) of the International Labour Office (ILO), the Institute of Development Studies Kolkata (IDSK) and the International Migration and Diasporas Studies (IMDS) Project of Jawaharlal Nehru University (JNU). The project benefited from an association with the Institut de la Recherche pour le Développement (IRD) and the Centre d'Etudes de l'Inde et de l'Asie du Sud (CEIAS), in France. Funded by the Swiss Network for International Studies (SNIS), the project ran from January 2011 until February 2013.

1.2 The highly skilled and the case of India

The global competition for talent and the internationalization of higher education, together with shortages of skilled labour in developed countries due to an ageing population and limits on labour force training in specific sectors, have all had an extensive influence on flows of the highly skilled (Castles and Miller, 2009; Khadria, 2009; Khadria, 2012). Today, it is estimated that some 30 per cent of international labour migrants are skilled persons (Wickramasekara, 2010). This global competition for talent is "likely to become more intense due to continued globalization and the related rapid economic growth in India, China and other less-developed countries" (Industry Canada, 2008, p. 2). India represents a good example because of the high quality of its human resources and the fact that it is a significant source of skilled personnel for many countries around the world. In fact, the number of people of Indian origin living abroad, estimated at 20 million at the turn of the century, is now believed to have risen to 25 million (MOIA, 2012). OECD countries in general have seen an increase in immigration from India in recent years, and most of these migrants are highly skilled Indians. In addition to the traditional emigration countries such as the US, Canada and the UK, in recent years other destination countries in Continental Europe, such as Germany, France, The Netherlands and Switzerland have experienced a systematic increase in the inflows of skilled professionals from India, as a result of the adaptation of their migratory policies as part of their strategy to attract skilled personnel (Buga and Meyer, 2012; Tejada et al., forthcoming). The strategy to pull foreign human capital as an economic buffer to meet skills shortages in specific sectors has influenced the adaptation of policies (e.g. the European Union Blue Card Initiative), which are more flexible with offers of entry and residence for employment to skilled personnel, and this has triggered a surge in skilled immigration from India.

In addition to recruitment and job opportunities, there has been an increase in the number of skilled Indians emigrating through the academic stream as students, the "semi-finished human capital" as Majumdar (1994) termed them. Over the last decade, the share of Indian students among all foreign students enrolled in third-level education in OECD countries increased from 4% per cent in 2001 to 7.3 per cent in 2009, representing the second largest group of students from non-member countries, preceded only by Chinese students (OECD, 2011). The retention of Indian students as long term skilled workers for national labour markets after completing their studies is appreciable in the European destination countries. This shows that student mobility should also be included within the context of skilled migration as it is often a precursor to labour migration (Kuptsch, 2006; Abella, 2006; Castles and Miller 2009; Khadria, 2001), taking place as a consequence of specific international student policies becoming tools in the international competition for skilled persons (Mukherjee and Chanda, 2012; Mosneaga, 2010).

Another trend that has been observed in Indian migration in recent years is the rise in the number of skilled Indians opting to return to their home country. Thousands of skilled professionals, mostly from the IT sector, are returning to India from the USA, UK and other European countries, pulled by economic opportunities, job prospects and family links in India, and pushed by the economic recession and also in some cases by restrictive immigration policies in advanced Western countries. Their perception of an improvement in the economic and social performance of India and their sense of patriotism are additional driving forces behind the return of skilled Indians (Saxenian, 2006; Chacko, 2007; Finegold et al., 2011).

1.3 Objectives and research questions

The lack of a systematic study into the contribution that both Indian highly skilled returnees and the diaspora make to development in India provided the rationale for the project. The purpose of this research project was to broaden the knowledge-base and to promote policies to establish links between return migration, the diaspora and development in the home country. The two major objectives of the study were: to examine the development impact of highly skilled return migration in India; and to document the perceptions of Indian professionals and students residing in the selected European destination countries with regard to their potential development role vis-à-vis India.

The study sought to answer the following research questions:

On the Indian side:

1. What are the motives behind the return of skilled Indians?
2. What is their current employment situation in India (and what are the employment opportunities for those who return after a significant period abroad)?
3. How has the international exposure of skilled Indian returnees affected them professionally, economically, and socially?
4. To what extent do skilled Indians influence development in India through investment, knowledge and skills transfer and their social impact upon their return?

On the European side:

1. What are the migration motives that bring Indian professionals and students to continental European countries?
2. What is their current employment/study situation and what are their experiences there?
3. In what ways are skilled Indians engaged in development activities in India through planned return, remittances and investments, and knowledge transfer?

2. Method

2.1 Sample

For the purpose of this study, six major cities were selected for the field work in India: Delhi-National Capital Region (Delhi, Noida and Gurgaon), Kolkata, Hyderabad, Bangalore, Mumbai and Pune. Since these are the major cities in India that have accommodated a large proportion of highly skilled returnees in the country over the past few years, it was considered that they would offer a representative portrait of return migrants in general.

Four countries (France, Germany, The Netherlands and Switzerland) were selected for the survey in Europe, especially in view of the increasing presence of Indians there. The aim was to explore the current situation and experiences of Indian professionals and students residing in those European countries and their prospective contributions to the development of India. The reasons for choosing these destination countries were based on the realization that an increasing number of highly skilled Indians are moving to them, notwithstanding the importance of the traditional Anglo-Saxon countries. This trend is partly the result of new policies designed to attract skilled people or the review of existing institutional settings by these countries in the selection of immigrants, but it is also a consequence of the internationalization of their education systems and labour markets (especially in The Netherlands and Switzerland). The four selected countries also share a common characteristic in that English is not their native language and therefore they offer similar circumstances in terms of barriers to the easy integration of Indian immigrants. As migration from India to these four countries was very limited until very recent times, we coined the term "new destination countries" to describe them. Our belief was that a study of the Indian diaspora in these destination countries would provide us with newer insights into the plans of highly skilled Indian immigrants in Europe.

Along with this geographical selection, we also attached importance to those sectors where the destination countries are experiencing skills shortages on the one hand, and which absorb significant numbers of return migrants in India on the other. The sectors chosen were - information and communication technologies (ICT); finance and management; biotechnology and pharmaceuticals; and academia within the fields of science and technology. For the sample in India we also included the medical sector, but only included doctors. In order to provide an analytical space for comparison with returnees, the study included a control

group made up of highly skilled Indian individuals from the same sectors, but without international exposure. In the receiving European countries, the sample included Indian professionals and students. The operational definitions of the “returnees” and the “non-migrants” in India as well as the “skilled (Indian) migrants” in Europe are outlined in the following section. As there was no database in India that could give an idea of the population of the returnees, the data was collected using a purposive snowball sampling technique. Purposive and snowball sampling techniques were also used for data collection in the receiving European countries, mainly because of the absence of any authentic list of Indians living abroad.

In India it was very difficult to arrange appointments with returnees and non-migrants working in private sector companies through formal channels because of entry barriers within the companies. A majority of respondents were contacted through informal channels and were approached during lunch breaks. Therefore, field investigators had to complete the survey with those who agreed to respond within a suboptimal period of time. In contrast, respondents working in the public sector and in academic institutions answered the survey without time constraints and were often involved in lengthy discussions to emphasize different facets of skilled migration and return. Accordingly, respondents belonging to different groups had different levels of involvement with regard to responding to similar questions in the survey, and this needs to be considered as a limitation of our study. Another selection bias that this survey may face is based on the snow ball factor. Since our sample depended initially on our own acquaintances and acquaintances of these, it may suffer from having many respondents with a similar point of view.

2.2 Operational definitions

In India, the “returnees” (the experimental group) and “non-migrants” (control group) were operationally defined before the actual data collection began. A returnee was defined as a Non-resident Indian (NRI) or a Person of Indian Origin (PIO - either the migrant or his/her parents should have been born in India) who had stayed abroad for at least a total of 6 months before returning to India, and who currently held employment status in India. Total duration included multiple stays abroad, specifically in any of the four selected European countries (France, Germany, The Netherlands and Switzerland), or in any other country. Respondents had to have at least a Bachelor’s Degree. To provide a comparative perspective, the control group was identified to comprise Indian highly skilled professionals working for the same organization/firm/institute in India as the returnee(s), but who had never been abroad despite having the potential to do so, i.e. equally eligible in terms of skills and job position level.

In order to be eligible for inclusion in the survey in Europe, the respondents had to fulfil the following criteria: they had to be Indian professionals or students, residing in one of the four selected countries, and specialize in any of the four sectors covered (ICT, financial and management, biotechnology and pharmaceutical industry, academia and research). Respondents had to be first-generation migrants. In addition, people working in international organizations were excluded as their stay in the host countries was governed by different immigration rules.

2.3 Data collection

Two questionnaires were prepared for the primary data collection in India - one for returnees and one for non-migrants, (see Appendix 2.1 and Appendix 2.2). For Indian professionals and students residing in the selected European countries, only one questionnaire was designed. Both the European and Indian questionnaires were considered as complementary to each other. The questionnaire for the returnees comprised the following five major content-related sections, in addition to a section on their personal information: current employment situation; information related to out-migration/on-site assignment; return migration and its contribution to the home country; position in society; and transnational ties. In all the sections, there was a mix of both closed and open ended questions in order to offer respondents enough space to provide some qualitative responses whenever required. In the questionnaire for the non-migrants, there were four major sections in addition to a section on personal information: current employment situation; contribution to the home country; position in society; and future plans. Some open ended questions were also included along with the close ended questions in each section, to record their qualitative views or responses. With only a few exceptions, the questionnaires were mostly served face-to-face.

The questionnaire for the Indian professionals and students residing in the selected European countries consisted of five content-related sections: migration motives; experiences in the country of residence; employment situation for currently employed professionals or study situation for students; ties with India and development impact; and future plans. Questions on the background information of respondents were included at the end of the questionnaire. This questionnaire was developed as an online survey (see Appendix 2.3). Together with the survey questionnaire, 30 in-depth interviews were conducted with professionals and post-graduate students of Indian origin residing in Europe; beneficiaries of scientific collaboration programmes with India; and some representatives of the embassies and consulates of France, Germany, The Netherlands and Switzerland in India.

Data were obtained from returnees and non-migrants in the six selected cities in India during the period between August 2011 and February 2012. However, the data collection process continued for a longer period in Delhi and Kolkata as JNU and IDSK, the two Indian partners, were based in these two cities respectively. Target respondents were approached formally with prior appointments, especially in sectors such as academia, and locating the respondents through informal channels in sectors such as ICT and finance and management went hand in hand with this. By the end of the data collection phase, 673 surveys (comprising 527 returnees and 146 non-migrants) had been completed.

Data in Europe were collected simultaneously in all four selected countries during the period between June 2011 and April 2012. The project team benefited from the support of one consultant for each country to help with the dissemination of the online survey. Here, the on-line survey using Survey Monkey software was circulated among members of Indian student and alumni associations, members of Indian organizations, members of professional and social networks sites, researchers in research institutes and academia, and among friends and colleagues of the individuals with whom contacts had already been established. In addition to the attempts to contact potential respondents directly, invitations to the survey were also posted on different social network sites. Among those who provided an answer about where they had found out about the survey, 277 respondents said they were directly contacted by the investigator, 157 found out through a friend or a colleague, 71 learned about it through their employer, 38 found the survey on a website, 12 through the embassy and the others found it through other media, such as posts on Facebook and Yahoo groups. By the end of the data collection phase, the survey had been answered by 878 respondents.

3. Profile of Returnees to India and the Indian Diaspora in Europe

In contemporary migration literature, much attention is being paid to characteristics which could help to explain why some people move while others do not. It is generally argued that migration is a selective activity and a number of characteristics such as age, gender, academic level, socioeconomic situation or the possession of resources (Lewis, 1982), motivation level (Fawcett and De Jong, 1982; Haberkorn, 1981; Sell and De Jong, 1978; Taylor, 1969; Reichlová, 2005), and place perception (Wolper, 1965, 1964; Yap, 1977; Demko, 1974; Cox and Golledge, 1969) play a crucial role in mobility decisions. According to Ammassari and Black (2001, p.20), "if emigration is a selective process, then so is return." As relatively few studies in migration literature deal specifically with return migration as a selective process, this study attempts to examine the characteristics of returnees in the Indian context.

The selectivity of return migrants has been examined in two distinct ways: firstly, by comparing return migrants with emigrants who remain in the destination countries; and secondly, by comparing return migrants with non-migrants in the countries of origin. Accordingly, this section will deliberate on the profile of the returnees to India and the non-migrants, as well as the profile of skilled Indian professionals and students in the observed European countries.

3.1 Description of the sample in India

The total sample in India comprised 673 respondents out of which 527 respondents were returnees and 146 were non-migrants. The returnees comprised a total of 463 male respondents and 64 female respondents. The non-migrants consisted of a total of 122 male and 24 female respondents (Table 3.1).

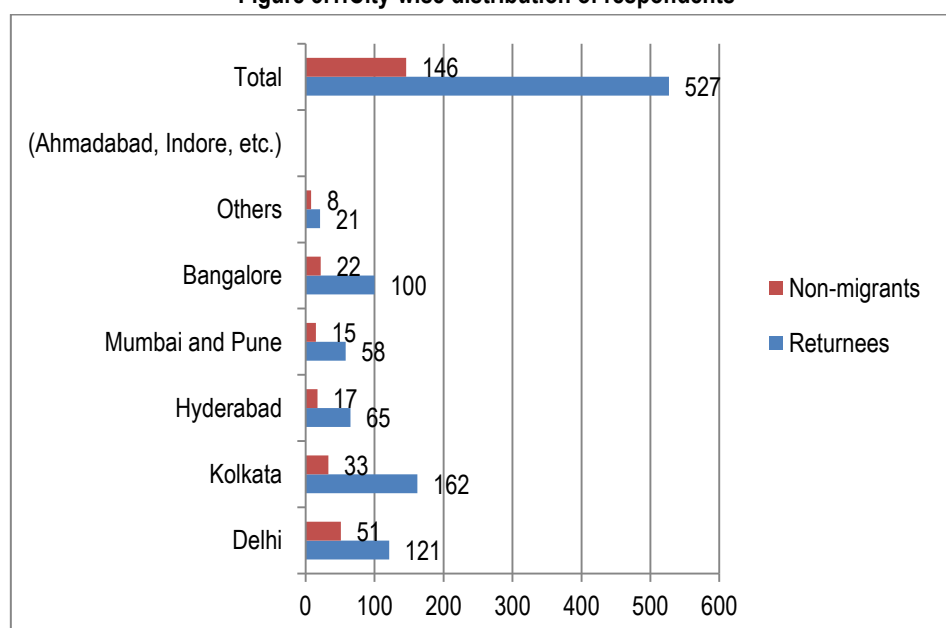
Table 3.1: Sample size (returnees and non-migrants) in India

Sample Categories	Number of Respondents	Male		Female	
		Number	Percentage	Number	Percentage
Returnees	527	463	87.86	64	12.14
Non-migrants	146	122	82.56	24	16.44
Total	673	580	86.18	83	12.33

Source: Field survey in India, 2011-2012

As we can see in Figure 3.1, comparatively large numbers of respondents in both groups (returnees and non-migrants) were from Kolkata and Delhi. This is mainly due to the fact that the partner institutions are located in these two cities, allowing the investigators to conduct field work for a longer duration. Furthermore, the academia and ICT sectors had a larger representation of respondents than the other selected sectors (Table 3.2). The academia sector also had the highest share of female respondents.

Figure 3.1: City-wise distribution of respondents



Source: Field survey in India, 2011-2012

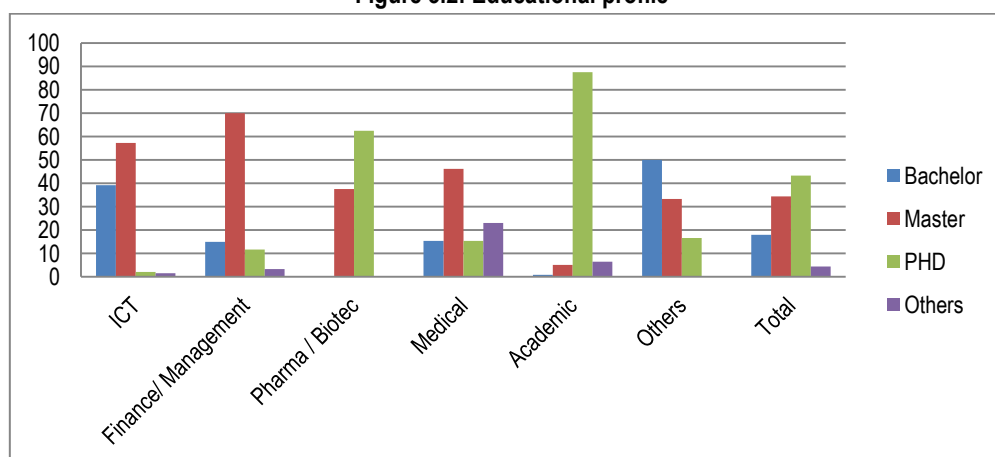
Table 3.2: Distribution of respondents sector-wise

Sector / functional area of current employment	Returnees		Non-migrants	
	Number of respondents	Percentage	Number of respondents	Percentage
Information and communication technology	194	36.81	75	51.37
Financial and management	60	11.39	13	8.90
Pharmaceutical and biotechnology	16	3.04	2	1.37
Medical	13	2.47	14	9.59
Academia	232	44.02	30	20.55
Other	12	2.28	10	6.85
No answer	0	0	2	1.37
Total	527	100	146	100

Source: Field survey in India, 2011-2012

Figure 3.2 shows Master and Bachelor degree holders dominating the ICT and financial and management sectors, with Ph.D. holders dominating academia and the pharmaceutical and biotechnology sectors.

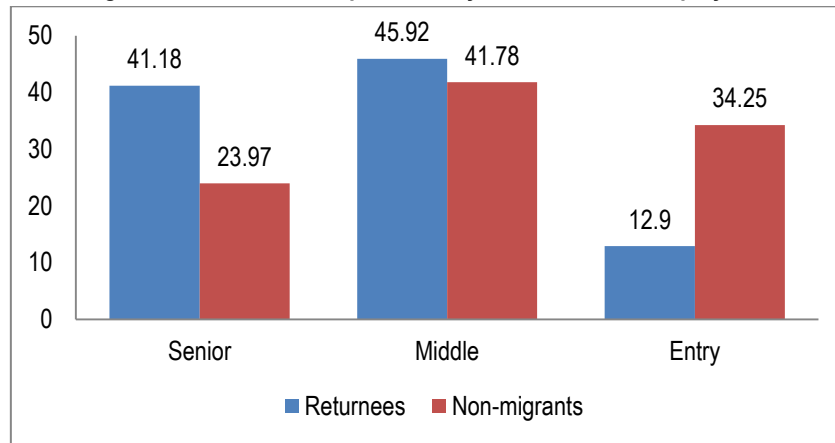
Figure 3.2: Educational profile



Source: Field survey in India, 2011-2012

The sample was divided into three parts, based on the level or position at which the employee was employed (senior, middle or entry level). In both the returnee and non-migrant groups, middle level position holders were the largest in number (Figure 3.3). Even though age wise distribution shows that the sample had more people from the younger cohorts, it might be interesting to surmise that returnees were attracted to come back to India to senior and middle levels, whereas non-migrants were already concentrated at the entry level. This could also be due to more common out-migration among the young, who occupy positions at the middle or senior rank after they return.

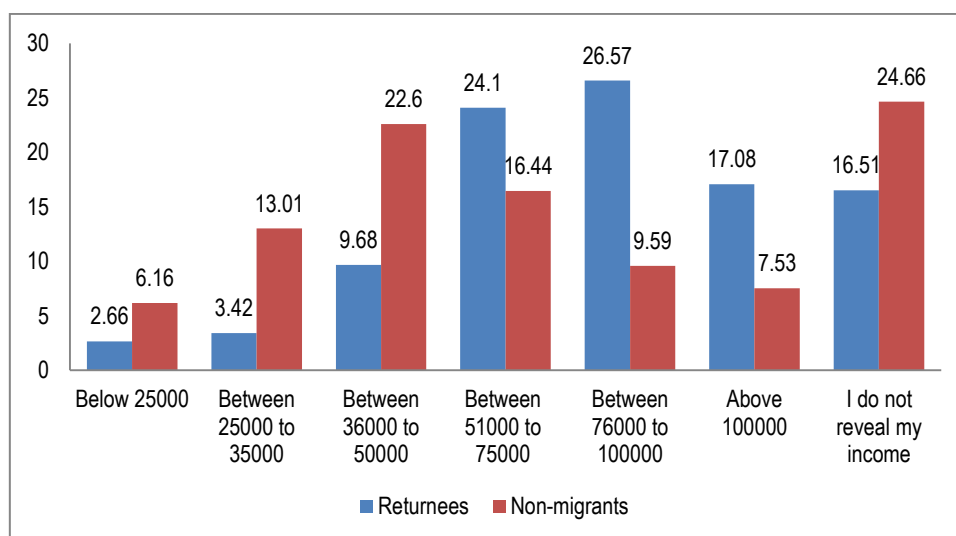
Figure 3.3: Number of respondents by current level of employment



Source: Field survey in India, 2011-2012

In terms of salary structure, the most dominant salary categories for non-migrants were between Rs. 36000 and 50000 and between Rs. 51000 and 75000 while the range for returnees was towards a higher salary range of between Rs. 51000 to 75000 and Rs. 76000 to 100000. In overall terms therefore, it can be argued that returnees were earning higher salaries than non-migrants, or returnees were attracted back to India mainly at the higher end of incomes. This is in line with King (2000:42) who notes that “returnees tend to have higher levels of education, skill and income than non-returnees, particularly where opportunities for professional advancement exist in the home country.” In our survey, several returnees did mention the upward trend of the Indian economy as their reason for returning, and as Figure 3.4 shows, they enjoyed a higher income than the non-migrants.

Figure 3.4: Salary structure of respondents (Rs.)



Source: Field survey in India, 2011-2012

More than half of the returnees in our sample (53.5 per cent) stayed abroad for less than two years (Table 3.3). It should be mentioned here that this was possibly the case because the majority of respondents had been sent abroad by their employer on a project or else had gone on their own on academic endeavours. As Bovenkerk (1974) and Cassarino (2004) argue, the length of stay abroad had implications for the migrants' return to the home country and their engagement in its development. Indeed, the length of the stay abroad tends to be important for home country development because people who spend a reasonable period of time in a foreign country are likely to have accumulated more working experience, skills and social capital in the form of networks, contacts and linkages, than those with shorter stays.

Table 3.3: Duration of stay abroad

Duration of stay abroad	Number of stays	Percentage
Less than 6 months	76	14.42
6 months to 1 year	123	23.34
1 year to 2 years	83	15.75
More than 2 years	245	46.49
Total	527	100

Source: Field survey in India, 2011-2012

The majority of respondents, 52.9 per cent had been abroad as part of a project assignment, research assignment or internship. Emigration for the purpose of studying was the other major type of engagement abroad. This fits in well with Gmelch's (1980, p. 138) typology of returnees who intended to migrate temporarily. In this typology, the time of return is determined by the objectives they set out to achieve at the time of emigration. For the USA, which had the highest number of visitors as a destination country, the most frequent engagement was for higher studies, followed by project assignment. In a study by Wadhwa et al. (2009) the strongest factors bringing these immigrants to the USA were professional and educational development opportunities. Our study also showed that most Indians who went to the USA did so to pursue higher studies and develop themselves professionally. In the case of the UK - the second most frequented country for Indians - the most popular engagement was project assignment. The project/research assignment also had the maximum engagements for the new European destination countries (Table 3.4).

Table 3.4: Country-wise engagement during stay abroad (%*)

Countries	Higher studies	Employment	Project assignment / research assignment	Accompanying a family member	Other*	Did not reply	Total number of respondents
Switzerland	31.71	7.32	46.34	0	14.63	0	41
Germany	15	16.67	66.67	0	1.67	0	60
The Netherlands	18.18	0	81.82	0	0	0	11
France	12.5	18.75	65.63	0	3.13	0	32
UK	14.41	22.03	60.17	0.85	1.69	0.85	118
USA	40	14.19	39.35	1.94	3.87	0.65	155
Japan	0	20	80	0	0	0	5
Spain	21.05	5.26	73.68	0	0	0	19
Italy	0	0	100	0	0	0	4
Australia	0	0	0	0	100	0	1
Ireland	100	0	0	0	0	0	1
Belgium	0	0	100	0	0	0	2
Other	24.36	17.95	51.28	0	2.56	3.85	78
Total	24.86	15.75	54.08	0.76	3.61	0.95	527

Note: Others include: Seminars and Workshops, Visiting Positions, Business Purposes and Exchange Programmes

*Percentage sum up to 100% for each row.

Source: Field survey in India, 2011-2012

Table 3.5 shows that the majority of returnees, 29.4 per cent and 22.4 per cent, visited the USA and UK respectively for their first visit while the new European destination countries such as Germany, Switzerland, France and The Netherlands respectively had 11.4 per cent, 7.8 per cent, 6.1 per cent, and 2.1 per cent of first time visitors. For the majority of the returnees their first visit abroad was the most important visit for them.

Table 3.5: First destination countries

Country name	Number of Visits	Percentage
USA	155	29.41
UK	118	22.39
Germany	60	11.39
Switzerland	41	7.78
France	32	6.07
Spain	24	4.55
Italy	12	2.28
Netherland	11	2.09
Sweden	7	1.33
Belgium	7	1.33
Canada	5	0.95
Scotland	4	0.76
Norway	4	0.76
Finland	3	0.57
Greece	2	0.38
Denmark	2	0.38
Others	37	7.02
Total	527	100

Source: Field survey in India, 2011-2012

Furthermore, as shown in Table 3.6, more than half of the sample, 54.6 per cent, had been abroad on an employment visa, followed by 22.3 per cent on a student visa. The remaining three categories of visa holders were smaller in proportion among the returnees.

Table 3.6: Type of visa held by returnees

Visit 1 (Type of visa)	Number	Percentage
Employment Visa	289	54.65
Student Visa	118	22.39
Tourist Visa	19	3.61
Permanent Residence Permit	16	3.04
Family Reunification Visa	5	0.95
Other	80	15.18
No Answer / Missing Value	1	0.19
Total	527	100

Source: Field survey in India, 2011-2012

The ICT and financial and management sectors had around 60 per cent of the sample in the younger age category and the smallest proportion in the older age category. The other sectors such as pharmaceutical and biotechnology, medicine, and academia had a smaller proportion in the younger age category and a higher proportion in the middle and older categories. However, in overall terms, the maximum numbers of returnees in our sample were in the youngest age group, followed by the middle and then the older category (Table 3.7). It is argued in the literature that well-educated, highly skilled individuals are more likely to migrate, and to more distant places than their less-educated or semi-skilled counterparts. This multi-dimensional selectivity of migrants also has obvious implications for the impact of migration on the sending and receiving countries (Lewis, 1982).

Table 3.7: Age-wise distribution by sector (in %)

Sector/ Area of Current Employment	Age Category			
	(22-35 years)	(35-50 years)	(>50 years)	Total Respondents
Information and communication technologies	68.56	28.87	2.58	100% (194)
Financial and management	56.67	33.33	10.00	100% (60)
Pharmaceutical and biotechnology	18.75	50.00	31.25	100% (16)
Medical	15.38	53.85	30.77	100% (13)
Academic	17.24	41.38	41.38	100% (232)
Others	75.00	8.33	16.67	100% (12)
Total	41.94	35.67	22.39	100% (527)

Source: Field survey in India, 2011-2012

3.2 Description of the sample in Europe

A total of 878 respondents answered the survey in all four destination countries. As some of the respondents accessed the survey through group invitations (e.g. a post on a Facebook group), there were a few entries in the survey that did not correspond to the described criteria, and consequently they were not included in the analysis. A small number of respondents (29) were based in countries other than the four selected European host countries and 14 were presently based in India. After excluding those questionnaires, the sample of Indian students and professionals living in the four selected countries comprised 835 individuals (Table 3.8). Most respondents were from France, followed by those living in Switzerland, Germany and The Netherlands. In the overall population of Indian migrants in Europe, the largest groups were in France and Germany, each with close to 50,000 Indian-born migrants. The Netherlands hosted over 17,000 and Switzerland had around 12,000 Indian migrants in 2009 (OECD.stat, Swiss Federal Office of Statistics for Switzerland; Federal Statistical Office Germany).

Table 3.8: Total surveys completed in Europe by country of residence

Country of residence	Numbers of respondents	Percentage
France	342	39
Germany	154	17.5
Switzerland	242	27.6
The Netherlands	97	11
Other countries	43	4.9
Total	878	100

Source: Field survey in Europe, 2011-2012

Considering the overall Indian population in selected European countries, our sample showed an underrepresentation of responses from Indians in Germany. Such a distribution was the result of a relatively more successful sampling strategy in the other countries, which should be taken into account when interpreting our results. However, in line with the general male-dominance of Indian skilled migration to Europe, our sample showed a representative distribution where close to 80 per cent respondents are male (Table 3.9). Indian skilled migrants were mostly young and from urban areas. In our sample, 90 per cent of all respondents were 35 years old or younger, 30 per cent were married and only about 15 per cent had children, confirming that the young are the most mobile group.

Table 3.9: Respondents by country of residence and gender

Host country	Female	Male	Total
France	68(24.82)	206(75.18)	274 (100)
Germany	26(21.14)	97(78.86)	123(100)
Switzerland	33(17.74)	153(82.26)	186(100)
Netherlands	20(26.67)	55(73.33)	75(100)
Total	147(22.34)	511(77.66)	658(100)

Note: Figures in parentheses represent percentages

Source: Field survey in Europe, 2011-2012

Only in recent years, with the changes in immigration policies and the internationalization of higher education, have European countries become more attractive destinations for Indian students and professionals. The duration of the stay in the host countries for

the surveyed population clearly showed that a great majority had arrived only recently; almost half of the respondents arrived within the past two years. Very few (6.8 per cent of the respondents) had arrived in the selected countries before 2000. There were considerable differences between the surveyed populations in the different host countries. On average, people surveyed in The Netherlands had arrived there much earlier than the respondents living in Germany or France (Table 3.10).

Table 3.10: Year of arrival of migrants by host country

Host country	Arrived in 1990 or earlier	Between 1991 and 2000	Between 2001 and 2009	After 2009	Total
France	10 (3.06)	3 (0.92)	98 (29.97)	216 (66.06)	327 (100)
Germany	0	4 (2.88)	70 (50.36)	65 (46.76)	139 (100)
Switzerland	12 (5.19)	6 (2.6)	137 (59.31)	76 (32.9)	231 (100)
Netherlands	10 (11.63)	8 (9.3)	49 (56.98)	19 (22.09)	86 (100)
Total	32 (4.09)	21 (2.68)	354 (45.21)	376 (48.02)	783 (100)

Note: The figures in parentheses represent percentages

Source: Field survey in Europe, 2011-2012

Considering the short time of their stay in European destinations, very few had obtained either citizenship or long-term residence (Table 3.11). A large majority (93 per cent) of surveyed respondents stated that they had Indian citizenship. Respondents who held citizenship of the destination country had on average lived there since 1984. Those with a long-term residence permits had on average lived in a destination country since 1996. The small number of Indians with a status other than short-term residence, alongside the long period of stay before obtaining a long-term residence and even more so for obtaining a citizenship, indicates that the requirements to obtain this status were still strict despite the liberalisation of immigration policies in Europe.

Table 3.11: Residence status of migrants in the host country

Host country	Citizenship	Long-term Residence	Short-term Residence	Other	Total
France	15 (4.39)	3 (0.88)	309 (90.35)	15 (4.39)	342 (100)
Germany	4 (2.66)	0 (0)	132 (85.71)	18 (11.69)	154 (100)
Switzerland	13 (5.37)	7 (2.89)	208 (85.95)	14 (5.79)	242 (100)
Netherlands	16 (16.49)	7 (7.22)	72 (74.23)	2 (2.06)	97 (100)
Total	48 (5.75)	17 (2.04)	721 (86.35)	49 (5.87)	835 (100)

Note: The figures in parentheses represent percentages

Source: Field survey in Europe, 2011-2012

The predominant holding of short-term residence permits can also be explained by the large share of student respondents. Our definition of highly skilled Indians included students, who represented over 60 per cent of the sample, except for The Netherlands (Table 3.12). The share of respondents whose main activity at the time of the survey was in paid employment was higher for Indians in The Netherlands. Some respondents were engaged in activities other than salaried employment or education: 9 female respondents cited housework as their main activity, 13 respondents were retired, 22 were self-employed and 22 were unemployed.

Table 3.12: Main activity of migrants in the host country

Host country	Salaried Employment	Education	Other Activities	Total
France	85 (27.96)	186 (61.18)	33 (10.86)	304 (100)
Germany	49 (35.51)	86 (62.32)	3 (2.17)	138 (100)
Switzerland	52 (23.96)	148 (68.2)	17 (7.83)	217 (100)
Netherlands	41 (50)	28 (34.15)	13 (15.85)	82 (100)
Total	227 (30.63)	448 (60.46)	66 (8.91)	741 (100)

Note: Figures in parentheses represent percentages

Source: Field survey in Europe, 2011-2012

A more detailed description of respondents in employment (regular employment and self-employment) as well as respondents in education or training is given in the following two sub-sections.

3.2.1 Respondents in employment

A majority of the surveyed Indian professionals worked in multinational companies. Most of these companies originated from the respondents' host countries. The second largest group of respondents worked in academia and research institutions. This share was particularly large in Germany and Switzerland. While our survey did not capture any people in self-employment in Germany, there were a few self-employed individuals in the sample from the other countries (Table 3.13). Most respondents (44 per cent) placed themselves at the mid-level in terms of seniority. In most cases the type of work was research-related (34.5 per cent of respondents in employment), technical (27 per cent) or managerial (25.5 per cent). A few other professionals (13 per cent) were engaged in activities such as consulting, internships or they had their own businesses. The survey targeted professionals specialized in the fields of ICT, finance and management, biotechnology and the pharmaceutical industry and in academia and research fields. Individuals working in ICT represented the biggest group (34.6 per cent), while the rest of the sample was dispersed across different sectors: 12.5 per cent in biotechnology and the pharmaceutical industry; 10.4 per cent in the financial sector and smaller shares in the automotive and aerospace industry, chemicals and manufacturing, the energy sector, health and the environmental sector. There is a difference between host countries with regard to the type of contracts they had with employers. In the Netherlands, 72.5 per cent of respondents had a permanent contract. Permanent contracts were also more commonly used in France, while in Germany and Switzerland, close to 60 per cent worked in either temporary or contract jobs.

Table 3.13: Type of employment by host country

Host country	Multinational company	Academia and research	Local company	Self-employment	Total
France	57 (62.64)	15 (16.48)	10 (10.99)	9 (9.89)	91(100)
Germany	20 (43.48)	21 (45.65)	5 (10.87)	0(0)	46 (100)
Switzerland	17 (30.36)	26 (46.43)	6 (10.71)	7 (12.5)	56 (100)
Netherlands	29 (70.73)	3 (7.32)	6 (14.63)	3 (7.32)	41 (100)
Total	123 (52.56)	65 (27.78)	27 (11.54)	19 (8.12)	234 (100)

Note: Figures in parentheses represent percentages

Source: Field survey in Europe, 2011-2012

3.2.2 Respondents as students

Observing the national statistics of the selected destination countries, it is clear that the overall distribution of Indian students in Europe is highly skewed towards postgraduate studies with a growing share of PhD enrolments over the past few years. The majority of all Indian students in The Netherlands, France and Germany were enrolled in Masters' programmes, while Switzerland was particularly attractive for PhD students. Only a minor share of all Indian students were enrolled in undergraduate courses in the selected countries. In 2010, this share ranged from less than 2 per cent in Switzerland, to 10 per cent each in Germany and The Netherlands, to 25 per cent in France (NUFFIC, 2012; Campus France, 2010; Swiss Federal Office of Statistics; Federal Statistical Office Germany).

The sample of Indian students in the survey corresponded to the overall student distribution described above. There were only a few respondents in undergraduate programmes (Table 3.14).

Table 3.14: Level of study for student respondents

Host country	Bachelors	Masters	PhD	Other	Total
France	9 (5.29)	114 (67.06)	38 (22.35)	9 (5.29)	170 (100)
Germany	0	22 (28.95)	43 (56.58)	11 (14.47)	76 (100)
Switzerland	4 (3.13)	23 (17.97)	91 (71.09)	10 (7.81)	128 (100)
Netherlands	0	9 (34.62)	16 (61.54)	1 (3.85)	26 (100)
Total	13 (3.25)	168 (42)	188 (47)	31 (7.75)	400 (100)

Note: Figures in parentheses represent percentages

Source: Field survey in Europe, 2011-2012

As the general statistics show, a large majority of Indian students in Europe specialize in engineering, ICTs and natural sciences. Corresponding to the general profile of the student population, in the sample of student respondents, we found the largest groups studying engineering (30 per cent), management and business administration (18 per cent) and life sciences (14.5 per cent). Only 3 per cent were specializing in social sciences or humanities. The remaining respondents were in different fields of natural sciences. The small number of students who had already studied abroad for their earlier degrees (30 per cent of the sample), had in almost all cases stayed in the same host country for their on-going studies.

4. Motives of Returnees and Consequences of Migration: The Empirical Evidence from India

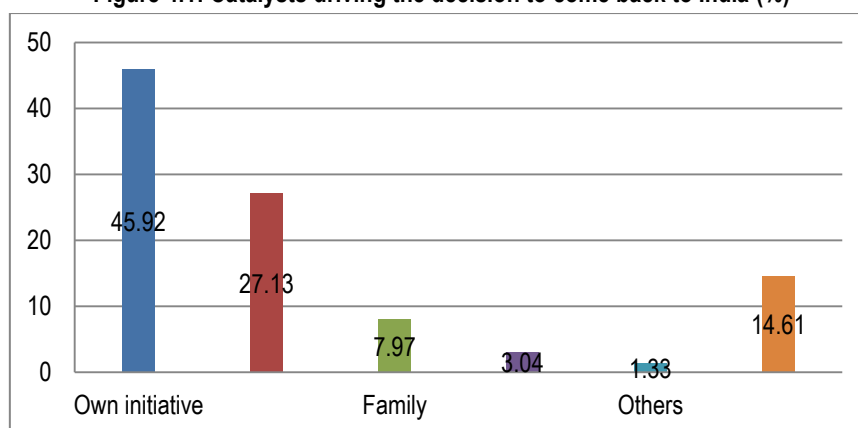
Return migrants, especially the highly skilled, are widely believed to possess the knowledge, skills, financial resources and investment capability, and a transnational network, which they might utilize for the development of their home country (King 1986; Fromhold-Eisebith, 2002; ILO, 2004; IOM, 2005; GCIM, 2005; Saxenian 2006; Chacko, 2007; Klagge and Klein-Hitpass, 2010). In order to further examine the linkages between return migration and development, this section explores variables such as the motives behind return, monetary contributions made while being abroad as well as after return, the transfer of knowledge and skills, and widening and maintaining transnational social ties. The intention is to stimulate discussions about return migration and its development consequences for India as a source country.

An overwhelming majority (325 out of 527, i.e. about 70 per cent) of returnees thought about taking an active part in the development of India by applying what they had learnt abroad through social service, research, academic training, business and job creation etc. Another 132 returnees, who did not think of actively taking part in the development of India, also added that their overseas experience, professional skills and financial resources might have a positive impact on development in India. Furthermore, about 80 per cent of returnees and 7 per cent of non-migrants said that it would be good for India's development if highly skilled Indians returned from abroad. Based on these perceptions, the present section encapsulates the results of this study into the development consequences of migration in India through four channels of engagement: physical return, remittances and investment, knowledge transfer and social impact.

4.1 Physical return

Migrants can contribute to the development of the home country - India in this case - while living in the destination country, as well as by physically returning to their home country. Return is usually believed to be a strong development factor as returnees are able to use the local resources as well as their transnational networks and the knowledge and skills gained abroad. Several push and pull factors determine the migrants' decisions to return to their homeland. In the present study, almost half of the returnees (45.9 per cent) reported their decision to come back to India as an outcome of their own initiative. The expiration of a project/assignment/contract with their employers was mentioned by more than a quarter (27.1 per cent) of the returnees as the most important reason in their decision to come back to India. However, there was some overlap between the first and second reasons as some of the returnees, who went abroad on specified term-based assignments or projects, also mentioned that they had come back on their own initiative, negating the fact that the decision about their return was also an inherent part of their contract. Family was found to be the third most important factor determining return (Figure 4.1).

Figure 4.1: Catalysts driving the decision to come back to India (%)



Source: Field survey in India, 2011-2012

Table 4.1: Motivation for returning to India

S.N.	Motivating factor to come back to India (most important)	Number of returnees	Percentage
1	Project completed/contract expired	306	58.06
2	Recession in the host country/increasing unemployment in the overseas labour market	4	0.76
3	Better business/ entrepreneurial opportunities in India compared to the destination country	18	3.42
4	Better employment/career advancement in India in the sector concerned than in the destination country	34	6.45
5	Higher real earnings in India relative to the cost of living	2	0.38
6	Requiring a scholarship	2	0.38
7	Difficulties to integrate into the host society	2	0.38
8	Rigid immigration and settlement policy in the destination country	10	1.90
9	I want to be with my family	90	17.08
10	I have to take care of someone in India	4	0.76
11	I want to bring up my children in India	1	0.19
12	Other	14	2.66
13	No answer	40	7.59
	Total	527	100.00

Source: Field survey in India, 2011-2012

While probing further into the specific reasons for return, 'project completed/contract expired' emerged as the most significant reason, as a large majority, representing nearly three fifths of returnees (58.1 per cent) came back to India after the completion of their projects. This can be explained by the fact that almost half of the returnees in the sample were from two sectors, ICT (36.8 per cent), and finance and management (11.4 per cent), in which quite a significant proportion of employees go abroad on short-term contracts and where return is inherent after the completion of the stipulated duration. Additionally, quite a large number of those in academia (constituting 44 per cent of the returnees in the sample) had also gone abroad on specific academic assignments and had no choice but to come back after the expiration of their term. An urge to reunite with the family was found to be the second most important factor, motivating over 17 per cent of the migrants to come back to India. Better employment opportunities and career advancement in the sector concerned, together with better business and entrepreneurial opportunities in India relative to the destination country motivated about 10 per cent returnees to come back to India (Table 4.1).

These findings show that whereas a majority of Indian migrants returned to India because their project assignments were over in the host countries, some of them came back with a view to exploiting the new growth and potential employment opportunities available in some of the emerging sectors, specifically in the cities that were linked to the global network. These findings corroborate the study by Chacko (2007) in which she argues that Indians are motivated to return by the exciting work experience, an opportunity for growth and to reintegrate with their family. Interestingly and contrary to the popular perception, 'recession in the host country/increasing unemployment rate in the labour market overseas did not figure as a prominent factor for returning, as only 4 returnees mentioned it as an important reason for coming back. However, it is important to note that only 10 returnees (about 2 per cent) mentioned 'rigid immigration and settlement policy in the destination country' and another 2 returnees mentioned 'difficulties to integrate in the host society', as major determining factors for their return to India.

It is often argued that the transfer of migrants' resources - especially skills and knowledge - upon return, depends largely on the availability of infrastructure and conducive governance in the countries of origin. It is perhaps for these reasons that some of the cities in India, such as the ones chosen for the present study, could develop and gain prominence as cosmopolitan cities and establish their presence at a national as well as at a global level. These cities possess better educational and research institutions compared to the majority of other cities in India and they attract considerable numbers of highly skilled return migrants.

Box 4.1 : Limitations of physical return on influencing development

Some respondents - returnees as well as non-migrants - especially those in academia, pointed to the limitations on the impact that returnees have on development in India. For example, one professor at the Indian Institute of Science (IISc) in Bangalore expressed his angst and frustration with the bureaucracy and red tape and the fact that a paper had to pass through several channels before the work got done. His frustration stems from larger issues of corruption in society and its linkages to the developmental impact on society. What he implied was that the development bottlenecks stem from these issues. For people such as this professor, return migrants' skills are important, but it is more important to have a system in India that is conducive for development.

Table 4.2 offers an overview of the factors that have led returnees to choose a particular city to locate in India after their return and it compares them with non-migrants. For returnees, hometown (28.1 per cent), location of place of work (22.2 per cent), determined by employer (21.4 per cent), and residence of parents or close relatives (17.5 per cent) emerged as major influencing factors determining the Indian city in which to locate. Parents or close relatives living in that city (26 per cent), hometown (25.3 per cent), company or sector of choice is based in the city (18.5 per cent) and employer's decision (15.7 per cent) were found to be major influencing factors in the case of non-migrants. It shows that the reasons for selecting a particular Indian city were found to be somewhat similar for both returnees and non-migrants. Drawing upon these findings, it can be safely argued that returnees tend to settle in a city that not only keeps them closer to their family and community members but which also provides opportunities for employment and self-development (Beaverstock and Smith, 1996; Yeoh and Chang, 2001; Yusuf and Wu, 2002; Castles and Miller 2009).

Table 4.2: Major influences on the decision to locate, upon return, in a particular Indian city (%)

S.N.	Influences on Decision	Returnees	Non-migrants
1	My parents/close relatives live here	17.46	26.03
2	My hometown	28.08	25.34
3	Decided by my employer	21.44	15.75
4	The company/sector I wanted to work in is based here	22.20	18.49
5	Scope for self-employment/entrepreneurship	0.38	0
6	Emerging state government support	0.19	0.68
7	Better remuneration packages relative to cost of living	0.19	0.68
8	Good educational institutions for children	1.90	2.74
9	Good health facilities	0.19	0
10	Living environment of the city	1.71	2.74
11	Other	0.57	1.37
12	No answer	5.69	6.16
	Total	100	100

Source: Field survey in India, 2011-2012

When asked about their perceptions of the impact of highly skilled returnees on India's development, a majority of respondents from both groups - nearly four fifths of the returnees and non-migrants - said almost unanimously that they would have an impact (Table 4.3). Importantly, out of a total of 527 returnees, 15 expressed their disagreement about the impact of return migration on development in India for reasons such as bureaucracy. According to them this problem lies in the institutional culture of India and not because of the limitations of the return migrants *per se* (see Box 4.1).

Table 4.3: Perceptions of returnees and non-migrants of the impact of skilled returnees on India's development

Opinions	Returnees		Non-migrants	
	Number of Respondents	Percentage	Number of Respondents	Percentage
Strongly disagree	11	2.09	8	5.48
Disagree	4	0.76	8	5.48
Indifferent	48	9.11	27	18.49
Agree	214	40.61	64	43.84
Strongly agree	205	38.90	39	26.71
No Answer	45	8.54	0	0
Total	527	100.00	146	100.00

Source: Field survey in India, 2011-2012

Furthermore, as we can see from Table 4.4, when return migrants were asked whether any skilled professionals returned to India as a result of their encouragement, 92 of them responded positively and stressed the importance of peer influence on their decision to return to India. In percentage terms this might have been a small proportion in the sample, but it was not insignificant.

Table 4.4: Effects of encouraging other Indians to return to India

Has any skilled professional returned to India as a result of your encouragement?	Number of Returnees	Percentage
Yes	92	17.46
No	415	78.75
No answer	20	3.80
Total	527	100

Source: Field survey in India, 2011-2012

Table 4.5 shows that a majority of the returnees did not have any specific plans to move abroad again. Similarly, about three fourth of the non-migrants also said they did not have any specific plan to go abroad. Indeed, among both groups only a small proportion of the respondents – 13 per cent of returnees and about 23 per cent of non-migrants – mentioned that they had concrete plans to migrate in the near future. Although the proportion of those having concrete plans may seem quite low, it is an important indicator of the ability of returnees and non-migrants to migrate.

Table 4.5: Plans for future migration

Concrete plan to move abroad?	Returnees		Non-migrants	
	Number of respondents	Percentage	Number of respondents	Percentage
Yes	69	13.09	33	22.60
No	450	85.39	110	75.34
No answer	8	1.52	3	2.05
Total	527	100	146	100

Source: Field survey in India, 2011-2012

4.2 Remittances and investment

In the discourses concerning linkages between migration and development, the issue of remittances has received wide recognition for many years (Appleyard, 1992; Adams, 2003; Agunias, 2006; World Bank, 2010). However, the volume of remittances depends primarily on income, the propensity to save and the strength of social ties on the part of the migrants, and the institutional mechanisms for money transfers on the part of the governments of the sending and the receiving countries. In many countries of origin, remittances make a significant contribution to Gross Domestic Product. Recognised as one of the major recipient countries of remittances in the world, India has attracted a lot of attention over the last few decades (Ratha and Silwal, 2012). For example, India received an estimated US\$55 billion in remittance inflows in 2010 (Afram, 2012) and this was reported to have risen to US\$70 billion in 2012. It was within this context that the present study tried to find the beneficiaries of remittances, i.e., those to whom the migrants (now returnees) sent remittances and the purpose of these remittances. Table 4.6 shows that more than three fourth of returnees (329 representing 62.4 per cent) did not disclose any information related to remittances. As the field investigators observed, this might be because of a general reluctance among returnees to disclose any financial matters. Despite this, about one third of returnees said that they had sent remittances to their family members while they were abroad.

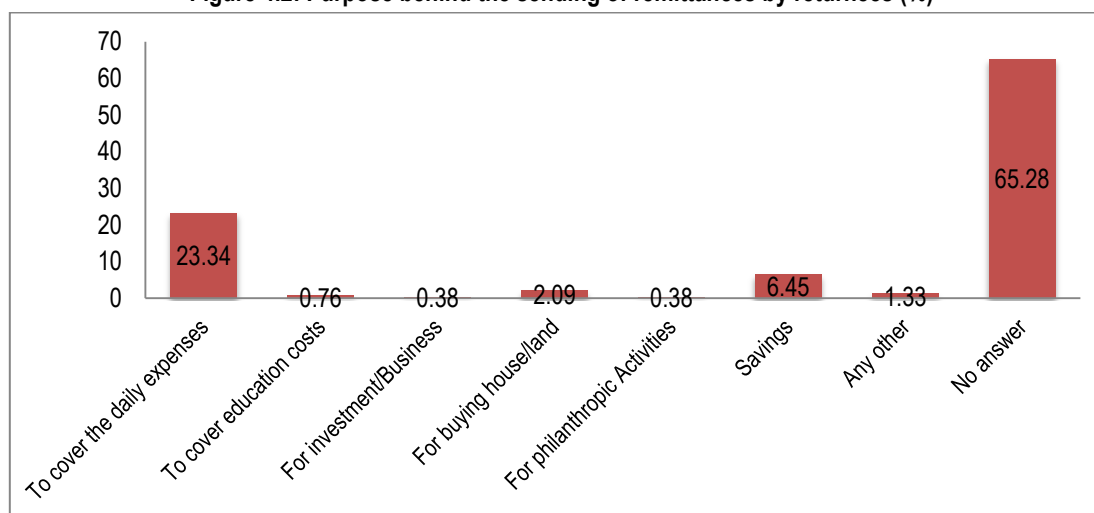
Table 4.6: Major recipients of remittances from returnees (while they were abroad)

Major recipients	Number of returnees	Percentage
Family Member	196	37.19
Charity organization	1	0.19
Any other	1	0.19
No answer	329	62.43
Total	527	100

Source: Field survey in India, 2011-2012

The study found that almost one quarter of the remittances were sent to cover the day-to-day expenses of the family members of the returnees while these returnees were living abroad (Figure 4.2). This finding is in line with Fischer et. al. (1997), who argue that an increased flow of remittances leads to greater consumption, which in turn produces growth effects. After fulfilling the basic needs, the remittances were saved, invested or spent on entrepreneurial activities, to buy land, or for philanthropic purposes. Such empirical evidence was also found in studies conducted in African countries. For instance, Russell et. al. (1990) found that in sub-Saharan Africa, people invested in activities such as education, livestock, farming and small scale business after fulfilling their subsistence needs. In Zambia, remittances have been an important source for investing in agriculture (Chilivumbu, 1985). In Ghana, Cadwell (1969) found that remittances were used to finance socio-economic development projects such as wage payments to farm labourers and small scale business. Contrary to the findings of these studies, our study showed that the proportion of remittances spent in the social sector such as education and other philanthropic activities was quite dismal. This also could also be due to the fact that educational expenses at a micro level were considered part of the “family’s daily expenses”.

Figure 4.2: Purpose behind the sending of remittances by returnees (%)



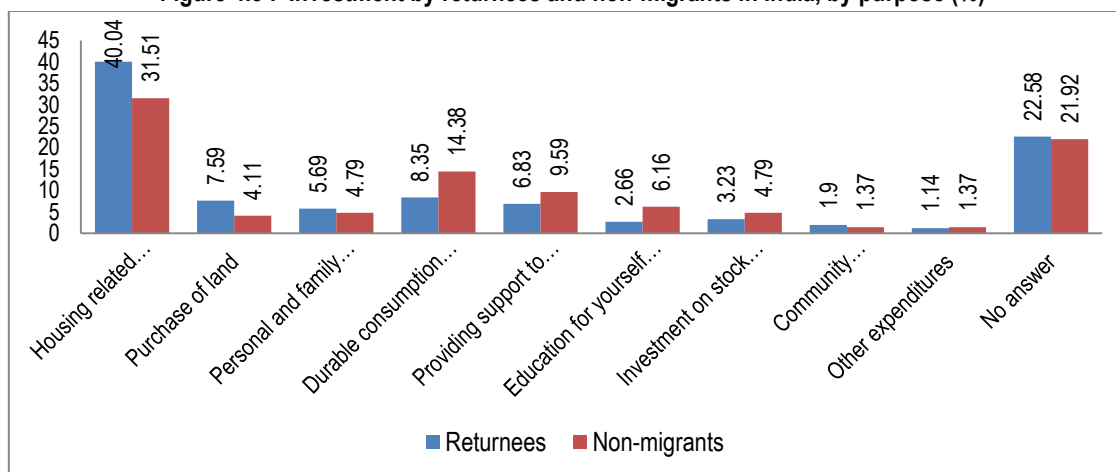
Source: Field survey in India, 2011-2012

People save a certain proportion of their earnings and invest those earnings in various sectors according to their perceived portfolios. Besides providing security to investors, these also contribute to development through spillovers into other sectors as well, which are often not too well known to the investors themselves. However, the volume of spillovers largely depends on the nature of the investment. This study also examined the investment patterns of returnees and non-migrants. The study found striking similarities between returnees and non-migrants in terms of their investment patterns over the last five years. Respondents from both groups preferred to invest in housing - constructing a house or purchasing a flat - about two third of returnees and nearly one third of non-migrants invested in housing. Durable consumption goods also attracted a considerable share of their financial resources. After fulfilling their family's basic consumption needs, the returnees and the non-migrants tended to invest in business and the stock market, and to spend a small proportion on social services (Figure 4.3).

Box 4.2: Key to development: making adjustment between 'two worlds'

A Professor working at the Tata Institute of Fundamental Research (TIFR) Mumbai expressed her satisfaction with her current job, which she valued a lot, and for which enough infrastructure and facilities had been provided by the TIFR. However, another senior professor at IIT Mumbai had problems adjusting to the work culture when he first came back to India after several years abroad, although he believed that he had adjusted successfully in due course. But he said that his experience had taught him that it is not easy to settle down back home, because of the striking differences between the 'two worlds' he had lived in. Thanks to his own efforts he had adjusted and managed to have a separate building on his own initiative where he could do his work peacefully. These examples show that the development impact depends on the efforts of the returnees who learned to manoeuvre the system to achieve their ends and to move between the 'two worlds'. The returnees will only be able to contribute to the home country if local conditions are made to suit for them.

Figure 4.3 : Investment by returnees and non-migrants in India, by purpose (%)



Source: Field survey in India, 2011-2012

4.3 Knowledge transfer

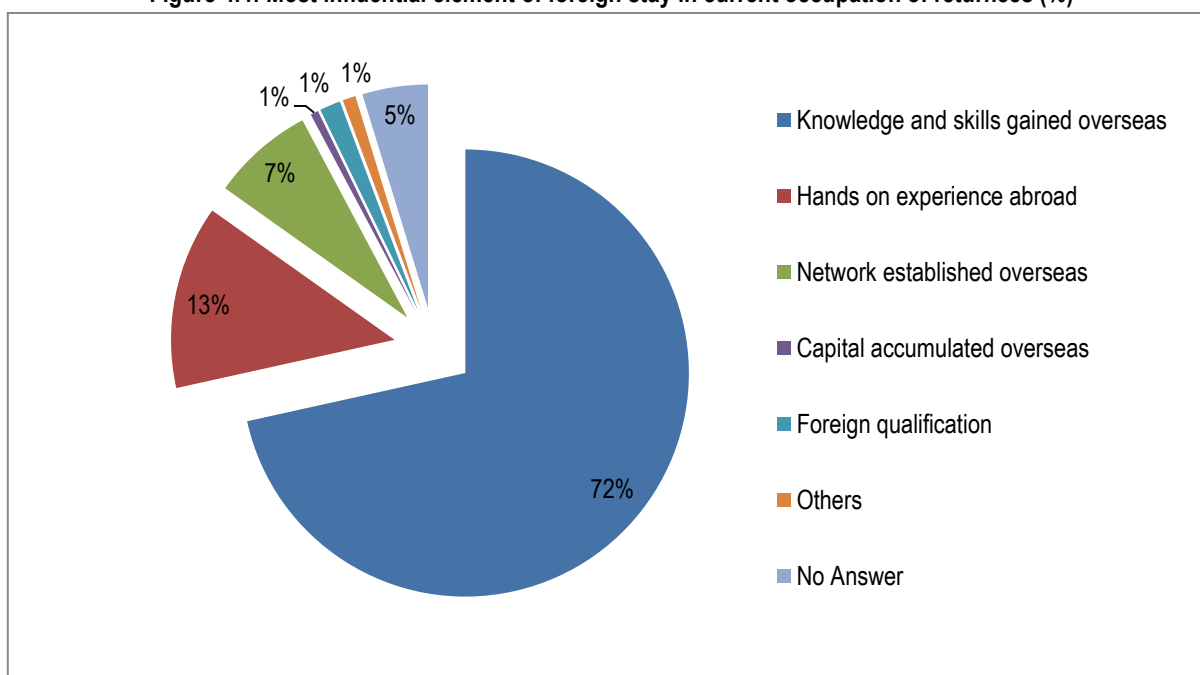
Returnees are not only celebrated as senders of money and investors in the home countries but they are also the “bearers of newly acquired skills and innovative and entrepreneurial attitudes,” as a host of migration scholars have argued (King 1986, p.18). According to Klagge and Klein-Hitpass (2010, p. 1635), “highly skilled return migrants can play an important role in economic development by supporting or facilitating knowledge transfer from abroad.” As a third important channel of engagement, the present study also looked at the role of return migrants in the transfer of knowledge and skills that they had gained abroad. This sub-section and the following one discuss the research findings along these lines.

The study found that more than three quarters of returnees viewed their overseas exposure as having a substantial impact on their personal development, particularly in knowledge and skills. One returnee said that when he was recruited by an academic institution two decades ago, foreign returnees like him were viewed as symbols of ‘quality’. They were in great demand in those days. Besides, all the required facilities such as schooling for children, an on-campus residence and many other such necessities, which were difficult to attain in the ‘non-secure’ world outside, were provided for returnees. Furthermore, more than half of the returnees (56.7 per cent) and non-migrants (56.1 per cent) felt that the experience, knowledge, and skills gained abroad could be the most important way in which the returnees could contribute to the development in India. A substantial number of respondents from both groups felt that the return of highly skilled Indians could bring a good work culture and innovative ideas and felt that this could have significant impact on development. However, during the field work it was observed that the contribution of return migrants to development at home largely depended on the adjustment capabilities of the returnees on the one hand, and the kind of support structure provided by the institutional surroundings on the other (see Box 4.2 and Box 4.3).

Box 4.3: Global knowledge, local context

A senior professor of life sciences from Hyderabad Central University told us that he returned to India a long time back after finishing his Ph.D. abroad. He continued his research with his students on similar niches using the machines which he had used while pursuing his education abroad. But now, as he comes up to retirement, he feels that replicating the foreign models in a local context, which is quite different, did not prove to be of much worth. He said that it would have been better if he could have identified specific local needs and mobilised resources to benefit society. Observations of this kind have also been seen in scholarly discourses on migration, as Castles and Kosack (1973) have argued, saying that at times migrants are not able to apply their knowledge and skills in their home country, especially since they find it difficult to match the cultural context.

Figure 4.4: Most influential element of foreign stay in current occupation of returnees (%)



Source: Field survey in India, 2011-2012

The study found that 'knowledge and skills gained overseas' was the most important element for the current work or business of the returnees. This was followed by 'hands on experience abroad', while 'networks established overseas' was the third most important element used by the returnees in their current occupation. Surprisingly, only a very small proportion of the returnees felt that capital accumulated overseas and foreign qualifications were of any significant value for their current job (Figure 4.4). When asked about the ways they transferred their knowledge and skills gained overseas for the development of their company, institute or business, the majority of them (about half) mentioned activities such as research and development, teaching and training, and changes in the work culture and environment. About one tenth of them felt that they helped by providing better services to their organization (Figure 4.5).

Figure 4.5 : Examples of skills, experience and knowledge gained overseas in the current employment (%)



Source: Field survey in India, 2011-2012

4.4 Social impact

Migration allows the individual to come into contact with others, whether they be natives or other immigrants. Migrants also carry certain aspects of their culture with them. This interaction would have obvious consequences in the societies they return to. However, the impact of such interactions largely depends on the "absorptive capacity" of the region (Cohen and Levinthal, 1990). Similarly, if the accommodating capacity of people in the home society with regard to knowledge brought from outside is limited, the benefits brought by the returnees cannot be adequately reaped (Bathelt et.al. 2004; Bastian, 2006). The present study attempts to examine the impact of foreign exposure on the standard of living of the families and the returnees themselves. The study also examines its impact on the society by looking at the influence they have on the people around them and on their position in society, and the maintenance of transnational ties.

Box 4.4: Another side of return

One of the respondents, who had been in Europe for more than a year and who returned after losing his job due to the recession, could not find a job in India appropriate to his qualifications. Being highly educated, the respondent expected a decent job in India matched to his qualifications but he did not succeed in finding one. This failure led to some frustration and distorted his perceptions about his position in society. This was further fuelled by the high expectations of his family.

Table 4.7: Change in the standard of living of returnees' family

Change in family's standard of living	Number of respondents	Percentage
Very negative	2	0.38
Negative	7	1.33
No change	182	34.54
Positive	239	45.35
Very positive	51	9.68
No answer	46	8.73
Total	527	100

Source: Field survey in India, 2011-2012

When asked about changes in the family's standard of living in the past five years due to their foreign exposure, more than half of the returnees (55 per cent) accepted that it had impacted their living standards in a positive way. Yet, quite a significant proportion of the respondents - more than one third – said there was no change (Table 4.7). This perception may be partly explained by the composition of our sample, in which the majority of migrants had been abroad for short periods. Furthermore, an overwhelming majority of the respondents (about 70 per cent) felt that foreign exposure had improved their position in society positively or very positively (Table 4.8). It is important to note that 12 respondents said that foreign exposure had impacted their position in the society in a negative way. Though not many of them were able to clarify the reasons for the negative impact, it had been observed during the interaction that the loss of a job in the destination country and subsequent engagement in low profile jobs in India after return, i.e., skill mismatch, could have been the reason behind this perception (Box 4.4).

Table 4.8: Impact of overseas exposure of returnees on their position in society

Impact of overseas exposures on the position in society	Number of respondents	Percentage
Very negative	4	0.76
Negative	8	1.52
Not much change	115	21.82
Positive	270	51.23
Very positive	96	18.22
No answer	34	6.45
Total	527	100

Source: Field survey in India, 2011-2012

In order to have an idea of the relationship between physical return and standard of living, non-migrants were asked to give their perceptions of this issue. As we can see in Table 4.9, more than half of the respondents (55.5 per cent) felt that having foreign exposure would enhance their family's standard of living. Notably, about one third of respondents felt that it would not enhance their standard of living.

Table 4.9: Impact of foreign exposure on the standard of living: the view of non-migrants

Enhancement of standard of living due to foreign exposure	Number of Non-migrants	Percentage
Yes	81	55.48
No	48	32.88
No answer	17	11.64
Total	146	100

Source: Field survey in India, 2011-2012

Table 4.10: Influence of returnees' and non-migrants' ideas on people around

Influence on People Around	Returnees		Non-migrants	
	Number of Respondents	Percentage	Number of Respondents	Percentage
No influence at all	28	5.31	7	4.79
Little influence	210	39.85	60	41.10
A lot of influence	249	47.25	73	50.00
No answer	40	7.59	6	4.11
Total	527	100	146	100

Source: Field survey in India, 2011-2012

About half of the respondents from both groups - returnees and non-migrants - felt that foreign exposure could have a 'lot of influence' on the people around them. Likewise, another 40 per cent felt that it would have 'little influence' (Table 4.10). Thus, it can be said that knowledge and experience gained abroad plays a significant role in the community. We also observed that minority and disadvantaged social groups show a higher interest and commitment to home country development. This may be partly explained by the fact that they face more discrimination in India and they would like to change this trend. This implies that the knowledge and social capital transferred by these people may directly affect development among the neediest communities as they are closely connected to the disadvantaged social groups of India. Therefore, this could promote balanced development in the country.

Regarding the role of networking with the overseas community, the study found that more than 80 per cent of returnees maintained their contacts after returning, the highest level being within the academic sector (Table 4.11). Returnees usually keep in contact with overseas colleagues and friends and discuss personal lives, professional and job related issues as well as education and training opportunities. For example, a returnee from Switzerland confirmed that his foreign colleagues were still in touch with him and he kept abreast of the latest happenings in terms of technological advancement, etc. He might also go to Switzerland again. A few of the returnees also keep an eye on diaspora activities in their former host countries.

Table 4.11 : Returnees maintaining contacts overseas, by sector

Sector	Yes		No		No Answer		Total	
	Number	percentage	Number	percentage	Number	percentage	Number	percentage
ICT	158	81.44	35	18.04	1	0.52	194	100
Finance & Management	54	90.00	6	10.00	0	0	60	100
Pharmaceutical/ Biotechnology	13	81.25	3	18.75	0	0	16	100
Medical	11	84.62	2	15.38	0	0	13	100
Academic	213	93.83	13	5.73	1	0.44	227	100
Other	12	100	0	0	0	0	12	100
Total	461		59		2		522	100

Source: Field survey in India, 2011-2012

4.5 Conclusion

The comparison of returnees and non-migrants in India provided a mixed picture of the perceived impact of return on development in India – some are positive, others indifferent. Out of the four channels of development - physical return, remittances and investment, knowledge transfer, and social impact - knowledge transfer was found to be the most important for highly skilled Indian returnees. Returnees from the academic sector usually transfer knowledge through their research contribution, whereas returnees from the ICT sector contribute to improving the work culture and institutional environment as a result of their exposure abroad. However, it is equally important to mention that there are several barriers related to the institutional, structural and attitudinal factors that hinder the transfer of knowledge. Furthermore, the developmental impact of remittances is difficult to capture through this study because of two reasons: first of all, the reluctance among returnees to reveal their financial information; and secondly, a significant proportion of remittances go to routine household items and other consumer durables, leaving negligible amounts for long term development spending. It is, however, important to note that it is not just the quantum of responses, but their qualifications as well, that need to be fed into policy making on migration and development to be initiated by the home country in the present case, India.

5. The Development Relationship of the Indian Diaspora in Europe with India: The Empirical Evidence from Europe

5.1 Migration motives

The migration of skilled Indians to France, Germany, The Netherlands or Switzerland is education and career motivated. Only a few choose their host country to follow family members (5.4 per cent) or had other motivations for coming. If we only consider those respondents who now work in the selected countries, whether in salaried employment or in self-employment, it is interesting to note that a large share first moved there for the purpose of studying (43.5 per cent). The share of professionals who entered through this a path-way is highest in France (55.2 per cent) and lowest in The Netherlands (26.2 per cent) (See Table 5.1). As a sign of the “two-step migration process” (OECD, 2010), skilled migrants first arrive as international students and in the second step, these students stay on in the national labour market as skilled professionals. All the observed destination countries have adapted their migration policies in order to retain international students and allow them to make the transition to the labour market. Foreign students are allowed to stay in the country for a period of six months in Switzerland and France, one year in The Netherlands and eighteen months in Germany to look for a job after completing their studies in the respective countries. Our study shows that around one third

of student respondents plan to stay on in the same host country after graduation. This share is highest in France (38.7 per cent), 33.3 per cent in Switzerland, 32 per cent in Germany and lowest in The Netherlands with 30.8 per cent.

Table 5.1: Main reason for migration to the host country for professionals (employed and self-employed)

Host country	France	Germany	Switzerland	The Netherlands	Total
Family reunification	6 (6.25%)	1 (2.04%)	6 (10.17%)	6 (14.29%)	19 (7.72%)
I came to study	53 (55.21%)	23 (46.94%)	20 (33.9%)	11 (26.19%)	107 (43.5%)
I found a job abroad on my own initiative.	18 (18.75%)	18 (36.73%)	25 (42.4%)	12 (28.57%)	73 (29.67%)
I wanted to start my own business.	3 (3.13%)	0	0	0	3 (1.22%)
I was sent by a company/institution.	10 (10.42%)	3 (6.12%)	3 (5.08%)	10 (23.81%)	26 (10.57%)
Other reasons	6 (6.25%)	4 (8.16%)	5 (8.47%)	3 (7.14%)	18 (7.32%)
Total	96 (100%)	49 (100%)	59 (100%)	42 (100%)	246 (100%)

Source: Field survey in Europe, 2011-2012

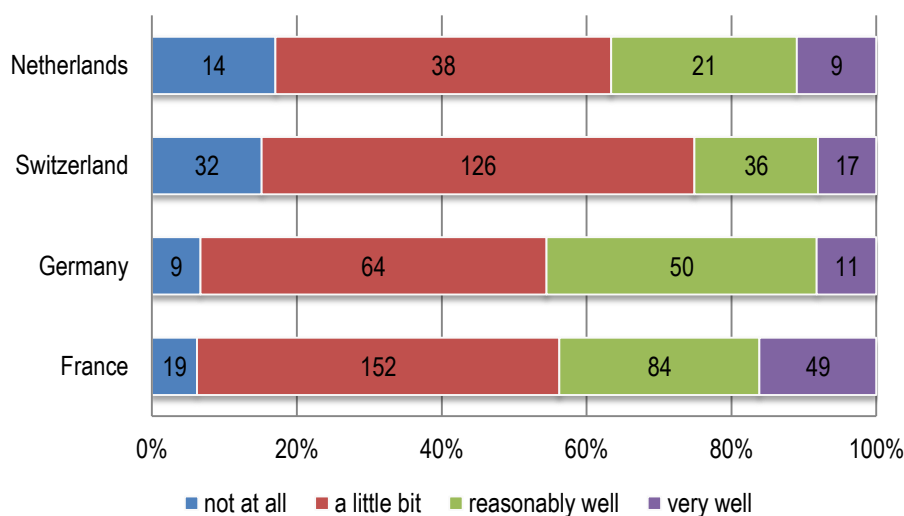
Our case study confirms the elasticity and multi-directionality of skilled mobility (Meyer, 2003). Before coming to their current host country, 43.2 per cent lived abroad at an earlier stage. As expected, those who are currently in education have had less migration experience: 37.5 per cent have lived abroad before, whilst among professionals, 50.6 per cent have previous experiences of living abroad. Certain preferences for staying in the same region are indicated, as more than half of the people with an earlier migration experience lived in another European country. Several respondents have lived abroad in different locations and have had a very mobile life. In general, their stay in Europe is of a temporary nature, especially in the case of the recent arrivals, and they see it as a step on their on-going movement to other destinations. Only 8 per cent of respondents said they would like to stay in their current destination country for more than five years, while 7 per cent say they would like to stay permanently. The rest are either undecided, or else they clearly say that they wish to stay for less than five years. In response to strong expectations of mobility for career progress of skilled persons (Ackers, no date), the decision to migrate is an exercise of choice, responding to job and academic opportunities. In this context, it is the prospect for professional growth that guides their future plans, rather than settlement in a particular geographical location. Given their (expected) continuous mobility, we examine whether scientists and skilled professional migrants experience their destination country as 'accidental tourists' (Mahroum, 2000), aloof from local life, or whether they take advantage and benefit from opportunities to obtain local human and social capital. Our interest in the level of engagement in localized social networks stems from the hypothesis that the mobilization of migrants' resources depends on the environment they are exposed to in the host countries and on the policies and structural settings that these countries have to offer.

5.2 Experiences in the host country

Well-established high-income migrants have a better ability to contribute to development initiatives in their country of origin (Newland and Agunias, 2008). As a measure of skilled Indians' establishment in host countries, we explore four dimensions of experiences: a) competence in the local language, b) membership of local organizations, c) satisfaction with living conditions and d) satisfaction with employment conditions for those respondents who are working abroad.

Proficiency and the use of the host country's language are one of the most important elements of social-cultural integration, and they form the basis for social contacts and help reduce the distance between immigrant communities and the rest of society (Vancluysen and Van Craen, 2010). Most skilled Indians work or study in English-speaking companies or research institutions, and so learning the local language is not necessary from a professional point of view. However, the need to speak the local knowledge differs between host countries. Figure 5.1 shows that the level of local language skills is considerably higher in Germany and France than in Switzerland or The Netherlands. While Switzerland and The Netherlands, with their highly internationalized education and work environment, make it easier for immigrants to create social networks without speaking the local languages, this is less the case in the larger countries. Moreover, knowledge of the local language is strongly linked to the duration of stay. Most of those skilled Indians who have converted their temporary stay into longer periods of residence in a particular country speak the local language either reasonably well or very well.

Figure 5.1: Knowledge of the local language



Source: Field survey in Europe, 2011-2012

Secondly, we look at whether Indian migrants joined any local organizations whilst abroad. We see a low level of interest in joining associations and this is especially pronounced among the student population. 61.2 per cent of them were not affiliated to any organization (See Table 5.2). Very few skilled Indians are interested in participating in diaspora or migrant organizations. Non-involvement in diaspora associations is related to the lack of an individual interest to engage in communities, a lack of time, the idea that involvement in such organizations prevents one from experiencing the culture of the host country, the expansion of globalization which facilitates a feeling of closeness to India without having to meet with co-nationals, as well as short-term stays in the host country (Tejada et al., forthcoming). The biggest interest is shown in organizations, which do not have gathering of Indians living abroad as their prime objective, such as professional organizations and local leisure organizations.

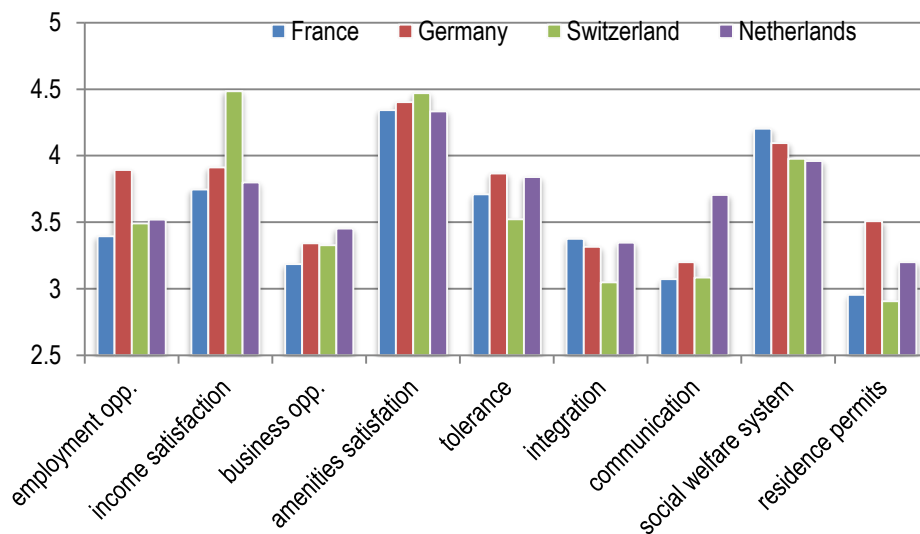
Table 5.2: Membership of local organizations in the host country

	Professionals (n=249)	Students (n=448)	Others (n=44)
Professional association	70 (28.11%)	86 (19.2%)	12 (27.27%)
Diaspora association	31 (12.45%)	20 (4.46%)	9 (20.45%)
Political	0	2 (0.45%)	3 (6.82%)
Humanitarian	26 (10.44%)	18 (4.02%)	4 (9.09%)
Local sports, music or other leisure organization	58 (23.29%)	75 (16.74%)	6 (13.64%)
Religious organization	12 (4.82%)	7 (1.56%)	6 (13.64%)
None	114 (45.78%)	274 (61.16%)	15 (34.09%)

Source: Field survey in Europe, 2011-2012

The migrants were asked to rank nine factors of living conditions on a five-point Likert scale, indicating the satisfaction they ascribe to each factor for the given host country (see Figure 5.2). Observing individual factor satisfaction, we notice a general agreement across the groups of respondents, with a few exceptions. We can see that all of them rank living environment and amenities very high. There is also an agreement on the least satisfying areas. The possibility to integrate and the possibility to communicate with the local population are ranked relatively low for all respondents, with the exception of The Netherlands. Not knowing the Dutch language is not a barrier to communication given the wide use of English and the level of fluency in that language among the Dutch. Moreover, satisfaction with obtaining a residence and work permit is ranked low. Those who wish to stay for a longer time are often faced with problems related to admittance procedures. On the other hand, those who do not have an interest in staying abroad longer, and who therefore have no need to obtain or renew a permit, are in general satisfied with the current situation for obtaining residence permits.

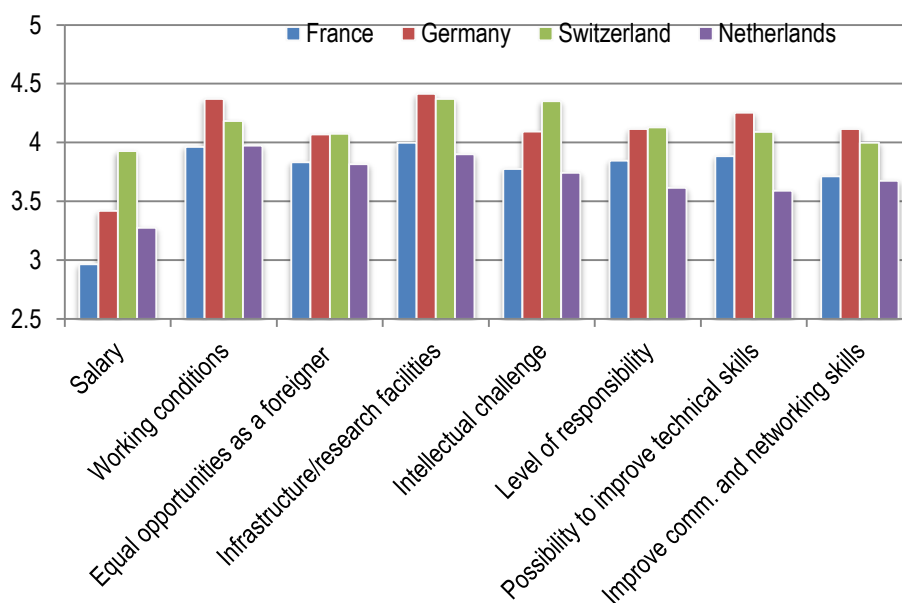
Figure 5.2: Satisfaction with local conditions (scale from 1-very unsatisfied to 5 -very satisfied)



Source: Field survey in Europe, 2011-2012

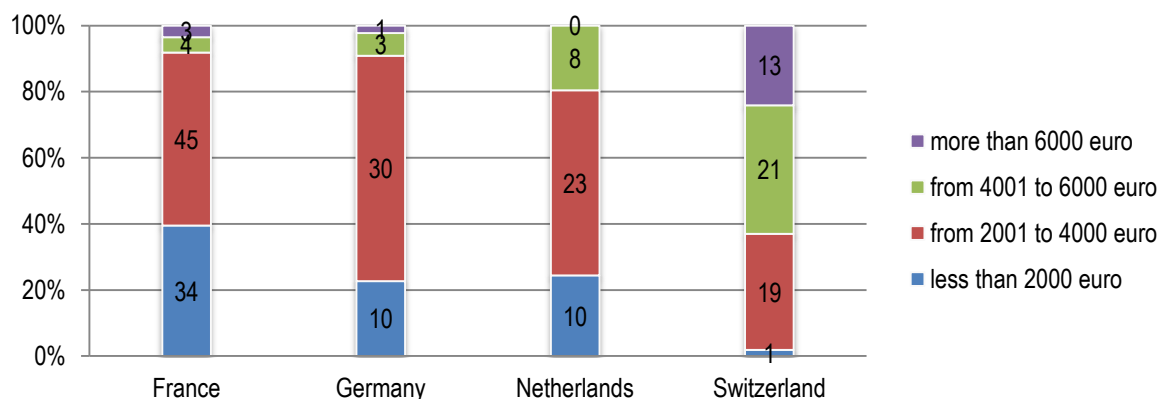
The fourth dimension for evaluating experiences abroad is only relevant for respondents who are currently working in the countries under review. When asked about satisfaction at work, professionals are relatively less satisfied with income levels and most satisfied with infrastructure and working conditions. Satisfaction clearly varies between countries. Indian professionals are in general more satisfied in Germany and in Switzerland, across all dimensions (see Figure 5.3). Indians in France express the lowest satisfaction with salaries and also have the highest incidence of reporting the feeling that their remuneration is inadequate. The income levels of the respondents differ greatly between host countries (Figure 5.4). The highest monthly income is received in Switzerland; more than 60 per cent of respondents in Switzerland are paid over 4000 euros (equivalent to 5000 Swiss Francs) per month. Such levels of income are earned by a minor share of respondents in the other three countries.

Figure 5.3: Satisfaction at work (scale from 1 very unsatisfied to 5 very satisfied)



Source: Field survey in Europe, 2011-2012

Figure 5.4: Reported monthly income after taxes and compulsory deductions by host country



Source: Field survey, 2011-2012

Even though the feeling of being overqualified for their current position is not predominant (21.8 per cent of employed respondents), it is relevant to explore the reasons for such an underutilization of skills, which does not help maximize the potential of the stay abroad. The most frequent reasons for feeling overqualified were a result of not working within their field of expertise, not being able to transfer Indian degrees and work experiences to Europe, or else feeling that their aspirations were being curtailed because of language barriers.

5.3 Development engagement

Within the migration and development nexus, the role of migrant communities overseas in home country development has increasingly found itself at the forefront of discussions (Kapur, 2010). There are many ways in which people living abroad can remain connected to their home country and contribute to its development. Skilled Indians abroad cultivate strong personal transnational links with India and they see the socio-economic development of their home country as something very important. The great majority of respondents maintain systematic daily links with family and friends and with former colleagues back in India. We observe commitments to development through engagement in four channels of migration for development: 1) financial channels, 2) knowledge transfer, 3) social remittances and 4) plans to physically return to the home country.

Half of the respondents have sent remittances home in the past 12 months. Money is sent home almost exclusively to family members. Differences in sending remittances are apparent between students and professionals. Only 39.3 per cent of students had sent money in the past year, while a higher proportion of professionals transfer money to someone back in their home country (68.7 per cent) (see Table 5.3). The total amounts sent rarely exceed €5000 within a twelve-month period. The most frequently mentioned reasons for sending money are related to daily consumption (15.8 per cent of respondents), accumulating savings (11 per cent) and covering educational costs (8.6 per cent).

While India is known as the world's top recipient of remittances (receiving an estimated \$55 billion in 2010) (World Bank, 2010), direct foreign investments from the Indian diaspora have not reached significant levels. Investments made in India during the period of t migrants' stay in Europe are much less common than the sending of remittances. We can observe that most skilled Indians in the four countries have not made any investments in their home country. Among those few direct investments, the most common ones are related to spending on housing and stock market investments and the purchase of land.

Table 5.3: Financial channels of development engagement

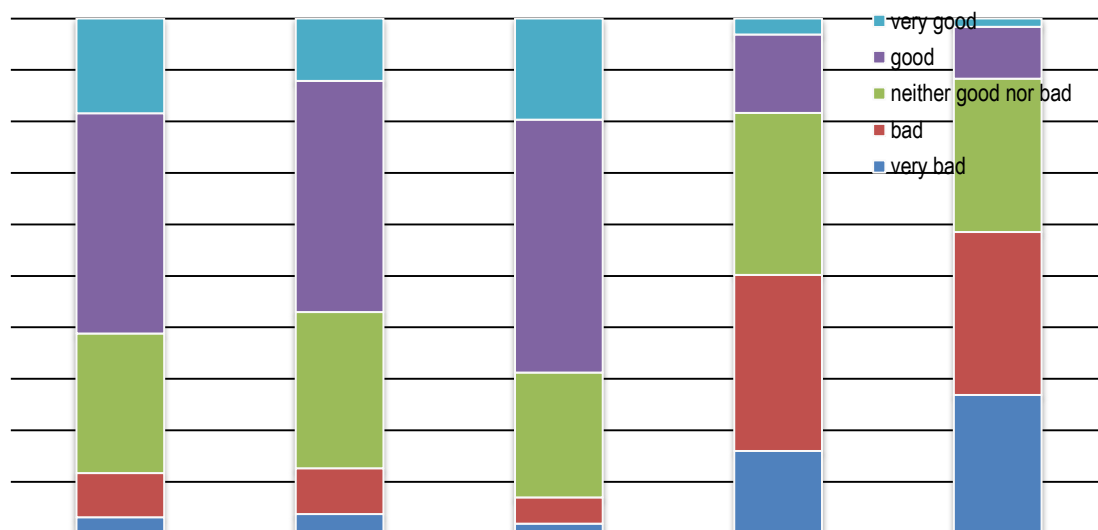
	Professionals	Students	Others
Have sent remittances in the past 12 months	156 of 227 (68.7%)	158 of 402 (39.3%)	13 of 36 (36.1%)
Have invested in India since moving to Europe	66 of 221 (29.9%)	38 of 396 (9.6%)	7 of 35 (20%)

Source: Field study in Europe, 2011-2012

As the second channel of development engagement we observe knowledge transfer through topics of discussion with people in India, through membership of professional organizations in the home country as well as through the frequency and purpose of visits. Besides common conversations about personal affairs and matters related to the political and social situation in India, 42 per cent of respondents said they frequently discussed issues concerning opportunities for professional and scientific collaboration. Job and training opportunities overseas are also a popular topic of discussion with people in India, as is the subject of business prospects in the home country. Diaspora knowledge networks, which bring together groups of scientists, engineers and skilled professionals, are seen as instruments with a significant influence in terms of knowledge transfer. Based on the logic of connectivity and the individual multiplier effect of participating in a common project (Meyer, 2011), the active involvement of these networks in science and technology advancements in the home countries is encouraged through the exchange of information, specialist knowledge transfer, joint research projects or training and technology assessment from a distance. Of all the respondents, only 11 per cent (70 respondents) are members of any professional organization in India. We find that skilled Indians lack a trust in the necessary structures and the enabling environment provided by their home country, and this may limit their institutional engagement and contribution.

As the third channel of engagement, social remittances occur in the shape of ideas, behaviours and social capital (Levitt, 1998), either through visits or returns to the home country, or by communication from a distance. The majority of respondents keep abreast of current social and political developments in India by following the news on a daily basis. 62 per cent of them say they discuss the political situation in India all the time or very often, although very few are engaged in political parties (only seven). When asked about membership of organizations in the home country, we find more interest in getting involved in humanitarian (67 respondents), leisure (47) and religious (27) organizations. Figure 5.5 clearly shows a disparity in perceptions between the economic and political situation in India. While employment and business opportunities as well as the educational system receive a favourable assessment, this is clearly not the case when it comes to the political and social situation. More than half the respondents rate it as bad or very bad. A change in the social and political structures of India was mentioned repeatedly as a prerequisite for the socio-economic development of India.

Figure 5.5: Assessment of the economic and political situation in India

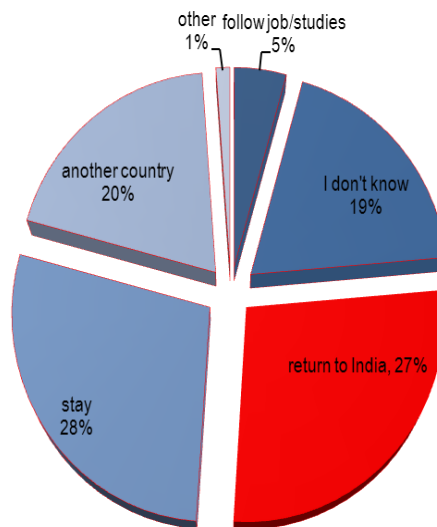


Source: Field survey in Europe, 2011-2012

Plans to return to the home country, as the fourth observed channel, are seen by our respondents as the most obvious tool for development. The migrants' specific return plans to accomplish their migration project back in their home country appeared as a crucial incentive for the positive feelings about their potential contribution to India's development. Two thirds of the skilled Indians in all the observed countries plan to return to India sometime in the future. When asked about the restricted time span of five years, much fewer reported this intention. Only 27 per cent plan to return to India within the next five years (Figure 5.6). 28.6 per cent say they will stay in their current host country and 20 per cent plan to move to another country, and of these most plan to move to another European country or to the United States. The rest have not made up their minds about their future plans and either say they will follow the best career opportunities or that they do not know where their location will be in the next five years. We can see that skilled Indians' migratory plans are kept flexible and follow a strategy where their options are kept open intentionally.

While this is a result of their uncertainty about the opportunities they will be offered in the future, their mobility plans may be determined both by the opportunities available and their perception of the environments in both the host and the home countries. Unlike professionals, students fall in line with expectations and are more likely to declare return plans. The return intentions of skilled Indians and the actual return may rise if they have greater confidence in India being able to offer them an enabling environment with good career opportunities and future prospects. As other empirical studies have shown, the more time one spends away from home, the less that person is expected to return. Plans for return do not seem to respond to a lack of options abroad, nor are they the result of a failed migration project, as they are often wrongly perceived by acquaintances in the home country. On the contrary, respondents who plan to return show an above-average satisfaction with their income situation abroad. Return plans are a response to a positive evaluation of the economic and professional opportunities that India has to offer, as well as a response to family ties. We can see that their mobility plans are mostly based on a combination of both professional and family factors.

Figure 5.6: Reported plans for the next five years (n=657).



Source: Field survey in Europe, 2011-2012

5.4 Conclusion

The mobilization of migrants' resources depends on the environment that they are exposed to in the host countries, as well as the policies and structural settings that these countries have to offer. It turns out that with low numbers of Indians in Continental Europe compared to the traditional immigrant countries, it is relatively more difficult to get involved in community groups, associations and networks, which are central to the success of long-distance collaboration. Our study shows a general low level of engagement in the local environment as well as with home-based organizations, and this calls for a further commitment to get the skilled diaspora involved so that they can develop further capacities during their stay abroad. While skilled migrants are satisfied with the working and educational environment in overall terms, there is less satisfaction in terms of their social surroundings. Skilled Indians have high hopes for their migration project and its effect on their career and their academic progress. While many Indian students and professionals plan to return to their home country, they wish to benefit from an international working experience before going back. Indian students in science and engineering disciplines in particular are more likely to continue working in these countries upon completion of their studies, especially in sectors where there are labour shortages. The desire to contribute to the development of India is quite pronounced among people in academia, especially those who have been abroad for a short time. Even though Indians see the regional and national development of their home country as something that is very important, quite often they do not know how they can personally contribute, or they lack trust in the necessary structures in India. Accordingly, personal enthusiasm and efforts should be met with an enabling environment and with supportive policies from both sides, making it easier and more inviting for individuals to participate in institutionalized collaboration. Hence, it can be argued that the ability to mobilize is a crucial factor in terms of enabling diasporas to function.

6. Policy Initiatives towards Diasporas and Skilled Migrants

In view of the increased recognition of the potential development impact of diasporas, countries of origin are making an effort to initiate dialogue with their communities abroad in order to reinforce transnational ties. In the specific case of India, in recent years the Indian government has changed its attitude towards engaging with Indians living abroad, and this has resulted in an increasing number of specific policy initiatives aimed at fostering cooperation and benefitting from interaction with the diaspora. Similarly, European destination countries are conscious of the role that skilled migrants can play in adding to their stock of human capital and to increasing their competitiveness. As a result, they are introducing diverse measures designed both to attract foreign talent and capitalize on the resources of skilled migrants.

6.1 Initiatives by the Indian government

The Indian government recognizes the potential gains the country can obtain from collaborating with the diaspora, while it also believes that India has a sufficient capacity to host outcomes of such cooperation. As a result, it has implemented good examples of policy strategies to capitalize on the resources of the Indian diaspora. For example, following the recommendations of the Report of the High Level Committee on Indian Diaspora, a separate ministry dedicated to the global community of people of Indian origin, the Ministry of Overseas Indian Affairs (MOIA) was set up. Furthermore, the Overseas Indian Facilitation Centre (OIFC) was set up in the year 2007. Most of the measures on the part of the Indian government are mainly initiated and operated through these two nodal bodies. Important initiatives of the MOIA include the Indian Development Foundation (IDF), The Global Indian Network for Knowledge (Global-INK), the Overseas Citizenship of India (OCI) Scheme, Know India Programme (KIP) and Study India Programme (SIP), Overseas Indian Centres, India Centre for Migration. One of the most important initiatives of MOIA is the Pravasi Bharatiya Divas, i.e., Expatriate Indians Day (see Box 6.1).

Box 6.1: Pravasi Bharatiya Divas.

The Government of India celebrates *Pravasi Bharatiya Divas* (PBD) on 9th January each year to mark the contribution of overseas Indian communities to the development of India. This day is chosen to celebrate the occasion as Mahatma Gandhi returned to India from South Africa on this day in 1915. PBD conventions have been held every year since 2003 and are aimed at providing a platform for the overseas Indian community to engage in mutually beneficial endeavours with the government and the people of the land of their ancestors. The *Pravasi Bharatiya Samman* award is also presented at this event in appreciation of their contribution to their adopted land as well as to the growth story of India.

Source: <http://moia.gov.in/>

While MOIA is an fully public, government body, the OIFC is based on the public-private partnership (PPP) model between the MOIA and the Confederation of Indian Industry (CII), with a specific emphasis placed on attracting investment and expanding the economic engagements of overseas Indians with India. The Indian government is still building on these promising initiatives to formulate a comprehensive policy on labour migration and overseas employment as a means of tapping into the resources of the Indian diaspora. An important noticeable hindrance is the lack of data and information regarding Indian returnees and diaspora. To overcome this, the government of India could work in a coordinated manner in collaboration with its missions abroad to develop a framework where they can collect and maintain a data base on Indians in the main destination countries, including flows and stocks, as well as information regarding their activities and occupations.

6.2 Initiatives in selected European countries

The four European destination countries selected for our study, France, Germany, The Netherlands and Switzerland have experienced a rise in Indian immigration in recent years. These countries have shown an increasing awareness of the value of skilled personnel from abroad in the sense that it could help them to fill skills shortages in specific sectors and thereby increase their global competitiveness. As a result, they are adapting their immigration policies to attract a more skilled labour force. Admitting skilled people on a permanent basis or allowing them to stay for longer periods, permitting dual citizenship, simplifying hiring procedures for non-EU country nationals in shortfall sectors, providing favoured treatment for skilled people with a previous in-country experience, and encouraging circular migration are some of the newly adopted measures in this regard. All four countries are also adopting explicit targeted policies to attract gifted foreign students as prospective knowledge workers enabling their recruitment through facilitated immigration schemes. Significant differences can be perceived between countries in terms of the pace and emphasis of the adapted policies (see Box 6.2).

In addition to changes in immigration policies, these countries have signed various bilateral cooperation agreements with India, which facilitate the mutual exchange of knowledge. Both policies and institutional settings matter in terms of their attractiveness for skilled migrants. Therefore, the countries under review also try to influence the environment that migrants are exposed to in the host countries, thereby enhancing transnational activities with their home country.

Box 6.2: Admission policies and measures for skilled migrants under the legislation of selected European countries

Box 6.2: Admission policies and measures for skilled migrants under the legislation of selected European countries				
Valid migration legislation		Main measures for skilled migrants	Naturalization policies	Specificities for international students
France	<ul style="list-style-type: none"> Policy of "chosen immigration" New Immigration and Integration Law passed in 2006 	<ul style="list-style-type: none"> "Skills and talent" visa for skilled people, conditional upon them returning to the home country within six years. "Employee on assignment" permits for employees of multi-national companies earning a gross salary equal to 1.5 times the minimum wage. Definition of a list of shortfall sectors for which employers can hire "third country nationals" without limitation. 	<ul style="list-style-type: none"> Dual citizenship permitted. Two types of naturalization: facilitated (for spouses of French nationals) and regular (requiring five years residence, or two years if third level education was completed in France, and language competences). 	<ul style="list-style-type: none"> Foreign students are allowed to stay for up to six months after completing their studies to look for employment. If the person gets a job within this period, he/she can immediately apply for a "Skills and talent" visa.
	<ul style="list-style-type: none"> 2005 Residence Act (Aufenthaltsgesetz, section 19). 	<ul style="list-style-type: none"> Three types of residence permits: short-term; settlement; and permanent EU residency. Easy path to permanent residence for highly skilled professionals with a guaranteed annual minimum salary and for investors. 	<ul style="list-style-type: none"> Dual citizenship is possible but is the exception; no legal right to dual citizenship. 	<ul style="list-style-type: none"> Foreign students are allowed to stay for up to eighteen months after completing their studies to look for employment.
	<ul style="list-style-type: none"> Knowledge Migrant Scheme introduced in 2004. 	<ul style="list-style-type: none"> Allows for rapid admission procedures and the granting of various residential and socio-economic rights to highly skilled professionals with a guaranteed annual minimum salary. 	<ul style="list-style-type: none"> Dual citizenship is restricted. All non-EU/EEA immigrants, including knowledge migrants, have to pass an integration examination. 	<ul style="list-style-type: none"> Foreign students are allowed to stay for up to twelve months after completing their studies to look for a job. Graduates from a Master's or a PhD programme at a Dutch university can get a one-year residence permit within three years after graduation and look for employment.
	<ul style="list-style-type: none"> New Foreign National Act in force since 2008 gives priority to skilled workers. 	<ul style="list-style-type: none"> Priority admission for employment to workers from the EEA region. Admission of third country nationals based on skills' level and their (expected) capacity for long term social and economic integration. No special recruitment mechanisms for skilled workers. 	<ul style="list-style-type: none"> Dual nationality permitted. Two types of naturalization: facilitated (for spouses of Swiss nationals), and regular (requiring: 12 years residence, integration in Swiss environment, and familiarity with Swiss culture). 	<ul style="list-style-type: none"> Foreign students are allowed to stay for up to six months after completing their studies to look for employment. Easy path to residence permit for foreign students with previous in-country experience.

7. Summary Observations and Recommendations

7.1 Key findings and their policy implications

- Knowledge transfer was considered to be the most important of the four development engagement channels i.e., physical return, financial transfers, knowledge transfer, and social impact. In case of the diaspora, physical return was widely perceived as a necessary condition for the transfer of knowledge.
- Indian students and researchers in Europe link their development aspirations to their return plans and believe that Indian society can benefit from their scientific networks and expertise but the results of the Indian data show that returnees face a number of obstacles within the local system once they are back in India. Some of the obstacles that we identified in this study include the local work culture, a resistance to change, the lengthy bureaucratic process, and a lack of suitable infrastructure. Such obstacles have implications for employers as well as for policy makers.
- Migrants' mobility plans are determined by both personal and structural conditions. Available opportunities and perceptions of the environments in both the home and the host countries determine migration decisions, including the possible return to the home country. The return intentions of skilled Indians and those actually doing so may increase if there is a belief that India can provide an enabling economic environment with adequate career and future prospects.
- Indians abroad find it difficult to involve themselves in institutional networks as the outreach of these networks is often limited to selected groups and there is a dearth of participatory and inclusive approaches. Diaspora institutions should avoid creating insider groups. Policies should also encourage bottom-up initiatives. In addition, the government of India does not have a policy to engage with, and support skilled returnees to organise themselves in networks. Thus, the necessary supportive initiatives should be put in place.
- A large part of return migration seems to be primarily driven by the employers as most of the returnees in the present study had gone abroad on short-term projects/assignments where return was an inherent part of their work contract. Migration policy should therefore take note of this particular kind of short term specific migration projects to capitalize on their development effects for India.
- One of the important factors that induced return was family; a significant number of returnees came back to reunite with their families and found themselves professionally 'frustrated'. The average length of migrants' stays abroad has been declining over time and this is resulting in individual migration rather than family migration. Bearing in mind that this is an outcome of the temporisation of migration, immigration policies that are geared towards retaining talent should consciously promote measures that facilitate family migration rather than individual migration.
- The majority of returnees (as well as non-migrants) preferred to locate themselves in the selected cities in India because these cities offered superior educational and research opportunities and provided a better cosmopolitan environment commensurate with the cities of the developed destination countries. Accordingly, in the present study, return has been found to be induced by the pull of emerging employment opportunities in those cities. Enhancing employment opportunities along with improved infrastructure in smaller cities and towns in India should therefore be a policy priority to channel return migration for a balanced regional development.
- A large part of the remittances was spent on routine family related needs, leaving little for long-term investments. The spending patterns of returnees and non-migrants were found to be similar, as both groups preferred to spend on housing and consumer durables.
- Minority groups show a greater commitment to the development of the home country, and this was also the case of women, religious minorities as well as scheduled castes. In order to promote human resource development among the disadvantaged communities in India, European countries should aim at designing policies that give preferential treatment to candidates from these communities; for example by targeting scholarship programmes, admission policies at universities and educational institutes and by adopting equal opportunity policies suited to Indian social realities. This implies that knowledge transfer by these people would directly affect development among most needy communities as they are intimately connected to the disadvantaged social groups of India. In this way, it can promote balanced development in India.

- A majority of diaspora and returnees were found to have little knowledge of the various initiatives undertaken by the Indian government to engage with its diaspora. The government of India may wish to improve its communication about its policies for the diaspora community.

7.2 Limitations of the study

The analysis in the study is subject to certain limitations:

- The study was carried out under a variety of methodological constraints such as limited duration, limited number of sectors/professions, limited geographical coverage in terms of number of locations (six major cities in India and four destination countries in Europe) with regard to the conducting the field work, and a limited sample size from each selected sector/profession and location. Therefore, we cannot claim that the sample is representative of the entire Indian skilled migrant and return population.
- In the sampling strategy in Europe, we were more successful in certain countries and this led to an underrepresentation of responses from skilled Indians in Germany, whereas for the sample of the study in India we have few responses from the pharmaceutical industry and the financial and management sector due to difficulties accessing respondents.
- In all the sectors except academia, it was very difficult to arrange appointments through formal channels with returnees and non-migrants because of entry barriers within their organizations. Accordingly, a majority of respondents were contacted through informal channels. Consequently, at times the field investigators had to complete the survey within a sub-optimal duration of time.
- Regarding the development impact of skilled Indian returnees and skilled Indians abroad, the study focused on four channels of engagement: physical return; remittances and investments; knowledge transfer; and social impact. It was difficult to identify the social impact of skilled Indians due to the multiple ways of social influence which is difficult to capture through our study. Moreover, the information that the study was able to gather on financial matters such as remittances and investment was limited due to the reluctance of a significant number of respondents to disclose their financial details.
- The study only focuses on individual perceptions and aspirations of the development impact, and does not include the perception of stakeholders influenced both from the larger society and from their immediate circles (family members, employers, colleagues, students). The study could benefit further from examining the influenced ones.
- The limitations of the survey with regard to data collection did not allow us to use standard econometric techniques. Therefore we restricted ourselves to basis exploratory data analysis.
- These limitations put a restriction on the scope and the chances of extrapolating the results of the present study to other situations. Therefore, the findings of the study should be used with caution when making generalizations.

7.3 Suggestions for future research

- Longitudinal studies with large and diverse samples of skilled Indian migrants including other sectors (social sciences and academia in general and the social sector –NGOs and civil society at large) could be undertaken to examine more holistic linkages between return migration, the diaspora and development within the Indian context.
- Studies could also be undertaken to compare private and public institutions/firms in order to gain a better understanding of skilled migrants' contributions to each type of institution.
- Further studies that go into greater depth on the social and cultural aspects, changing power relationships, and the impact that skilled migration has on family structures and caste rigidities could be conducted. To broaden perceptions on return migration and its complexities and varied realities there is a need to focus further on the migrants who continue to leave in search of better livelihoods, social security and cultural exchange. Sociological and anthropological methods could be applied to get a more holistic view regarding Indian skilled migration and its development impact.
- In the present study, in relation to the migration and development nexus, the emphasis was only placed on highly skilled Indian personnel. Comparative studies might also be undertaken to consider migrants from other skill categories.

References

- Abella, M. (2006). Global competition for skilled workers and consequences. Kuptsch, Ch. and Pang, E.F. (eds.), *Competing for global talent*, 11-32. Geneva: ILS and ILO.
- Ackers, L. (no date). Moving people and knowledge: the mobility of scientists within the European Union.
- Adams, R. (2003). International migration, remittances and the brain drain. A study of 24 labor-exporting countries. Policy Research Working Paper 3069. Washington DC: World Bank.
- Afram, G.G. (2012). *The remittance market in India: opportunities, challenges, and policy options*. Washington DC: The World Bank.
- Agunias, D.R. (2006). Remittances and development: trends, impacts and policy options. A review of the literature. Washington DC: Migration Policy Institute.
- Ammassari, S. and Black, R. (2001). Harnessing the potential of migration and return to promote development: applying concepts to West Africa. *IOM Migration Research Series No. 5*. Geneva: IOM.
- Appleyard, R. (1992). International migration and development. An unresolved relationship. *International Migration*, 30, 3-4, 251-266.
- Bastian, D. (2006). Modes of knowledge migration: regional assimilation of knowledge and the politics of bringing knowledge into the region. *European Planning Studies*, 14, 5, 601-619.
- Bathelt, H., Malmberg, A. and Maskell, P. (2004). Clusters and knowledge: local buzz, global pipelines and the process of knowledge creation. *Progress in Human Geography*, 28, 1, 31-56.
- Beaverstock, J. V. and Smith, J. (1996). Lending jobs to global cities: skilled international labour migration, investment banking and the city of London. *Urban Studies*, 33, 1377-1394.
- Black, R., King, R., Litchfield J., Ammassari S., and Tiemoko, R. (2003). Transnational migration, return and development in West Africa. Sussex: Sussex Centre for Migration Research.
- Bovenkerk, F. (1974). *The sociology of return migration*. The Hague: Nijhoff.
- Brinkerhoff, J. M. (ed.) (2008). *Diaspora and development: exploring the potential*. London: Lynne Rienner Publishers.
- Buga, N. and Meyer, J-B. (2012). Indian human resources mobility: brain drain versus brain gain. CARIM-India Research Report 2012/4. Robert Schuman Centre for Advanced Studies; European University Institute.
- Cadwell, J. C. (1969). *African rural-urban migration: the movement to Ghana's towns*. Canberra: Australian National University Press.
- Campus France (2010). Les dossiers pays Campus France : Inde. Campus France country dossier No. 2, April 2010. <http://www.campusfrance.org/fr/ressource/les-dossiers-pays-campusfrance-inde>. Accessed 10 Nov. 2012
- Cassarino, J-P. (2004). Theorising return migration: a conceptual approach to return migrants revisited. *International Journal on Multicultural Societies*, 6, 2, 253-279.
- Castles, S., and Kosack, G. (1973). *Immigrant workers and class structure in Western Europe*. London: Oxford University Press.
- Castles, S. and Miller, M. J. (2009). *The age of migration*. UK: Palgrave-Macmillan.
- Cerase, F. P. (1974). Expectations and reality: A case study of return migration from the United States to southern Italy. *International Migration Review*, 8, 2, 245-262.
- Chacko E. (2007). From brain drain to brain gain: reverse migration to Bangalore and Hyderabad, India's globalizing high tech cities. *GeoJournal*, 68, 2/3, 131-140.
- Chilivumbu, A. (1985). *Migration and uneven rural development in Africa: The case of Zambia*. Lanham: University Press of America.
- Cohen, W. L. and Levinthal, D. A. (1990). Absorptive capacity: A new perspective on learning and innovation. *Administrative Science Quarterly*, 35, 1, 128-152.

- Constant, A. and Massey, D. (2002). Return migration by German guest workers: Neoclassical versus new economic theories. *International Migration*, 40, 4, 5-38.
- Cox, K. and Golledge, R. (1969). *Behavioural problems in geography: A symposium*. Evanston: Northwestern University Press.
- Demko, D. (1974). Cognition of southern Ontario cities in a potential migration context. *Economic Geography*, 50, 1, 20-34.
- Faist, T. (2008). Migrants as transnational development agents: An enquiry into the newest round of the migration-development nexus. *Population, Space and Place*, 14, 21-42.
- Fawcett, J. T. and De Jong, G.F. (1982). Reasons for moving and migration behaviour. In U.N., ESCAP, National Migration Surveys, 10, 109-131. New York: UN.
- Federal Statistical Office, Germany: www.eds-destatis.de/en_index. Accessed 10 March. 2013
- Finegold, D., Venkatesh, K., Winkler, A., and Argod, V. (2011). Why they return? Indian students in the United States. In *Economic and Political Weekly*, 46, 21, 21-25.
- Fischer, P. A., Martin, R. and Straubhaar, T. (1997). Interdependencies between development and migration. Hammar, T. Brochmann G., Tamas, K. and Faist, T. (eds.), *International migration, immobility and development. Multidisciplinary perspectives*, 91-132. UK: Berg.
- Fromhold-Eisebith, M. (2002). Qualified labour migration and regional knowledge economies. Haytor, R. and Le Heron, R. (eds.), *Knowledge, industry and environment: Institutions and innovation in territorial perspective*, 125-143. Aldershot: Ashgate.
- GCIM (2005). *Migration in an interconnected world: New directions for action*. Switzerland: GCIM.
- Gmelch G. (1980). Return migration. *Annual Review of Anthropology*, 9, 135-159.
- de Haas, H. (2006). Engaging diasporas. How governments and development agencies can support diaspora involvement in the development of origin countries. Oxford: University of Oxford, International Migration Institute.
- de Haas, H. (2010). Migration and development: A theoretical perspective. *International Migration Review*, 44, 1, 227-264.
- Haberkorn, G. (1981). The migration decision-making process: Some social-psychological considerations. De Jong, G. F. and Gardner, R. W. (eds), *Migration decision making*, 252-278. New York: Pergamon.
- ILO (2004). Towards a fair deal for migrant workers in the global economy. International Labour Conference, 92nd Session, Report VI. Geneva: ILO.
- Industry Canada (2008). International mobility of skilled workers: A synthesis of key findings and policy implications. Ottawa: Human Resources and Social Development Canada.
- IOM (2005). *World Migration Report 2005: costs and benefits of international migration*. Geneva: IOM.
- Kapur, D. (2003). Indian diaspora as a strategic asset. *Economic and Political Weekly*, 38, 5, 445-448.
- Kapur, D. (2010). *Diaspora development and democracy. The domestic impact of international migration from India*. New Jersey: Princeton University Press.
- Khadria, B. (1999). *The Migration of knowledge workers: Second-generation effects of India's brain drain*. New Delhi: Sage.
- Khadria, B. (2001). Shifting paradigms of globalization: The twenty-first century transition towards generics in skilled migration from India. *International Migration*, 39, 5, 45-71.
- Khadria, B. (ed.) (2009). *India Migration Report 2009: past, present and the future outlook*. IMDS Project, JNU. New Delhi: Cambridge University Press.
- Khadria, B. (ed.) (2012). *India Migration Report 2010-2011: the Americas*. New York: Cambridge University Press.
- King, R. (1986). Return migration and regional economic development: An overview. King, R. (ed.), *Return migration and regional economic problems*, 1-37. London: Croom Helm.

- King, R. (2000). Generalizations from the history of return migration. Ghosh, B. (ed.), *Return migration: journey of hope or despair?* 7-56. Geneva: IOM and UN.
- Klagge, B. and Klein-Hitpass, K. (2010). High-skilled return migration and knowledge-based development in Poland. *European Planning Studies*, 18, 10, 1631-1651.
- Kuption, Ch. (2006). Students and talent flows. The case of Europe: from castle to harbour? Kuption, Ch. and Pang E.F. (eds.), *Competing for global talent*, 33-61. Geneva: ILS and ILO.
- Laumann, E. O., Galaskiewicz, J. and Marsden, P. V. (1978). Community structure as interorganizational linkages. *Annual Review of Sociology*, 4, 455-484.
- Levitt, P. (1998). Social remittances: migration-driven local-level forms of cultural diffusion. *International Migration Review*, 32, 4, 926-948.
- Lewis, G. J. (1982). *Human migration: A geological perspective*. London: Croom Helm.
- Lowell, L. and Gerova, S.G. (2004). *Diasporas and economic development: state of knowledge*. Washington DC: Georgetown University, Institute for the Study of International Migration.
- Mahroum, S. (2000). Highly skilled globetrotters: mapping the international migration of human capital. *R&D Management*, 30, 1, 23-32.
- Majumdar, Tapas (1994). Old world is the new world, *The Telegraph*, Calcutta, 8 August.
- Meyer, J-B. (2001). Network approach versus brain drain: lessons from the diaspora. In *International Migration*, 39, 5, 91-110.
- Meyer, J-B. (2003). Policy implications of the brain drain's changing face. *Science and Development Network*. <http://www.scidev.net/en/policy-briefs/policy-implications-of-the-brain-drain-s-changing-.html>. Accessed 10 Nov. 2012
- Meyer, J-B. (2011). A sociology of diaspora knowledge networks. Faist, T. Fauser, M and Kivisto, P. (eds.), *The migration-development nexus. A transnational perspective*, 159-181. Basingstoke: Palgrave McMillan.
- MOIA (2012). Annual report 2011-12, Ministry of Overseas Indian Affairs. New Delhi: Government of India.
- Mosneaga, A. (2010). Linking international student mobility to skilled migration: the case of Denmark. *International Journal of Contemporary Sociology*, 47, 1, 98-118.
- Mukherjee, S. and Chanda, R. (2012). Indian student mobility to European countries. An overview. CARIM-India Research Report 2012/12. Robert Schuman Centre for Advanced Studies; European University Institute.
- Newland, K., Agunias, D.R. and Terrazas, A. (2008). *Learning by doing: experiences of circular migration*. Washington, D.C.: Migration Policy Institute.
- NUFFIC (2012). *Mobiliteit in beeld 2012: Internationale mobiliteit in hetNederlandsehogeronderwijs*.
- OECD (2010). *International Migration Outlook: Annual Report 2010*. Paris: OECD.
- OECD (2011). *Education at a glance*, OECD indicators, OECD Publishing. <http://dx.doi.org/10.1787/eag-2011-en>. Accessed 10 Nov. 2012
- Ratha, D. and Silwal, A. (2012). Migration and Development Brief 18, Migration and Remittances Unit. Washington DC: The World Bank.
- Reichlová, N. (2005). Can the theory of motivation explain migration decisions? UK FSV – IES Working Paper No. 97. Prague: Charles University in Prague.
- Russell, S. S., Jacobsen, K. and Stanley, W. D. (1990). International migration and development in Sub-Saharan Africa. *World Bank Discussion Papers 101*. Washington DC: The World Bank.
- Saxenian, A. (2006). *The new Argonauts: regional advantage in a global economy*. Cambridge MA: Harvard University Press.
- Sell, R. R. and De Jong, G. F. (1978). Toward a motivational theory of migration decision making. *Journal of Population*, 1, 313-335.

- Stark, O. (1991). *The migration of labour*. Cambridge: Basic Blackwell.
- Swiss Federal Office of Statistics. <http://www.bfs.admin.ch/bfs/portal/en/index.html>. Accessed 10 Nov. 2012
- Taylor, R. C. (1969). Migration and motivation: A study of determinants and types. In J. A. Jackson (ed.), *Migration*, 99-133. Cambridge: Cambridge University Press.
- Tejada, G. (2012). Mobility, knowledge and cooperation: Scientific diasporas as agents of development. *Migration and Development*, 10, 18, 59-92.
- Tejada, G. and J-C. Bolay (eds). (2010). *Scientific diasporas from developing countries in Switzerland: empirical evidence and policy responses. Skilled migrants from Colombia, India and South Africa in Switzerland as partners in development*. Bern: Peter Lang.
- Tejada, G., Hercog, M., Kuptsch, C. and J-C. Bolay (2014). The link with a home country: A comparative analysis of host country environments for diaspora engagement. Sahoo, S. and Pattanaik, B.K. (eds.), *Global diasporas and development: socio-economic, cultural, and policy perspectives*, 39-68. New Delhi: Springer.
- Vancluysen, K. and Van Craen, M. (2010). Integration and perceived discrimination: two competing hypotheses tested among persons of Moroccan and Turkish descent in Belgium. Paper presented at QMSS2/ESF Seminar Measuring Integration and Discrimination, Paris, 5-6 July 2010.
- Wadhwa, V., Saxenian, A., Freeman, R., Gereffi, G. and Salkever, A. (2009). America's loss is the world's gain. US: The Kauffman Foundation.
- Wickramasekara, P. (2010). Development, mobility, and human rights: rhetoric and reality. *Refugee Survey Quarterly*, 28, 4, 165-200.
- Wolpert, J. (1964). The decision process in spatial perspective. *Annals of the Association of American Geographers*, 54, 220-229.
- Wolpert, J. (1965). Behavioural aspects of the decision to migrate. *Annals of the Regional Science Association*, 15, 159-172.
- World Bank (2010). Migration and remittances fact book. <http://siteresources.worldbank.org/INTPROSPECTS/Resources/334934-1199807908806/Top10.pdf>. Accessed 10 Nov. 2012.
- Yap, L. Y. L. (1977). The attraction of cities. *Journal of Development Economics*, 4, 246-292.
- Yeoh, B. and Chang, T. C. (2001). Globalising Singapore: Debating transnational flows in the City. *Urban Studies*, 38, 1025-1044.
- Yingqi, Wei and Balasubramanyam, V. N. (2006). Diaspora and development. *The World Economy*, 29, 11, 1599-1609.
- Yusuf, S. and Wu, W. (2002). Pathways to a world city: Shanghai rising in an era of globalization. *Urban Studies*, 39, 1213-1240.

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Appendices

Appendix 2.1: Questionnaire for returnees

Appendix 2.2: Questionnaire for non-migrants

Appendix 2.3 : Questionnaire for skilled Indians in Europe

Appendix 2.1: Questionnaire for returnees

Research Project on

Migration, Scientific Diasporas and Development
Impact of Skilled Return Migration on Development in
India

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1

Migration, Scientific Diasporas and Development Impact of
Return Skilled Migration on Development in India

Section 1: Current employment situation

SI No.	Questions	Options	Codes
1.	What is the name of the firm/institution of your current employment? Always mention full form of names of firms.		
2.	What is your present occupation/designation? Always mention exact designation.		
3.	What is your position at the current employer? Please choose one that suits best your position.	a) Managerial b) Technical c) Researcher d) Others	1 2 3 98
4.	Please specify your position as Senior Level or Middle Level or Entry Level.	a) Senior Level b) Middle Level c) Entry Level	1 2 3
5.	What is the type of your firm/institution?	a) I am working for a multinational firm/institution b) I am working for a national firm/ institution c) I am employed in an academic and research institution d) I am Self employed e) Others	1 2 3 4 98
6.	What is the sector/functional area of your current employment?	a) Information & communication technology b) Financial & management sector c) Pharmaceutical/Biotechnology d) Medical e) Others	1 2 3 4 98
7.	Total emoluments per month (in Rupees)	a) Below 25000 b) Between 25000 to 35000 c) Between 36000 to 50000 d) Between 51000 to 75000 e) Between 76000 to 100000 f) Above 100000 g) I do not reveal my income	1 2 3 4 5 6 7
8.	To what extent are you satisfied with your present employment/business?	a) extremely dissatisfied b) moderately dissatisfied c) indifferent d) moderately satisfied e) extremely satisfied	1 2 3 4 5

Comment:

2

9.	To what extent are your employer and colleagues satisfied with your skills, experience, knowledge and ideas?	a) extremely dissatisfied b) moderately dissatisfied c) indifferent d) moderately satisfied e) extremely satisfied	1 2 3 4 5
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Section 2: Information related to Out-migration/On-site assignment

1.	How long you lived outside of India?	a) Less than 6 months b) 6 months to 1 year c) 1 year to 2 years d) More than 2 years	1 2 3 4
----	--------------------------------------	--	------------------

2. Please provide the following information about your most important visit(s) abroad
Instruction: Please write the most applicable codes regarding type of visa and engagements during stay abroad from the code list given below the table.

1	2	3	4	5	6	7
SL NO	Name of Country/ies	Type of visa	From (month/year)	To (month/year)	Effective (see note) Duration of stay (in months)	Engagements during stay abroad
1						
2						
3						
4						

Codes for Column 3 (Visa Types): 1- student visa , 2- employment visa, 3- family reunification visa , 4- permanent residence permit , 5- tourist visa , 6- other, specify
Codes for Column 7 (Engagements during stay abroad): 1- Higher studies , 2- Employment by own initiative , 3- Project assignment/Research Assignments / internship , 4- Accompanying a family member/partner , 5- Any others (Please specify)
Codes for column 4 & 5 (from – to): (-99)–who forgot the particular date
(Note: 'effective' stay means the actual stay in the job in the destination country excluding unpaid vacation, time spend for switching jobs.)

Comment:

3

3 .Please, identify which of the above mentioned stays abroad you consider most relevant for your personal development. _____ (Write the sr. code from Q.2)

We would like to ask you some further questions about these specific stays abroad

SI No.	Questions	Options	Codes
4.	For your most relevant stay abroad, please identify your monthly income (in Euros) (after taxes & compulsory deductions).	a) Below 2000 b) Between 2001 to 4000 c) Between 4001 to 6000 d) Above 6000 e) I did not receive any income while staying abroad	1 2 3 4 5
5.	Rate your overall experience during your stays abroad, on a scale from 1 (very bad) 2(bad), 3(neutral, cannot say), 4(good) to 5 (very good)	a) Tolerance towards foreigners b) Possibility to communicate with local population (language related issues) c) Acceptance of different cultural and religious practices	1() 2() 3()
6.	What is your current resident status overseas?	a) No resident status abroad b) Temporary residence status in _____ (name of the countries) c) Permanent residence status _____ (name of countries) d) Any other please specify (e.g. Holding foreign nationality):	1 → Q8 2 3 98
7.	Do you hold any of the following statuses?	a) Person of Indian origin (PIO) b) Overseas Citizenship of India (OCI) c) Non-resident Indian (NRI) d) None	1 2 3 4
8.	When you were abroad, did you send remittances to India?	a) Yes b) No	1 2 → sec 3

9. If yes, please mention in the following table:

Instruction: Please write the most applicable codes for recipients of money and purpose of transfer from the codes mentioned:

1	2	3
To whom	Purpose	Amount (in Euros) (per annum)

Comment:

4

CITY CODE ☐ SECTOR CODE ☐ ☐ COMPANY CODE ☐ ☐ EMPLOYEE CODE ☐ ☐Questionnaire
Schedule 1

Codes for Recipients (column1): 1- family member, 2-friend, 3-colleague , 4-professional organization, 5-charity organization, 6-any other

Codes for purpose (column2): 1-to cover the daily expenses, 2-to cover education costs, 3-for investment/business , 4- for buying house/land, 5- for philanthropic activities , 6-savings , 7- any other.

Section 3: Return migration and its contribution to home country

Sl. No.	Questions	Options	Codes
1.	When did you return to India?	-----month -----year	
2.	Who influenced/inspired/motivated you to come back to India?	a)Own initiative b)Family c)Mentor/Your teacher d)Employer e) others Specify:	1 2 3 4 98
3.	What has motivated you to come back to India? <i>Instruction:</i> Please select three most important reasons and rank them from 1 (most important), 2 (second most important), 3 (third most important)	Employment-related factors a)Project completed/contract expired/programme of study completed b)Recession in the host country/Increasing unemployment in the local labour market overseas c)Better business/entrepreneurial opportunities in the destination country relative to the destination country d)Better employment/career advancement opportunities in India in concerned sector than in destination country e)Higher real earnings relative to the cost of living Immigration and integration-related factors f)Requirement of my scholarship g)Difficulties in integration in the host society h)Rigid immigration and settlement policies in the destination country Personal/Family-related factors i)I want to be with my family j)I have to take care of someone in India k)I want to bring up my children in India l)Any other specify:	1 () 2 () 3 () 4 () 5 () 6 () 7 () 8 () 9 () 10 () 11 () 98 ()
Comment:			

5

CITY CODE ☐ SECTOR CODE ☐ ☐ COMPANY CODE ☐ ☐ EMPLOYEE CODE ☐ ☐Questionnaire
Schedule 1

4.	What influenced your decision to select this specific city (Delhi NCR, Kolkata, Mumbai, Hyderabad and Bengaluru)? <i>Instruction:</i> Please select three most important reasons and rank them from 1 (most important), 2 (second most important), 3 (third most important)	Personal/Family-related factors a)My parents and/or close relatives live here b)My hometown Employment-related factors c)Decided by my employer d)The company/sector I wanted to work for was based here e)Scope for self employment/entrepreneurship f)Emerging state government support g)Better remuneration packages relative to cost of living Educational/health factors h)Good educational institutions for children i)Good health facilities j)Living environment of the city, e.g., climate , availability of housing and transportation k)Any other specify:	1 () 2 () 3 () 4 () 5 () 6 () 7 () 8 () 9 () 10 () 98()
5.	Did you face any difficulties upon return in India? <i>Instruction:</i> Please select three most important reasons and rank them from 1 (most important), 2 (second most important), 3 (third most important)	a)I did not face any particular difficulties b)I faced difficulties related to housing c)I faced difficulties related to schooling of children d)I faced difficulties related to bureaucracy e)I faced difficulties in terms of work culture f)I faced difficulties with infrastructural facilities at the work place g)I faced difficulties in terms of acceptance by professional colleagues h)I faced difficulties in terms of recognition of foreign degrees, qualifications and experience	1→Q6 2() 3() 4() 5() 6() 7() 8()
6.	Which of the following do you consider most important to your current work/business? <i>Instruction:</i> Please select three most important reasons and rank them from 1 (most important), 2 (second most important), 3 (third most important)	a)Knowledge and skills gained overseas b)Hands on experience abroad c)Network established overseas d)Capital accumulated overseas e)Foreign qualification specify: f)Others	1() 2() 3() 4() 5() 98()
7.	Can you give us an example on how you used your skills, experience, knowledge and ideas gained overseas to contribute to your company/institute/business? (open question)		
8.	How much is your current annual income in real terms as compared to earlier income abroad?	a)Much lower than before b)Lower than before c)Not much change d)Higher than before e)Much higher than before	1 2 3 4 5

Comment:

6

CITY CODE ☐ SECTOR CODE ☐ ☐ COMPANY CODE ☐ ☐ EMPLOYEE CODE ☐ ☐Questionnaire
Schedule 1

Section 4: Position in society

Sl. No.	Questions	Options	Codes
1.	What are the investments that you made after your return to India in the past five years? <i>Instruction:</i> Please select three most important investment in terms of amount and rank them from 1 (most important), 2 (second most important), 3 (third most important)	a)Housing related expenditure (building material/purchasing a house/flat) b)Purchase of land c)Personal and Family Business (electronic appliance, furniture, etc) d)Durable consumption goods (electronic appliance, furniture, etc) e)Providing support to other family members f) Education for yourself or for close relatives g) Investment on stock market h)Community Services/Activities i)Other expenditures, specify:	1() 2() 3() 4() 5() 6() 7() 8() 98()
2.	How has your stay overseas affected your level of investments?	a) in a very negative way b) in a negative way c) no change d) in a positive way e) in a very positive way	1 2 3 4 5
3.	How has your and your family's standard of living changed in the past five years or after your return from abroad (if it was within last five years)?	a) in a very negative way b) in a negative way c) no change d) in a positive way e) in a very positive way	1 2 3 4 5
4.	Do you think that your experience abroad has contributed to your personal development?	a)Yes b)No	1 2
5.	In your opinion, how much influence do your ideas and opinions have on people around you (e. g. family members, relatives ,colleagues ,friends)	a) no influence at all b) little influence c) a lot of influence	1 2 3
6.	In what way has your position in the society been affected by your overseas exposure?	a) very negatively b) negatively c) not much change d) positively e) very positively	1 2 3 4 5
7.	Are you a member of any of the following type of organization in India?	a)No b)religious organization c)diaspora/migrant network d)local sports/music or other leisure organization e)humanitarian organization f) professional organization g)political party h)other specify:	1 2 3 4 5 6 7 98
Comment:			

7

CITY CODE ☐ SECTOR CODE ☐ ☐ COMPANY CODE ☐ ☐ EMPLOYEE CODE ☐ ☐Questionnaire
Schedule 1

Section 5: Transnational ties

1.	Have you kept your contacts overseas after your return?	a)Yes b)No	1 2→Q7
<i>Instruction:</i> Please write the most applicable codes regarding frequency of communication and content of communication from the codes given below the table. You can fill more than one code e.g., 2+1			
	1	2	3
	Contacts (origin whether Indian or foreign or both)	Frequency of communication	Content/nature of communication
	a. colleagues		
	b. any other professional contacts		
	c. friends		
	d. scientific and professional diaspora groups		
	e. Family		
Codes for Frequency of communication (column 2): 1-every day, 2-every week, 3-every month, 4-a couple of times per year,5-no contact.			
Codes for content of communications (column 3): 1-investment opportunities in India, 2- Professional developments, 3-Job opportunities overseas, 4-Education and training opportunities, 5-Diaspora activity related			
6- Professional and scientific collaborations, 7- personal communications, 8- community service related activities			
Sl no.	Questions	Options	Codes
2.	Do you have any concrete plan to move abroad?	a) Yes b) No	1 2→Q7
3.	If Yes When	a)Within one year b)Within two years c)Within three years b)when I get the chance c)I do not know	1 2 3 4 5
4.	If yes, for how long?	a)for less than a year b)from 1 to 5 years c)from 6 to 10 years d)permanently e)I don't know	1 2 3 4 5
5.	Please write the name of destination countries	a)Country: _____ b)Not yet Decided	1 2
Comment:			

8

Questionnaire
Schedule 1

6.	Why do you plan to move abroad?	Employment- related factors a) Better business/entrepreneurial opportunities in the destination country b) Better employment/career advancement opportunities in the destination country Life style factors c) I prefer life style abroad d) I feel disconnected from India Personal/Family -related factors e) My close relatives live abroad f) I want to bring up my children abroad g) any other specify :	1 2 3 4 5 6 98
7.	Have you ever thought of actively taking part in the development process of India?	Yes No	1 2 → Q9
8.	If yes, please explain in what way:	a) business (e.g. business, finance, joint ventures) b) social services (e.g. addressing poverty, health sector, education, philanthropy) c) academic and training (e.g. culture, sports, knowledge, science and technology) d) policies (attract FDI) e) I can create more jobs in my field f) any other specify:	1 2 3 4 5 98
9.	Has any skilled professional returned to India as a result of your encouragement?	a) Yes b) No	1 2 → Q11

10. If yes, please mention:

Sector	No of person motivated

Comment:

Questionnaire
Schedule 1

11. Do you have any information regarding the following incentive programmes by the Government of India? Please mention.

Instruction: Please write the most applicable codes for 11.3 from the codes given below the table

	1	2	3
11.1 Do you know about the following:	11.2 Have you ever participated in any of the following?	11.3 If no, for which of the following reasons you don't have or have not participated in the following?	
1 Yes 2 No → next item	1 Yes → next item 2 No		
a) The Overseas Citizenship of India	1 2	1 2	
b) Person of Indian Origin Card	1 2	1 2	
c) Government Investment Incentives (Resurgent India Bonds)	1 2	1 2	
d) NRI deposit schemes	1 2	1 2	
e) Indian Diaspora Day (Pravasi Bharatiya Divas)	1 2	1 2	
f) Transfer of knowledge through The Global Indian Network of Knowledge	1 2	1 2	

Codes for 11.3 (column 3): 1- Too Expensive/ Cannot Afford, 2- Not Interested, 3- Do not want to support the current Government, 4- Have Indian Passport, 5- Not interested in returning to India, 6- Other (Specify), 99- No answer

12.	Do you think it will be good for India's development if highly skilled Indians return from abroad?	a) I strongly disagree b) I disagree c) Does not make any difference to me d) I agree e) I strongly agree	1 2 3 4 5
13.	Please explain why?		
14.	What should be done by the Government of India to encourage people to return to India? Please give your suggestion.		

Comment:

Questionnaire
Schedule 1

Section 6: Personal Information

1.	Name and Surname		
2.	E-mail address:	3. Phone number:	
4.	What is your age?	_____ years	
5.	Place of Birth (Town/City):	a) Urban b) Rural	1 2
6.	Gender	a) Male b) Female	1 2
7.	Religion	a) Hindu b) Muslim c) Christian d) Sikh e) I do not belong to any group f) Others Specify:	1 2 3 4 5 98
8.	Your social category	a) General b) Reserve c) Do not want to answer	1 2 3
9.	Marital status	a) married b) unmarried c) divorcee d) live in e) Widowed f) Do not want to answer	1 2 3 4 5 6
10.	Do you have children?	a) Yes ____ (how many) Please mention their ages _____ b) no	1 2
11.	Languages Known	a) _____ (Mother tongue) b) _____ c) _____ d) _____	
12.	Medium of Schooling up to XII	a) Mother Tongue b) English c) Hindi d) Others Specify:	1 2 3 98
13.	What is your highest obtained educational degree? (Degree/ course):	a) Bachelor b) Master c) PhD d) Other specify:	1 2 3 98
	a) Name of the Institution b) Country/State c) Year of completion d) Specialization at the highest level, if any / field of studies	_____ _____ _____ _____	
14.	City of present residence		

Questionnaire
Schedule 1

You have reached the end of the questionnaire.

Thank you very much for your cooperation!

Is there anything else you would like to tell us about the links between return migration and home country development?

15.	Would you like to receive a summary report of this study project?	a) Yes b) No	1 2
16.	Date of surveys	1st Visit:	2nd Visit:
17.	Surveyors name and code and date		
18.	Scrutiny's Name and Code and date		

Comment:

Appendix 2.2: Questionnaire for non-migrants

Research Project on

**Migration, Scientific Diasporas and Development
Impact of Skilled Return Migration on Development in
India**

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1

**Migration, Scientific Diasporas and Development Impact of
Return Skilled Migration on Development in India**

Section 1: Current employment situation

Sl. No.	Questions	Options	Codes
1.	What is the name of the firm/institution of your current employment? Always mention full form of names of firms.		
2.	What is your present occupation/designation? Always mention exact designation.		
3.	What is your position at the current employer? Please choose one that suits best your position.	a) Managerial b) Technical c) Researcher d) Others	1 2 3 98
4.	Please specify your position in hierarchy as Senior Level or Middle Level or Entry Level.	a) Senior Level b) Middle Level c) Entry Level	1 2 3
5.	What is the type of your firm/institution?	a) I am working for a multinational firm/institution b) I am working for a national firm/ institution c) I am employed in an academic and research institution d) I am self employed e) Other	1 2 3 4 98
6.	What is the sector/functional area of your current employment?	a) Information & communication technology b) Financial & management sector c) Pharmaceutical/Biotechnology d) Medical e) Others	1 2 3 4 98
7.	Total emoluments per month(in Rupees)	a) Below 25000 b) Between 25000 to 35000 c) Between 36000 to 50000 d) Between 51000 to 75000 e) Between 76000 to 100000 f) Above 100000 g) I do not reveal my income	1 2 3 4 5 6 7
8.	To what extent are you satisfied with your present employment/business?	a) extremely dissatisfied b) moderately dissatisfied c) indifferent d) moderately satisfied e) extremely satisfied	1 2 3 4 5

Comment:

2

9.	To what extent are your employer and colleagues satisfied with your skills, experience, knowledge and ideas?	a) extremely dissatisfied b) moderately dissatisfied c) indifferent d) moderately satisfied e) extremely satisfied	1 2 3 4 5
----	--	--	-----------------------

Section 2: Contribution to home country

Sl. No.	Questions	Options	Codes
1.	What influenced your decision to select this specific city, write the name of the city (Delhi NCR, Kolkata, Mumbai, Hyderabad and Bengaluru)? <i>Instruction:</i> Please select three most important reasons and rank them from 1 (most important), 2 (second most important), 3 (third most important)	Personal/Family-related factors a) My parents and/or close relatives live here b) My hometown Employment-related factors c) Decided by my employer d) The company/sector I wanted to work for was based here e) Scope for self-employment/entrepreneurship f) Emerging state government support g) Better remuneration packages relative to cost of living Educational/health factors h) Good educational institutions for children i) Good health facilities j) Living environment of the city, e.g., climate, availability of housing and transportation k) Any other specify:	1 () 2 () 3 () 4 () 5 () 6 () 7 () 8 () 9 () 10 () 98 ()
2.	Do you think that overseas experience makes a difference to your professional career?	a) Advantage position b) Disadvantage position c) I do not know	1 () 2 () 3 ()
3.	How much is your current annual income in comparison to your colleagues returning from abroad?	a) Much higher than return migrants b) Higher than return migrants c) Not much change d) Lower than return migrants e) Much lower than return migrants f) I do not know	1 2 3 4 5 6

Comment:

3

Section 3: Position in society

Sl. No.	Questions	Options	Codes
1.	What are the investments that you made in India in the past five years? <i>Instruction:</i> Please select three most important investment in terms of amount and rank them from 1 (most important), 2 (second most important), 3 (third most important)	a) Housing related expenditure (building material/purchasing a house/flat) b) Purchase of land c) Personal and Family Business d) Durable consumption goods (electronic appliance, furniture, etc) e) Providing support to other family members f) Education for yourself or for close relatives g) Investment on stock market h) Community Services/Activities i) Other expenditures, specify:	1 () 2 () 3 () 4 () 5 () 6 () 7 () 8 () 98 ()
2.	In your opinion, how much influence do your ideas and opinions have on people around you (e. g. family members, relatives ,colleagues ,friends)	a) no influence at all b) little influence c) a lot of influence	1 2 3
3.	Do you think that having foreign exposure would enhance your standard of living?	a) Yes b) No	1 2
4.	Do you think that your colleagues with foreign exposure contribute to the firm/organisation relatively more?	a) I strongly disagree b) I disagree c) Does not make any difference to me d) I agree e) I strongly agree	1 2 3 4 5 6
5.	Are you a member of any of the following type of organization in India?	a) No b) religious organization c) diaspora/migrant network d) local sports/music or other leisure organization e) humanitarian organization f) professional organization g) political party h) other (specify)	1 2 3 4 5 6 7 98

Comment:

4

Questionnaire
Schedule 2

Section 4: Transnational ties

Sl no.	Questions	Options	Codes
1.	Have you been abroad for work/employment/study?	a)Yes b)No	1 2
2.	Why have you not been abroad till now? (you can choose up to 3 options)	a)Never tried b)Never got the chance c)Experiences of my friends/colleagues are not encouraging d)Don't want to go due to family reasons e) Don't want to go due to cultural/religious issues f)I am satisfied here g)Others Specify:	1 2 3 4→Q8 5→Q8 6 98
3.	Do you have any concrete plan to move abroad?	a) Yes b) No	1 2→Q8
4.	If Yes When	a)Within one year b)Within two year c)Within three years d)when I get the chance e)I do not know	1 2 3 4 5
5.	If yes, for how long?	a)for less than a year b)from 1 to 5 years c)from 5 to 10 years d)permanently e)I don't know	1 2 3 4 5
6.	Please write the name of preferred destination countries	a)Country: _____ b)Not yet Decided	1 2
7.	Why do you plan to move abroad?	Employment-related factors a)Better business/entrepreneurial opportunities in the destination country b)Better employment/career advancement opportunities in the destination country Life style factors c) I prefer life style abroad d)I feel disconnected from India Personal/Family-related factors e)My close relatives live abroad f)I want to bring up my children abroad g)any other specify :	1 2 3 4 5 6 98
Comment:			

Questionnaire
Schedule 2

8.	Have you ever thought of actively taking part in the development process of India?	a)Yes b)No	1 2→Q10
9.	If yes, please explain in what way:	a)business (e.g. business, finance, joint ventures) b)social services (e.g. addressing poverty, health sector, education , philanthropy) c)academic and training (e.g. culture, sports, knowledge, science and technology) d)policies (attract FDI) e)I can create more jobs in my field f)any other (please specify):	1 2 3 4 5 98
10.	It will be good for India's development if highly skilled Indians return from abroad?	a)I strongly disagree b)I disagree c)Does not make any difference to me d)I agree e)I strongly agree	1 2 3 4 5
11.	Please explain why?		
12.	What should be done by the Government of India to encourage people to return to India? Please give your suggestion.		

Comment:

Questionnaire
Schedule 2

Section 5: Personal Information

1.	Name and Surname	
2.	E-mail address:	3.Phone number:
4.	What is your age?	_____years
5.	Place of Birth(Town/City):	a)Urban b)Rural
6.	Gender	a)Male b)Female
7.	Religion	a)Hindu b)Muslim c)Christian d)Sikh e)I don't belong to any group f)Others Specify:
8.	Your social category	a)General b)Reserve
9.	Marital status	a)married b)unmarried c)divorcee d)live in e)widowed
10.	Do you have children?	a)Yes ____ (how many) Please mention their ages_____ b)No
11.	Languages Known	a)_____ (Mother tongue) b)_____ c)_____ d)_____
12.	Medium of Schooling up to XII	a)Mother Tongue b)English c)Hindi d)Others Specify:
13.	What is your highest obtained educational degree? (Degree/ course):	a)Bachelor b)Master c)PhD d)Other
	a)Name of the Institution b)Country/State c)Year of completion d)Specialization at the highest level, if any / field of studies	
14.	City of present residence	

Questionnaire
Schedule 2

You have reached the end of the questionnaire.

Thank you very much for your cooperation!

Is there anything else you would like to tell us about the links between return migration and home country development?

15.	Would you like to receive a summary report of this study project?	a)Yes b)No	1 2
16.	Date of surveys	1st Visit:	2 nd Visit:
17.	Surveyors name and code and date		
18.	Scrutiny's Name and Code and date		

Comment:

Appendix 2.3: Questionnaire for skilled Indians in Europe

Survey on Skilled Indians and Development

We are kindly inviting all professionals/students of Indian origin who currently reside in France, Germany, The Netherlands and Switzerland to participate in a survey on "Skilled Indians and Development". By completing the survey you will help us identify ways of engaging skilled professionals and scientists in home country development. List of policy recommendations based on the results of this research will be made available to officials in destination countries as well as in India.

Please fill in the questionnaire within the next two weeks.
Completing this survey should take approximately **20 minutes**.

All information collected from the survey will be treated in strict confidence and all respondents will be treated as anonymous. More information about the research project can be found at <http://cooperation.epfl.ch/page-3063-en.html>
We thank you very much for your attention and remain at your disposal should you have any query,

Yours faithfully,

Gabriela Tejada, PhD
Project Leader and Coordinator
CODEV, EPFL

Prof. Jean-Claude Bolay
Director of Cooperation
CODEV, EPFL

Section 1: Migration motives

- In which year did you arrive in your current country of residence?
Year _____
- In which country do you currently reside?
 - Switzerland
 - Germany
 - France
 - The Netherlands
 - other, please specify where _____
- What resident status do you currently hold in your country of residence?
 - student visa
 - family reunification visa
 - temporary residence permit
 - permanent (unlimited) residence permit
 - citizenship
 - Other, please specify: _____
- Please specify which citizenship(s) you hold.
 - Indian
 - Other, please specify _____
- What was the most important reason for your move to Switzerland/Germany/France/ the Netherlands? (Please select only one answer.)
 - I was sent by a company/institution.
 - I found a job at a Swiss/German/French/Dutch employer on my own initiative.
 - I came to study.
 - I wanted to start my own business here.
 - Family reunification/ to join my partner
 - Other, specify _____
- Before coming to your current country of residence, had you lived outside of your home country, staying in one location for one month or longer?
 - Yes
 - No (please skip to Section 2)

6.1 If yes, please list all countries where you have stayed for more than a month.

1

	Very bad	Bad	Neither good nor bad	Good	Very good
Employment/career opportunities	1	2	3	4	5
Income level	1	2	3	4	5
Ease of doing business	1	2	3	4	5
Living environment and amenities (e.g. housing, transport)	1	2	3	4	5
Tolerance towards foreigners	1	2	3	4	5
Possibilities to integrate into the local society	1	2	3	4	5
Possibility to communicate with local people (language-related)	1	2	3	4	5
Social welfare system (e.g. schooling, health care, children day-care facilities)	1	2	3	4	5
Ease of obtaining a residence/work permit	1	2	3	4	5

- What best describes your main activity at the moment? Please select one.
 - In paid employment (go to Section 3.1)
 - Self-employed (go to Section 3.1)
 - In education (PhD students included) (go to Section 3.2)
 - Unemployed (go to Section 3.3)
 - Retired (go to Section 3.3)
 - Doing housework (go to Section 3.3)
 - Other, please specify _____ (go to Section 4)

Section 3.1 Employment situation (for currently employed professionals only)

- What is your employment situation at the moment?
 - working for a multinational company originating from NL/CH/FR/DE
 - working in a multinational company originating from India
 - working in a multinational company originating elsewhere
 - I am working for a local company/institution.
 - I am self-employed.
 - I am employed in an academic and research institution
 - Other, please specify _____
- What is the sector of your current employment?
 - Information & Communication Technology
 - Financial and management services
 - Biotechnology / Pharmaceutical industry
 - Other, please specify _____
- What is your position at the current employer? (Please choose one that suits best your position.)
 - Managerial
 - Technical
 - Research
 - Other, please specify _____
- What is the level of your position at the current employer? (Please choose one that suits best your position.)
 - Entry level
 - Mid-level
 - Senior level
- What type of position do you have?
 - temporary employment
 - permanent employment
 - on secondment (on-site work)
 - consultancy
 - other (please specify _____)
- Do you feel that you are overqualified for your current position?
 - Yes
 - No

3

6.2 For the two longest periods of your stay abroad please specify in which country you lived, the duration of your stay, the purpose of your stay and the type of visa you stayed on.

	Country	Starting Year	Duration of stay (number of months)	Purpose of stay a) study-related b) employment by own initiative c) project/research assignments/ internship d) accompanying my family/partner e) other – specify	Type of Visa a) student visa b) family reunification visa c) temporary residence permit d) permanent residence permit e) tourist visa f) other - specify
Longest time abroad	I was in _____ (specify a country)	_____ (specify the year)	for _____ months		
2 nd longest time abroad	I was in _____ (specify a country)	_____ (specify the year)	for _____ months		

Answer options: Country: a list of countries;

Starting year: a) before 1970, b) 1971-1980, c) 81-90, d) 1990.....

Duration: a) less than 3 months, b) 3 to 6 months, c) 6 months to 1 year, d) 1 to 3 year, e) more than 3 years

Purpose of stay: a) study-related, b) employment by own initiative, c) project/research assignment/internship, d) accompanying a family member, e) other

Section 2: Experiences in the country of residence

- How well do you consider yourself to speak and understand the local language(s) of your current country of residence?
 - not at all
 - a little bit
 - reasonably well
 - very well
- Are you affiliated with any organizations described below based in your *present country of residence*? (You may choose more than one answer.)
 - None (skip to question 3)
 - religious organization
 - local sports/music or other leisure organization
 - humanitarian organization
 - political party
 - diaspora/migrant network
 - professional organization
- If you are a member of a diaspora/migrant network or of a professional organization, please specify the name _____
- Are you a member of any international association (not necessarily based in your present country of origin) whose members are primarily of Indian origin?
 - No
 - Yes, please specify the name _____
- How often do you socialize with people of Indian origin (excluding your immediate family)?
 - every day
 - several times a week
 - a few times a month
 - less often
 - never
- Given your experiences, how would you rate each of the following qualities in your current country of residence? (Please, circle your answer for each of the items.)

2

6.1 If yes, please briefly explain why you feel this way.

7. How much is your monthly income after taxes and compulsory deductions, from all sources?

- less than 2000 euro (less than 2500 Swiss Francs)
- from 2001 to 4000 (from 2501 to 5000 Swiss Francs)
- from 4001 to 6000 (from 5001 to 7400 Swiss Francs)
- more than 6000 euro (more than 7400 Swiss Francs)

8. How does your remuneration match your skills?

- Very well
- Just adequate
- Inadequate

8.1 If you chose answer c (inadequate), please briefly explain why you feel this way.

9. Please rate your satisfaction with your present job for each of the following characteristics. (Please circle your answer for each item.)

	Very dissatisfied	Somewhat dissatisfied	Neutral	Somewhat satisfied	Very satisfied
Salary	1	2	3	4	5
Working conditions (e.g. contractual stability, flexibility, work-life balance)	1	2	3	4	5
Equal opportunities at work as a foreigner	1	2	3	4	5
Infrastructure/research facilities	1	2	3	4	5
Intellectual challenge	1	2	3	4	5
Level of responsibility	1	2	3	4	5
Possibility to improve technical skills	1	2	3	4	5
Possibility to improve communication and networking skills	1	2	3	4	5

Section 3.2 Current study situation (for students only)

1. Which educational institution are you currently enrolled in?

Level	Main field of studies	Which year did you start your current degree?	Which year do you expect to complete your current degree?
a) First university degree (Bachelors)	a) Information technology		
b) Master's degree	b) Computer and systems sciences		
c) PhD	c) Physical sciences		
d) exchange/guest student	d) Mathematics		
e) Other	e) Life Sciences		
	f) Biotechnology		
	g) Environmental sciences		
	h) Social and political sciences		
	i) Humanities		
	j) Management and Business administration		
	k) Engineering		
	l) Other, please specify		

4

Section 3.3

2. Please list chronologically all previous educational institutions you have attended at the university level in the past.

Level	Field of studies	Country
a) First university degree (Bachelors)	a) Information	
b) Master's degree	b) Computer and systems sciences	
c) PhD	c) Physical sciences	
d) Other, specify _____	d) Mathematics	
	e) Life Sciences	
	f) Biotechnology	
	g) Environmental sciences	
	h) Social and political sciences	
	i) Humanities	
	j) Management and Business administration	
	k) Engineering	
	l) Other, specify _____	

3. Please pick the three most important reasons for selecting your present country of residence as your study destination.

1st most important
2nd most important
3rd most important

	Famous university/professor/study programme in my field
	Wider employment opportunities in India after graduation
	Wider employment opportunities abroad after graduation
	Affordable cost of tuition
	Scholarship offer
	Accompanying a family member or a partner
	Advice of colleagues, fellows or friends
	My home university had an agreement with this institution
	The culture/lifestyle of this country
	Language of instruction
	Other _____

4. How do you pay for your studies in your current country of residence? (You may choose more than one answer)

- a) My own savings
b) My family's sponsorship
c) A loan from a financial institution
d) Salaried position
e) Side job
f) Scholarship/grant/fellowship, please mention the name _____

5. What is your plan after completing your current degree? Please select only one.

Activity	Where? (Name the country)	When? (expected year)
a) Further education		
b) Paid employment		
c) Join family business		
d) Set up my own company		
e) I don't know		
f) other _____		

5

1. Are you currently looking for paid work?
a) Yes
b) No
c) Other (please specify) _____
2. Have you ever had a paid job?
a) Yes
b) No
3. Please list your past employers (up to three) in reverse chronological order (your most recent jobs first).

	Sector	Level	Country (write down)
	a) Information & Communication Technology b) Financial and management services c) Pharmaceutical/ Biotechnical industry d) Academic and research institution e) Other, specify _____	a) senior level b) mid-level c) entry-level	
Most recent job			
2 nd most recent			
Third most recent			

4. Please describe the educational institutions you have attended at the university level or higher.

Level	Field of studies	Country
a) First university degree (Bachelors)	a) Information technology	
b) Master's degree	b) Computer and systems sciences	
c) PhD	c) Physical sciences	
d) Other, specify _____	d) Mathematics	
	e) Life Sciences	
	f) Biotechnology	
	g) Environmental sciences	
	h) Social and political sciences	
	i) Humanities	
	j) Management and Business administration	
	k) Engineering	
	l) Other, specify _____	

Section 4: Ties with India and development impact

1. How often are you in contact with your family and friends in India?
a) every day
b) every week
c) every month
d) a couple of times per year
e) no contact

6

2. How often do you discuss any of the following with people in India?

	a) never b) occasionally/seldom c) often d) all the time
a) Personal affairs	
b) Professional and scientific collaboration	
c) Education and training opportunities in NLCH/FR/DE	
d) Job opportunities overseas	
e) Business/investment opportunities in India	
f) Community service activities in India	
g) Political situation in India	

3. How often do you follow news about current events in India?

- a) every day
b) several times a week
c) a few times a month
d) less often
e) never

4. How often do you visit India since you have been in your current country of residence?

- a) I haven't visited yet
b) a few times a year
c) once a year
d) every other year
e) once every few years
f) other (please specify) _____

5. If applicable, please list the purpose and duration of your last three visits to India.

	Purpose	Duration
	a) personal affairs (visiting family, friends...) b) business/entrepreneurial activities on my own initiative c) sent by my employer d) research and teaching engagement e) other, specify _____	
Last visit		
Second last		
Third last visit		

6. In the past 12 months, have you sent any money to family members, friends or organizations in India?

- a) Yes
b) No (skip to Question 7)

6.1. Please specify to whom and for what purpose you sent this money.

To whom	purpose	Amount (optional)
a) family member	a) for daily expenses	Which of the following categories best describes the total amount you sent to this person/organization?
b) friend	b) to cover education costs	a) less than 100 euro (less than 120 CHF)
c) colleague	c) for investment/business	b) 100 to 500 euro (120 – 620 CHF)
d) professional organization	d) for buying housing/land	c) 500 to 1000 euro (620– 1200 CHF)
e) charity organization	e) for philanthropic activities	d) more than 1000 (more than 1200 CHF)
f) other, specify _____	f) for savings	
	g) other _____	

7. Have you made any direct investments in India since your arrival in your present country of residence (for example buying land, investing in business, stock market...)?

- a) Yes
b) No (skip to Question 8)

7

- 7.1. What kind of investment have you made? You may choose more than one.
a) Housing related expenditure (building material/purchasing a house/flat)
b) Land
c) Personal or family business
d) Investment on stock market
e) Community services/activities
f) Other, please specify _____

8. Are you a member of any of the following types of organization in India?

- a) No
b) religious organization
c) professional organization
d) local sports/music or other leisure organization
e) humanitarian organization
f) political party
g) Other, please specify _____

9. The Government of India has put in place some incentive programmes for Indians living abroad. Please answer the questions in the top line by filling in the correct number below.

Do you know about the following:	Do you or have you ever participated in any of the following?	If no, for which of the following reasons you don't have or have not participated in the following? (more reasons possible)
1 Yes 2 No	1 Yes 2 No	1 Too Expensive/ Cannot Afford, 2 Not Interested, 3 Do not want to support the current Government, 4 Have Indian Passport, 5 Not interested in returning to India, 6 Other (Specify below)
The Overseas Citizenship of India		
Person of Indian Origin Card		
Government Investment Incentives (for ex. Resurgent India Bonds, India Millennium Deposits)		
NRI deposit schemes		
Indian Diaspora Day (Pravasi Bharatiya Divas)		
Sharing of knowledge through The Global Indian Network of Knowledge		

10. How important is regional and national development of India to you?

- a) not important at all
b) somewhat not important
c) somewhat important
d) very important

9. Do you think your present activity could have an impact on socio-economic development of India?

- a) Yes
b) No

Please briefly explain your answer.

8

Section 5: FUTURE PLANS

1. How many years do you expect to stay in your current country of residence (from this moment onwards)? less than a year
- less than a year
 - from 1 to 5 years
 - more than 5 years
 - permanently
 - I don't know

2. What do you plan to do in the following five years? Please choose the most likely option.
- I do not know
 - I plan to stay in my current country of residence
 - I plan to return to India
 - I intend to move to another country
 - Other plans, specify _____

3. If you plan to move to another country, please mention where (more options possible).
- USA
 - UK
 - Canada
 - Australia
 - Germany
 - France
 - The Netherlands
 - Switzerland
 - Sweden
 - Spain
 - Italy
 - Other, please specify _____

4. Are you planning to return to India at any time in the future?
- Yes (Please go to question 5)
 - No (Please skip to question 6)
 - I don't know (Please skip to question 7)

5. When are you planning to return to India?
- within 5 years
 - within 10 years
 - within 20 years
 - in more than 20 years
 - I do not know when

5.1 If you are considering moving back to India, please name the most important reasons for that. (Please rank the top three reasons by putting "1" in the box next to what you consider the most important reason, "2" for the second most important reason and "3" for the third most important.)

Employment-related factors	
<input type="checkbox"/>	Project completed/contract expired
<input type="checkbox"/>	Recession in the host country/Increasing unemployment in the labour market abroad
<input type="checkbox"/>	Better business/entrepreneurial opportunities in India relative to the destination country
<input type="checkbox"/>	Better employment/career advancement opportunities in India relative to the destination country
<input type="checkbox"/>	Higher real earnings relative to the cost of living in India
Immigration and integration-related factors	
<input type="checkbox"/>	Requirement of my scholarship/ programme of study completed
<input type="checkbox"/>	Difficulties in integration in the host society
<input type="checkbox"/>	Rigid immigration and settlement policies in the destination country
Personal/Family-related factors	
<input type="checkbox"/>	I want to be with my family
<input type="checkbox"/>	I have to take care of someone in India (family responsibilities)
<input type="checkbox"/>	I want to bring up my children in India
<input type="checkbox"/>	Any other (Please specify _____)

9

6. If you are NOT considering moving back to India, please name the most important reasons for that. (Please rank the top three reasons by putting "1" in the box next to what you consider the most important reason, "2" for the second most important reason and "3" for the third most important.)

Employment-related factors	
<input type="checkbox"/>	Better business/entrepreneurial opportunities in the destination country
<input type="checkbox"/>	Better employment/career advancement opportunities in the destination country
Lifestyle factors	
<input type="checkbox"/>	I prefer lifestyle abroad
<input type="checkbox"/>	I feel disconnected from India
Personal/Family-related factors	
<input type="checkbox"/>	My close relatives live abroad
<input type="checkbox"/>	I want to bring up my children abroad
<input type="checkbox"/>	Any other (Please specify _____)

7. Please indicate your perceptions about the following matters in India regarding your personal position by ticking the appropriate box.

	Very bad	Bad	Neither good nor bad	Good	Very good
a) job opportunities in India	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) educational opportunities in India	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c) business/investment opportunities in India	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d) social and security situation in India	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e) political situation in India	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Section 6: Personal Background

- Please select your gender:
 - Male
 - Female
- What is your age? : _____ years
- Which is your country of birth?
- Which part of India are you from?
 - Urban metropolitan area
 - Semi-urban, smaller cities and towns
 - Rural area
- Which Indian state are you from? _____
- What is your present relationship status?
 - In a relationship (boyfriend/ girlfriend) (please go to question 7)
 - Married (please go to question 7)
 - Single (please skip to question 8)
 - Separated/divorced (please skip to question 8)
 - Widowed (please skip to question 8)
- Where is your partner residing currently? Only answer this question if you are in a relationship.
 - In the same country as I do
 - In India
 - In another country, namely in _____
- Which nationalities does your partner have?
 - Indian
 - Swiss
 - German
 - French
 - Dutch
 - American
 - Other, please specify _____

10

- 7.2 What best describes your partner's activity at the moment?

- He/she is in paid employment
 - He/she is self-employed
 - He/she is a student
 - He/she is unemployed and is looking for a job
 - He/she is unemployed and is not looking for a job
 - He/she is retired
 - Other, please specify _____
8. Do you have children?
- No (skip to question 10)
 - Yes, _____ (how many?) Please mention their ages _____
9. Where are your children residing currently?
- In the same country as I do
 - In India
 - In another country, namely in _____
9. Which community do you belong to?
- Hindu
 - Sikh
 - Muslim
 - Christian
 - I do not belong to any community
 - Other, specify _____
10. Please specify what languages you speak.
- _____ (Mother tongue)
 - _____
 - _____
 - _____

You have reached the end of the questionnaire.
Thank you very much for your cooperation!

Is there anything else you would like to tell us about the links between Indians abroad and home country development?

Please indicate where you found out about the survey?

- I was directly contacted by the investigators
- through the embassy
- through my employer
- through a friend/colleague
- I found the survey on the website
- other, please specify _____

- Would you like to receive a summary report of this study project?
- Yes
 - No

CONTACT INFORMATION (OPTIONAL)

In case we need to clarify some of the information you have provided, please list phone numbers and/or an e-mail address where you can be reached.

Name and Surname _____
E-mail address _____
Phone number _____

INDIAN SKILLED MIGRATION AND DEVELOPMENT

Skilled migration has gained significance over the past number of years, with increasing studies addressing the flows of scientists, skilled professionals and students within the migration and development nexus, from the perspective of their potential contributions to the countries of origin either through diaspora interventions or by their eventual return. India represents a good example because of the high quality of its human resources and the fact that it is a significant source of skilled personnel for many countries around the world. While a number of European countries have upsurged as new destinations in the search for Indian talent, little is known about Indian skilled professionals and students there, their commitment to home country development and return intentions. Also, skilled return migration to India has not been fully understood.

The objective of this study was to explore the development impact of skilled return migration in India and to examine the perceptions of Indian skilled professionals and students in Europe with regard to their potential role in home country development.

Drawing on first-hand data collected simultaneously in India and Europe, and using the framework of diaspora contributions and the return channels, the study illustrates the influence overseas exposure has on the professional and social position of skilled migrants upon their return to India, and the problems they face when transferring the specialized knowledge and technical skills they have gained abroad. While skilled Indian migrants consider physical return as a necessary condition for knowledge transfer, linking their development aspirations to their return plans, they face a number of obstacles within the local system that hinder the transfer of knowledge once they return to India.

This report is an outcome of the international research project entitled “Migration, Scientific Diasporas and Development: Impact of Skilled Return Migration on Development in India”. It provides an overview of the main data, methods, research findings and their policy implications. Funded by the Swiss Network for International Studies (SNIS), the project ran from January 2011 until March 2013.