

## MAFE Working Paper 24

## **Determinants of Migration between Ghana and Europe**

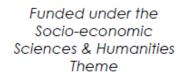
Richard Black, Amparo González-Ferrer, Elisabeth Kraus, Ognjen Obucina & Peter Quartey

December 2013 (Revised Version)













The MAFE project is coordinated by INED (C. Beauchemin) and is formed, additionally by the Université catholique de Louvain (B. Schoumaker), Maastricht University (V. Mazzucato), the Université Cheikh Anta Diop (P. Sakho), the Université de Kinshasa (J. Mangalu), the University of Ghana (P. Quartey), the Universitat Pompeu Fabra (P. Baizan), the Consejo Superior de Investigaciones Científicas (A. González-Ferrer), the Forum Internazionale ed Europeo di Ricerche sull'Immigrazione (E. Castagnone), and the University of Sussex (R. Black). The MAFE project received funding from the European Community's Seventh Framework Programme under grant agreement 217206. The MAFE-Senegal survey was conducted with the financial support of INED, the Agence Nationale de la Recherche (France), the Région Ile de France and the FSP programme 'International Migrations, territorial reorganizations and development of the countries of the South'. For more http://www.mafeproject.com

Le projet MAFE est coordonné par l'INED (C. Beauchemin), en partenariat avec l'Université catholique de Louvain (B. Schoumaker), la Maastricht University (V. Mazzucato), l'Université Cheikh Anta Diop (P. Sakho), l'Université de Kinshasa (J. Mangalu), l'University of Ghana (P. Quartey,) l'Universitat Pompeu Fabra (P. Baizan), le Consejo Superior de Investigaciones Científicas (A. González -Ferrer), le Forum Internazionale ed Europeo di Ricerche sull'Immigrazione (E. Castagnone), et l'University of Sussex (R. Black). Le projet MAFE a reçu un financement du Septième Programme-Cadre de la Communauté européenne (subvention 217206). L'enquête MAFE-Sénégal a été réalisée grâce au soutien financier de l'INED, de l'Agence Nationale de la Recherche, de la région Ile de France, et du programme FSP 'Migrations internationales, recompositions territoriales et développement dans les pays du Sud'. Pour plus d'information, voir : http://www.mafeproject.com.

# DETERMINANTS OF MIGRATION BETWEEN GHANA AND EUROPE

Richard Black, Amparo González-Ferrer, Elisabeth Kraus, Ognjen Obucina & Peter Quartey

#### INTRODUCTION

This working paper seeks to identify the main factors underlying different propensities to migrate from Ghana to Europe, and from Europe back to Ghana, across individuals over time. It seeks to distinguish the role played by individual, household and contextual factors in increasing (or decreasing) an individual's likelihood of migrating between Africa and Europe, rather than the specific migration rates between these two areas and their changes over time (a topic addressed in the working paper on migration patterns).

The results are divided into two main parts. The first is devoted to the analysis of migration out of Ghana, and the second to the analysis of return migration.

#### 1. Background and previous evidence on international migration

#### 1.1. Recent socio-economic and political transformation in areas of origin

The past fifty years have been tumultuous for Ghana. Moving from colony to independent nation in 1961, and a period of nation-building in which it was a destination for migrants from other parts of West Africa, the country then went through periods of internal political turmoil, economic deterioration, and subsequent large-scale out-migration, both to neighbouring countries in Africa (especially Nigeria) and to Europe and North America (Anarfi et al. 2003b). Since the mid-1990s, however, the country's economic fortunes have improved considerably. Through a mixture of processes, including the return of democracy, debt reduction, economic liberalisation, and most recently the discovery and production of oil (since 2011), Ghana has moved quickly into the ranks of middle-income countries, with high growth rates (ISSER 2011). This growth has also come with considerable social and demographic transformations, which evidence suggests includes substantial migration from rural areas to the major cities of the south such as Accra and Kumasi, and a rise in return migration from European countries (IOM 2009). Yet much of the evidence for the latter process in particular remains anecdotal, or restricted to small-scale or qualitative studies that are not easily generalisable to the country as a whole (Awumbila et al. 2011). Meanwhile, emigration from Ghana has continued, despite, or possibly because of the economic growth that has simultaneously lowered income differentials between Ghana and external destinations, but also increased the capacity of Ghanaians to consider moving over longer distances. Indeed, the reasons for growth in both

emigration from, and return migration to Ghana remain relatively unclear, as is discussed in the next section

#### 1.2. Existing literature on migration dynamics within and from Ghana

Existing research on the determinants or causes of international migration from Ghana comes from a number of different theoretical directions, but remains to date relatively limited. In contrast, internal migration in Ghana is much better studied, building on classic work by Caldwell (1968) which showed that in the 1960s, propensity to migrate from rural to urban areas in Ghana was higher in larger rural centres that were close to urban centres both physically and in terms of their social connections; and was more prevalent amongst those who were wealthier and better educated. Subsequent research on internal migration has benefitted from a wealth of new quantitative data, including bespoke migration surveys, and a large (and longitudinal) migration element in the Ghana Living Standards Survey (GLSS); in contrast, robust quantitative data on emigration from, and return to Ghana has been much more limited.

At one level, the recent literature on internal migration is helpful in providing new hypotheses and illustrations of the drivers or causes of migration and/or return. Focusing on migration from the rural Volta basin mainly to larger cities, Tsegai (2007) shows a statistically significant effect of income differentials on household decisions to participate in migration. Similarly, Boakye-Yiadom and McKay (2006) show that anticipated welfare gains, and personal characteristics such as education and whether individuals were married impacted on rural-urban migration decisions. Reed et al. (2010) consider internal migration in the coastal region of Ghana using life-history calendar data, showing that key determinants of migration – education, employment, marital status and childbearing – differ significantly between men and women. Meanwhile, a recent paper by Ackah and Medvedev (2010) on internal migration in Ghana more broadly shows that migration is determined by a combination of individual (pull) and community (push) factors. Thus younger and more educated individuals are more likely to migrate, not least because their skills and energy are in demand; yet in contrast to Caldwell's earlier conclusions, communities with higher levels of literacy, better public health care and better access to water and sanitation are less likely to produce migrants.

In the case of international migration from and return to Ghana, the availability of quantitative data on which conclusions about the determinants of migration can be drawn is more limited. A summary of evidence on the determinants of migration from 10 African countries by Shaw (2007) notes factors that are remarkably consistent with those seen as driving internal migration – including income differentials, a desire to diversify household risks – whilst it also points to 'threshold effects' whereby those who lack financial assets or education are unable to move at all. A summary of key drivers of migration from Ghana by Quartey (2009) notes the multitude of factors, including economic, social and political, working at different levels, including individual, household, community, national, regional and global levels. However, again key amongst these are limited employment opportunities in Ghana, especially for well-educated entrants to the labour market – a group that is expected to grow substantially in the future due to population growth and rising levels of education.

Recently, there has been a particular focus as a result on skilled migration from Ghana, notably of doctors and other health-care workers, including some quantitative evidence in Ghana that their movement is often stimulated by a desire to obtain specialist training that is unavailable or difficult to access in Ghana (Anarfi, Quartey and Agyei 2010). Many educated young people also move in order to complete higher education, although this is increasingly a major route through which a work permit can be obtained in OECD countries (OECD 2007)<sup>1</sup>. However, it is also important to note that if migration is to be viewed over a longer historical time frame, a considerable amount of outmigration from Ghana in the past has also been associated with, if not driven by political factors including conflict and political repression (Anarfi et al. 2003a).

Some survey evidence of international migration from Ghana does exist, notably a survey in the mid-1990s on the 'Push and pull factors of international migration' carried out by the Netherlands Interdisciplinary Demographics Institute (NIDI) in the mid-1990s with the University of Ghana, Legon, and more recent surveys conducted for the Global Development Network and the World Bank. Drawing on the NIDI survey, van Dalen et al. (2005) show that as with internal migration, international migration from Ghana to Europe is driven by expectations of achieving a higher standard of living rather than poverty *per se*, with evidence that migration is selective with respect to education level, age and sex. Reporting on the same study, Anarfi et al. (2003a) note that 23% of respondents who had migrated to Europe said they had done so because of the presence of relatives and friends abroad. However, van Dalen et al. are more cautious, saying that network effects were less important than expected in Ghana, compared to other countries in the same survey.

The more recent GDN and World Bank surveys had not, at the time of writing, led to peer-reviewed publications. The main report for the GDN 'Development on the Move' study includes analysis of the reasons that individual migrants gave for their migration, and although this is not the same as a 'determinant' of migration, it is again broadly consistent with other evidence in showing that employment opportunities and higher wages as a way to increase household income are major factors in the migration decision, alongside a desire to pursue education or to join family members abroad (Chappell et al. 2010).

Turning to return, there are still fewer quantitative studies that robustly explore the determinants of return (although see, for instance, recent MIREM and PREMIG projects on other African countries). This is not least because the problems of conducting multi-sited research are amplified in a case where the control group would need to be current migrants (who may themselves be dispersed) who have not yet returned. Classic explanations of return behavoiur have focused on a distinction between returns of 'success' and 'failure', the former being a return where an individual or family has met their migration aspirations and goals and choose to return, perhaps at a particular point in the lifecourse (such as retirement, or the death of a parent); and the latter being a return motivated by a failure to gain employment (or loss of employment), the termination of a visa or being apprehended for those living overseas without legal documents.

In this context, this working paper asks whether international migration from Ghana is selective with respect to age, sex and level of education as observed in previous studies, as

-

<sup>&</sup>lt;sup>1</sup> See OECD International Migration Outlook, 2007, pp. 132

well as exploring the relative importance of factors such as income differentials and the existence of social networks in countries of origin. In particular, it asks whether the presence of family members — spouses, parents and children — in origin or destination makes a difference in terms of the likelihood of an individual migrating. In relation to return, meanwhile, the analysis is somewhat more speculative, as less is currently understood about the motivations for, and factors underlying return. Here we include analysis of the significance of the original reason for migration, country of destination and form of visa regime in trying to understand whether initial migration ends up being temporary or more permanent. We also look at the maintenance of links to the home country, and whether these make return more or less likely.

#### 2. Profiles of migrants and returnees

To begin to answer these research questions, this section provides an initial analysis of how the selection processes involved in both outmigration and return might work in Ghana by establishing a profile of Ghanaian migrants and returnees interviewed in the MAFE project<sup>2</sup>. In each case, the profile of migrants in the year before their departure to Europe is compared to the profile of those who did not migrate to Europe, with data on the latter relating to when they left to another destination, or alternatively to when they were aged 27 – the mean age of Ghanaians migrants interviewed when they migrated to Europe, minus 1; or to the time of the survey for those aged under 27.

The analyses in this paper are restricted to the first adult migrations out of Ghana where the final destination was the UK or the Netherlands – the two destination countries for Ghanaians included in the MAFE project. Migrations followed by stays in Europe shorter than 1 year, and migrations that involved intermediate stays of more than 1 year in countries other than the UK or the Netherlands are also excluded from our sample and analyses. In turn, our analyses of return are restricted to return from the UK or the Netherlands to Ghana, with no intermediate stay in other countries. Both short returns (less than a year) and long returns (more than a year) are included and, in addition, here we include not only the first return to Ghana, but also subsequent returns in cases where the individual has re-migrated to Europe after return (although this accounts for only four additional cases).

#### 2.1 Migrants to Europe, compared to those who have not migrated to Europe

Looking first at initial migration to Europe, table 1 shows that in line with previous studies, international migrants from Ghana to the UK and the Netherlands in the MAFE dataset were significantly better educated prior to their first migration than those who did not migrate to these countries, at an equivalent age. Some 96% of migrants to the UK and the Netherlands interviewed had at least some secondary education the year before migrating, whereas the corresponding percentage at age 27 amongst those who did not migrate to these countries was only 79%. Similarly, some 28% of migrants to the UK and the Netherlands had completed tertiary education before departure, compared to just 13% amongst those who did not migrate to these countries. Levels of education amongst the Ghanaian population as a whole

<sup>&</sup>lt;sup>2</sup> For more details on the MAFE project methodology, see Beauchemin (2012).

are much lower still, with 31% of adults having never been to school according to the GLSS 5 survey, and just 13% having a secondary or higher level qualification (GSS, 2007).

TABLE 1: SUMMARY STATISTICS OF MIGRANTS AND OTHERS

	Migrants to	
	Netherlands/	
	UK	Others*
E1		
Education		
Tertiary	28%	13%
Some secondary	68%	66%
Primary or less	4%	21%
Wealth/income		
Property ownership	85%	83%
Employed	68%	86%
Have sufficient for basic needs	82%	80%
Networks in Europe		
Partner	25%	1%
Child	25%	1%
Other	49%	6%
Total (n)	372	1288

Source: MAFE survey. \*Others includes all those in the sample who either did not migrate, or migrated to a destination other than the UK or the Netherlands (most of these migrants were to other African destinations)

Turning to indicators of wealth, data presented in table 1 show that there was no significant difference in levels of property ownership at an equivalent ages between those who migrated to the UK and Netherlands and those who did not migrate to these two countries. Similarly, there were also no significant differences in levels of well-being, as measured by whether respondents said they had sufficient basic resources to cover their basic needs. However, there was a significant difference in employment levels, with migrants to the UK and the Netherlands much less likely to have been employed in the year before departure than those who did not leave for these two countries at an equivalent age. The principal reason for this difference is the higher proportion of those who migrated to the UK or the Netherlands being full-time students in the year before they migrated.

Differences are also found between those who migrated to the UK or the Netherlands and those who did not in terms of whether they had relatives or friends in Europe. Indeed, migrants were significantly more likely to have a partner, child or other relative or friend living in Europe immediately prior to migration than those who had not migrated at the time of the survey, or who had moved to other countries. A quarter of all those who migrated to the UK or the Netherlands had a partner or child already there, whilst almost half had other relatives or friends who they could rely to take them in when they arrived. In contrast, virtually none of those who did not migrate to Europe had a partner or child in Europe, and only 6% had any other relative or friend there.

#### 2.2 Returnees to Ghana, compared with non-returnees

Some statistically significant differences were also found between returning migrants and those migrants who had yet to return at the time of the survey. Thus a total of 91% of Ghanaians interviewed who returned home from Netherlands/UK were living (in the year before returning) in a household with sufficient resources to cover basic needs, whereas only 66% of those immigrants who had not returned yet were in such situation (table 2). Data in table 2 also shows that a significantly lower proportion of return migrants were working in the year before their departure, compared to those who had not returned. This might in part be explained by people returning at the point of retirement: 14% of the returnees interviewed had spent 11 or more years in Europe, whereas none of those interviewed in Europe who had not yet returned had been there that long. However, the returnee group also contained a significantly higher proportion of people who had spent just 1-2 years in Europe than non-returnees, suggesting some return of those who had been in Europe for a short period as students, or who simply failed to secure employment in Europe.

TABLE 2: SUMMARY STATISTICS OF RETURNEES AND NON-RETURNEES

	Returnees	<del>-</del>	
	from UK/	Non-	
	Netherlands	returnees	
Time spent in Europe			
1-2 years	32%	12%	
3-5 years	19%	15%	
6-10 years	34%	73%	
11+ years	14%	0%	
Wealth/income			
Employed	49%	78%	
Have sufficient for basic needs	91%	66%	
Property ownership in Europe	1%	4%	
Property ownership in Ghana	16%	31%	
Reasons for initial migration			
Family	9%	29%	
Economic	21%	36%	
Studies	60%	22%	
Other	10%	12%	
Total (n)	83	389	

Source: MAFE survey.

As with initial migration, returnees were also significantly more likely to have children and partners back in Ghana, and less likely to have them in Europe than migrants who had not returned; however, they were not significantly more educated than non-returnees (table 2). Instead, returnees were significantly more likely than non-returnees to have said their original migration was for economic reasons, with 60% of returnees saying they had migrated for economic reasons, compared to just 22% of those who had not yet returned. Also of interest, those who had returned were significantly less likely to have bought property in Europe, a finding that is surprising. Levels of property ownership in Europe amongst all of the Ghanaians

interviewed were substantially below levels amongst European populations, especially in the UK where despite recent falls, nearly 65% of the population own property.<sup>3</sup>

#### 3. 'Determinants of migration between Africa and Europe'

Section 2 reviewed the basic characteristics of migrants and returnees, comparing these respectively to those who have not migrated to Europe, and those who have not (yet) returned. In this section we turn to the results of regression analysis designed to understand which factors are most significantly associated with first departure and return, controlling for differences between groups. The section is divided into three parts, which analyse in turn the determinants of departure, the determinants of return, and links between departure and return. The regression models reported in these sections draw on existing literature outlined above for Ghana, as well as broader literature on the determinants of migration and return that are reviewed elsewhere (see Gonzalez-Ferrer *et al.*, 2013). The regression models are multi-variate, and the data included is multi-level in nature, meaning that it relates not only to individual migrants, non-migrants and returnees, but also to individuals' household characteristics and data on the country in which they were living.<sup>4</sup>

#### 3.1. Determinants of Departure

In analyzing the determinants of departure, we are concerned only with first migrations from Ghana to the Netherlands or the UK made by individuals aged 18 or more. Consistent with analysis of the determinants of migration in other countries covered by the MAFE project, movement to Europe before the age of 18 is not included, as our focus is on adult migration.

In Table 3, we describe the sample utilized for the analyses of departure from Ghana. As can be observed, 974 of the surveyed individuals had never migrated out of Ghana at the time of the survey (2009); in contrast, 372 left Ghana to go to the Netherlands or the UK in their first adult long-duration trip out of the country. A small additional proportion migrated out of Ghana to another African country or to other countries in the world. In the multivariate analyses that follow, individuals whose first adult migration out of Ghana took them to a destination different from our selected destinations in Europe are considered as non-migrants during the time they resided in Ghana and are censored (i.e. removed from the analysis) from then onwards. Weights are applied to the different migrant categories and to non-migrants to take into account estimated proportions of migration within the population as a whole.<sup>5</sup>

<sup>&</sup>lt;sup>3</sup> http://www.guardian.co.uk/money/2012/nov/16/home-ownership-lowest-since-1988

<sup>&</sup>lt;sup>4</sup> For a full explanation of the methodology used in this analysis, see MAFE working paper n°22: http://www.ined.fr/fichier/t\_telechargement/57653/telechargement\_fichier\_en\_wp22\_determinantssynthesis.pdf

<sup>&</sup>lt;sup>5</sup> Migrants were purposely over-sampled in order to have sufficient numbers in the regression. Weights were applied based on estimated proportions of migrants derived from a screening survey.

# TABLE 3: FIRST ADULT MIGRATION BEHAVIOUR OF GHANAIANS IN MAFE BIOGRAPHIC DATASET

	Ghana		
	N		% Weighted
Non-migrants	97	74	85
Migrants to Europe (UK/Netherlands)	37	72	6
Migrants to other African countries	19	8	6
Migrants to other destinations	11	L6	3
Total	166	60	100

Five main groups of variables are used in the analysis:

- 1. A series of individual socio-demographic characteristics, including gender, age, ethnic and religious group, and educational level;
- 2. A series of socio-economic indicators related to either the individual or the household in which the individual lived in Ghana;
- 3. A series of Indicators of the individual's family status, including the number of partners and children the individual has had at each moment (i.e. year) of their life.
- 4. Information about the geographical location of the individual's family and social networks, including partners, children, other family members and friends.
- 5. A series of indicators related to macro-economic conditions in the country of origin at each moment (i.e. year) of their life.

In Appendix 1, table 1, we list and describe all the variables that were constructed in these five areas. Some of these variables, as can be seen, are time-invariant (e.g. gender) while others are time-varying (e.g. education, assets in country of origin). For the latter, we took their lagged value (the value for the previous year to the one observed), in order to make sure that the variable could logically act as a cause or determinant of migration, rather than reflecting the consequences of it.

In Appendix 1, table 2, the first column presents the gross effect of each of the covariates described in Table 1. In subsequent columns we summarize the results of a series of nested discrete-time logit models that estimate the net effect that each of these covariates have on the probability of an individual experiencing a first adult migration from Ghana to the Netherlands or the UK (compared to staying in Ghana) after controlling for some other variables. The probabilities are expressed as odds rations, in which an odds ratio less than one indicates a negative effect. The variables are added in a step-wise manner: socio-demographic controls, labor and economic resources, family status and networks abroad and macroeconomic conditions in the country of origin.

As can be seen, some variables that appeared clearly and strongly associated with a higher (or lower) probability of migrating from Ghana to the Netherlands or the UK in Column 1 (Gross Effect), became irrelevant once other explanatory factors were simultaneously controlled for (Models 1 to 7). For example, having a child in Ghana seemed to have a strong negative effect

on the probability of departing to Europe (odds ratio of 0 .45\*\*\*), as well as those aged over 35 (odds ratio 0.35\*\*\*) and being female (odds ratio 0.57\*\*). However, once all the other variables (age, education, ethnic group, labor force situation, economic resources, other family members' and friends' location, macro-economic conditions in Ghana) were controlled for in Model 7, the effect of each of these factors becomes insignificant. To take one example, this step-wise analysis shows that the negative effect of gender on first migration is explained away by gender differences in levels of education.

Amongst the variables that appear to be the most significant determinants of migration, and which are robust throughout all the models, are having a partner, child or other friend or relative in Europe, and having tertiary education. The gross effect of tertiary education is to make it *thirty times* more likely that an individual will migrate to Europe, and although this reduces to eight times more likely when other factors are taken into account, this is still a highly significant factor. In turn, having a partner, child, or other friend or relative in Europe make it respectively 15, seven and nearly eight times more likely that an individual will undertake a first migration to Europe. The only other significant factors in the final model are age (25-35 year olds being almost twice as likely to migrate as under 25 year olds) and being a Muslim (Muslims being five times *less* likely to move to Europe than non-Muslims)

#### 3.2. Determinants of Return

Analysis of the determinants of return is more difficult than first migration, as the MAFE datasets include only a small number of returnees. For this reason and in order to maximize the number of events that can be considered as a relevant return for analysis, we include in our sample both *long returns* (lasting one year or more) and also *short returns*, of less than a year, but where the returnee indicated that s/he intended to settle back in Ghana. Unlike our analysis of departures, we also include not only an individual's first return to Ghana but also all subsequent returns — although this only led to the inclusion of 4 additional returns in the analysis (see table 4). The vast majority of the returns were in practice from the UK rather than the Netherlands.

TABLE 4: RETURNS OF MIGRANTS FROM THE NETHERLANDS / UK TO GHANA

First returns vs. non-returnees	N	% weighted
Returnees to Ghana from the Netherlands / UK	83	37
Migrants in the Netherlands / UK who had never returned to Ghana	389	63
Total individuals at risk	471	100
All return trips vs. trips without return		
Returns to Ghana from the Netherlands / UK (including repeated events by the same individual)	87	38
Trips to the Netherlands / UK that were still ongoing	416	62
Total trips at risk	503	100

As with the determinants of migration, we construct a set of independent variables that allow us to analyze in a multivariate setting the main individual characteristics and circumstances that increase (or decrease) propensity to return home, net of the effect of other variables. In order to adequately account for return incidence taking into account variations in length of stay in Europe, we again use a series of discrete-time multivariate analyses.<sup>6</sup>

In the case of return migration, we select six main groups of explanatory variables, plus some control variables, as follows:

- 1. A series of socio-demographic factors, including gender, age and educational level. In this case, we distinguish only between tertiary educated and non-tertiary educated, due to the small size of the sample, and preponderance of tertiary-educated people;
- 2. A series of variables that represent proxies for integration at the destination, including socio-economic and legal conditions in which immigrants live in Europe;
- 3. A series of indicators of the individual's family status, including whether they have a partner or children, and the location of these partners and children, as well as other family members;
- 4. A series of variables that indicate contacts with Ghana, through remittances, visits and ownership of different types of assets in Ghana such as houses, businesses or land;
- 5. A series of variables that capture whether initial migration to Europe was mostly an individual decision or not, and the main reasons declared by the migrant as to why they migrated;
- 6. A series of macroeconomic variables that describe conditions in Ghana; and finally
- 7. Controls, for destination country in Europe, length of residence in Europe, and whether the return is the first or second time the individual has gone back to Ghana.

<sup>&</sup>lt;sup>6</sup> The number of events in these multivariate analyses is 86 rather than the 87 cases listed in table 2, as one return occurred before the point at which other explanatory covariates were available.

In Appendix 2, Table 1, we list and describe the variables constructed in these seven areas. As in the analyses of departure, for time-varying variables we took their lagged value (the value for the previous year to the one observed), in order to ensure that the variable could logically act as a cause or determinant of return, rather than reflecting a consequence. In Appendix 2, table 2, a number of variables have a significant effect, at least at a 5% level, on the odds of return within a given year. They include the control variable of which country the person migrated to; the reason given by the individual for their initial migration; the extent to which individuals covered their basic needs; the length of time they had been in Europe; their age; whether they had a partner in Europe; and their employment and legal status.

Thus, those in the UK were around six times more likely to return than those in the Netherlands; whilst those who had originally migrated to study were more than seven times more likely to return than those who originally migrated for family reasons. In turn, migrants in the UK or the Netherlands who reported having sufficient income to cover their basic needs were almost four times more likely than those who reported insufficient income; those who had stayed in Europe for 3-5 years were three times more likely to return than those who had been in Europe for under two years; whilst those aged 25-35 at the time they migrated were more than twice as likely to return than those aged under 25 when they first left Ghana.

In contrast, those who were employed, had secure legal status, or a partner in Europe were significantly less likely to return. Interestingly, having a child in Europe did not significantly decrease the likelihood of return, but having a child in Ghana increased the odds of return threefold.

#### 4. Conclusions

This working paper has explored the determinants of migration from Ghana to two European countries – the UK and the Netherlands – based on a large-scale retrospective survey of migrants and non-migrants conducted in all three countries. Existing literature has stressed the role of tertiary education, and also of family and network contacts in Europe, in influencing and shaping migration from Africa to Europe, and this study supports the view that these factors are important. However, other factors cited in previous literature as significant influences on migration – especially economic factors, which are widely cited by migrants themselves as a principal *reason* for them choosing to migrate, do not appear in this study as significantly associated with the actual propensity to migrate, when other factors are taken into account, Similarly, age and gender appear much less important than in previous studies, becoming less important as other factors are included in the multivariate model.

In contrast, existing literature that uses quantitative evidence to explore the reasons for return migration is more sparse, even if new surveys on return are emerging in other countries. This, and other MAFE working papers on Senegal and DR Congo seek to contribute to this emerging literature, and although based on a relatively small sample of returnees, suggest that family and network effects are again significant influences on return. However, unlike initial migration, return also appears to be significantly influenced by a much wider range of factors, including economic (employment, income), political (legal status), and demographic (age, how long since first migration occurred).

Perhaps the most significant determinant of migration from Ghana to Europe revealed in this study is the existence of family ties and networks that can both encourage and facilitate the migration. Indeed, even the finding that Muslims are less likely to migrate than non-Muslims might be partly explained by the existence of pentecostal networks that are known to sponsor would-be migrants, especially missionaries (see Wilkinson 2012), although it may also be linked to higher levels of poverty amongst Muslims. At the point of a possible return, such family networks are again important, though less consistently: thus having a partner in Europe makes individuals more likely to migrate, and less likely to return; but whilst having a child in Europe makes no difference to whether they then return.

However, in contrast, the other two factors that appear to be significant determinants of the propensity to migrate – having tertiary education, and being a non-Muslim – are not significant determinants of the propensity to return. Rather, other factors come into play, including the country that an individual migrated to, the reason for migration, and experiences in that country (such as how long they stay, and whether they have secure legal status), which cannot possibly explain the initial migration; as well as factors such as having sufficient income and being employed, which do not appear as significant factors in explaining departure. Others include, how frequently the return home, having an asset in the country of origin, and job prospects at home. A larger sample of returnees might provide more robust evidence of the determinants of return.

### APPENDIX 1: MULTIVARIATE ANALYSIS OF DETERMINANTS OF RETURN

Table 1: Variables

Variable name	Definition	Response categories	Lagged	Questions	Comments
Departure	See description in the main text	0=no, 1=yes			
Age	Ego's age	<25, 25-34, 35+		q1a	
Female	Ego's sex	0=no, 1=yes		q1	
Educational level	Ego's highest educational level	0=some primary or less, 1=some secondary, 2=some tertiary		q18, q402, num_per, q19 q19d q19y	
Employed	Ego is employed	0=no, 1=yes	Yes	q402	All Egos included; people inactive counted as non- employed
Suff	Ego's household where Ego lived had enough resources for basic needs	1=More than suff or suff, 0=Just suff or insuff	Yes	q312	Referred to the dwelling where Ego lived the year before
Assets in country of origin	Location of Ego's assets	0=No asset, 1= Yes	Yes	q501d,q501f q502 q510	Almost nobody had assets in European destinations before their first migration there, so it was impossible to add the response category "asset in destination"
Partner in Europe	Ego has a partner in selected EU destinations	0=no, 1=yes	Yes		Any kind of partner is included in this variable (not only spouses but also not married partners declared by Ego).
Partner in Origin	Ego has a partner in country of origin	0=no, 1=yes	Yes		Note that Ego may have simultaneously partners in
Partner in Other countries	Ego has a partner in other country	0=no, 1=yes	Yes		different locations (not only because of legal polygamy since here we do not restrict to spouses)
Child(ren) in Europe	Ego has a child in selected EU destinations	0=no, 1=yes	Yes		Children of all ages are included in this variable (not only
Child(ren) in Origin	Ego has a child in country of origin	0=no, 1=yes	Yes		minors). Note that Ego may have simultaneously children in
Children in Other countries	Ego has a child in other country	0=no, 1=yes	Yes		different locations
Other relatives/friends in Europe	Ego has other relatives and/or friends in Europe diff from partners and children	0=No, 1=Yes	Yes		
GDP growth at origin (lagged 2 years)	Average GDP growth rate in 2 previous years in country of origin		Yes	WDI database	
Devaluation	A devaluation took place in the country of origin	0=other years, 1=year & year after a devaluation took place in the country of origin		Own elaboration	
Religion	Ego's religion	Muslim, Others (ref)		q4	

Table 2. Determinants of departure from Ghana to selected destinations in Europe (Netherlands/UK). Discrete-time logit regression (Odds ratios)

	Gross	(1)	(2)	(3)	(4)	(5)	(6)	(7)
	Effects							
Ref. <25 years old								
25-35	1.73**	1.552**	1.691**	1.744**	1.901**	1.783**	1.921**	1.916**
35 & plus	0.35***	0.336***	0.373***	0.521**	0.515*	0.533	0.527	0.519
Female (ref. male)	0.57**	0.997	1.030	0.821	0.735	0.830	0.740	0.745
Ref. Primary or less								
Some secondary	4.10***	3.617***	3.721***	2.996**	2.213**	2.947**	2.231**	1.947*
Some tertiary	29.0***	26.13***	27.66***	14.64***	9.419***	14.65***	9.525***	8.123***
Employed (ref. no)	0.68*		0.806	0.908	0.880	0.912	0.879	0.881
Sufficient resources for basic needs (ref. no)	1.17		0.734	1.086	0.907	1.049	0.914	0.917
Some asset in Ghana(ref. no)	0.69		0.999	0.793	0.629	0.807	0.637	0.639
Ego has a partner in Europe (ref. no)	69.24***			30.56***	16.21***	28.08***	16.24***	15.67***
Ego has a partner in Origin (ref. no)	0.65**			0.880	0.963	0.923	0.960	0.958
Ego has a partner in Other country (ref. no)	4.58***			3.653***	4.467***	3.982***	4.438***	4.574***
Ego has a child in Europe (ref. no)	2.28**				7.418***	4.058**	7.471***	7.187***
Ego has a child in Origin (ref. no)	0.45***				0.973	0.865	0.966	0.964
Ego has a child in Other country (ref. no)	0.50				0.531	0.757	0.533	0.520
Ego has other relatives/friends in Europe (ref.no)	14.61***				7.721***		7.816***	7.827***
Average GDP growth rate in 2 previous years in Ghana	1.02						0.990	0.991
Devaluation year	0.94						1.177	1.165
Muslim (ref. no)	0.13***							0.201**
Person-years	31793	31793	31793	31793	31793	31793	31793	31793
Events	372	372	372	372	372	372	372	372
Egos	1660	1660	1660	1660	1660	1660	1660	1660

Exponentiated coefficients; \* p< 0.10, \*\* p< 0.05, \*\*\* p< 0.001

## APPENDIX 2: MULTIVARIATE ANALYSES OF THE DETERMINANTS OF RETURN

Table 1: Variables

	Variable name	Label	Response categories	Lagged	Question	Comments
	Return	See description in the main text	0=no, 1=yes			Include long returns & short returns with intentions of reinstallation; repeated returns by the same individual are included (and models correspondingly clustered on ident)
	Repeat	Ego experienced at least a previous return from selected destination in Europe	0=no, 1=yes			
	Dest	Country of destination in Europe	France (ref.) /Italy/Spain			
Controls	Segret	Ego's length of residence in selected European countries (number of years)	1-2, 3-5, 6-10, 11+			Time starts at year 1 for every return; for the very few individuals who returned the same year they arrived to Europe (year 1), variables cannot be lagged so they take the value they had that same year. For the rest of individuals (those who did not return the same year of arrival) variables are truly lagged.
	Agemig	Ego's age at first migration to selected destination in Europe	<25, 25-34, 35+			
.80	Female	Ego's sex	0=no, 1=yes		q1	
Socio-demog. Factors	Univ2	Ego had some tertiary education	0=no, 1=yes		q18, q402, num_per, q19 q19d q19y	Due to the smaller sample size in the analyses of return behavior, the more complete education variable including 3 responses was omitted. However, previous test showed that results for people having some secondary, or some secondary or more were not significant nor affected the rest of the reported results.
	Employed	Ego is employed	0=no, 1=yes	Yes	q402	All Egos included; people inactive counted as non-employed
tion at tion	Suff	Ego's household where Ego lived had enough resources for basic needs	1=More than suff or suff, 0=Just suff or insuff		q312	Referred to the dwelling where Ego lived the year before
Integration at destination	Legal status	Ego's legal status in Europe	0=irregular, 1=regular	Yes	v rp np other_rp nnrp q1200d,q1200f	
象논	Partner in Europe	Ego has a partner in selected EU destinations	0=no, 1=yes	Yes		Any kind of partner is included in this variable (not only spouses but also not married
two	Partner in Origin	Ego has a partner in country of origin	0=no, 1=yes	Yes		partners declared by Ego). Note that Ego may have simultaneously partners in different locations (not only because of legal polygamy since here we do not restrict
Family status & social network	Partner in Other countries	Ego has a partner in other country	0=no, 1=yes	Yes		to spouses)
S Z	Child(ren) in Europe	Ego has a child in selected EU destinations	0=no, 1=yes	Yes		Children of all ages are included in this variable (not only minors). Note that Ego may

	Child(ren) in Origin	Ego has a child in country of origin	0=no, 1=yes	Yes		have simultaneously children in different locations
	Children in Other countries	Ego has a child in other country	0=no, 1=yes	Yes		
	Other relatives/friends in Europe	Ego has other relatives and/or friends in Europe diff from partners and children	0=No, 1=Yes	Yes		
s with of	Some assets by location	Location of Ego's assets	0=No asset, 1= Yes in European destination, 2=Yes in Ghana		q501d,q501f q502 q510	
Contacts with country of origin	Remit	Ego remits to origin	0=no, 1=yes	Yes	q1601d q1601f q1601p1/2/3	
Col	VisitCongo	Ego's visit to his/her country of origin	0=no, 1=yes	Yes	q1001d q1001f	
	Financedego	Ego financed his/her migration alone	0=No, 1=Yes		q619	
<b>E</b>	Decidedego	Ego decided his/her migration alone	0=no, 1=yes		Q617	
Migration decision charact.	Migreason	Reasons for migration to the selected destination in Europe declared by Ego	Family, Economic, Study, Political, Other		q604c1	In the Ghanaians analyses there were too few people that mentioned Political Reasons so the category was systematically expelled by Stata. To avoid this problem, these cases are merged with the residual category Other reasons
Macroec.Co nditions at origin	Devaluation	A devaluation took place in the country of origin	0=other years, 1=year & year after a devaluation occured		Own elaboration	
Macroec nditions a	GDP growth at origin (lagged 2 years)	Average GDP growth rate in 2 previous years in country of origin			WDI database	

Table 2: Determinants of return. Discrete—time logit regression (Odd ratios)

	Gross Effects	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Netherlands (ref. UK)	0.11***	0.115***	0.122***	0.0940***	0.123***	0.122***	0.134***	0.135***	0.135***
More than 1 return (ref.no)	3.66**	2.984**	3.015**	2.698**	2.407**	2.307**	2.160**	2.085**	2.091**
Length of stay in Europe 3-5 (ref. 1-2)	1.20	1.298	1.306	1.723	2.335*	2.505*	3.011**	3.009**	3.009**
6-10 years	0.46	0.522	0.516	0.884	1.267	1.392	1.923	1.887	1.887
11 & plus	0.22**	0.253**	0.249**	0.530	0.755	1.167	1.456	1.441	1.443
Age at migration 25-35 (ref. <25)	1.85	1.618	1.613	2.364**	1.999*	2.321*	2.524**	2.534**	2.535**
35 & plus	1.75	1.391	1.446	1.944*	1.211	1.378	1.684	1.754	1.756
Female (ref. male)	0.85		0.853	1.183	1.221	1.173	1.518	1.526	1.528
Some tertiary (Ref. Less)	1.17		1.221	1.341	1.436	1.527	0.909	0.940	0.943
Suf income in HH to cover basic needs (ref. No)	4.32***			4.036***	3.910**	3.539**	3.661**	3.785**	3.786**
Employed (ref. no)	0.29**			0.287***	0.251**	0.251**	0.260**	0.262**	0.263**
Legal status (ref. no)	0.26**			0.187***	0.347**	0.391**	0.329**	0.327**	0.326**
Ego has a partner in Europe (ref. no)	0.23***				0.571	0.627	0.523**	0.505**	0.504**
Ego has a partner in Origin (ref. no)	3.8***				1.699	1.647	1.349	1.347	1.345
Ego has a partner in Other country (ref. no)	1.14				1.169	1.158	1.059	1.000	0.990
Ego has a child in Europe (ref. no)	0.25***				0.737	0.766	1.075	1.091	1.094
Ego has a child in Origin (ref. no)	2.65**				2.468**	2.845**	3.141**	3.112**	3.120**
Ego has a child in Other country (ref. no)	0.43				1.654	1.445	0.963	1.007	1.008
Ego has other relatives/friends in Europe (ref.no)	0.40**				0.796	0.889	1.198	1.223	1.222
Ownership of some asset in EU (ref no)	0.06**					0.152*	0.130*	0.133*	0.132*
Ownership of some asset in Ghana	0.52*					0.989	1.115	1.120	1.119
Remitted to Ghana (ref. no)	0.38**					0.791	0.815	0.844	0.843
Visited Ghana (ref. no)	0.35**					0.492	0.449	0.448	0.446
Ego financed migration to Europe on his/her own (ref. no)	1.30						1.766	1.742	1.747
Ego decided migration to Europe on his/her own (ref. no)	0.80						0.472*	0.483*	0.482*
Economic reasons (ref. Family reasons for migration to Europe)	1.58						2.014	2.011	2.008
Study reasons	5.31***						6.013***	5.808***	5.801***
Other reasons	2.69**						1.365	1.348	1.340
Average GDP growth rate in 2 previous years in Ghana	0.90							0.970	0.969
Devaluation	2.82**							0.997	0.998
Muslim (ref. others)	0.42								1.450
N	<del></del>	5367	5367	5367	5367	5367	5367	5367	5367
Events		86	86	86	86	86	86	86	86
Egos		471	471	471	471	471	471	471	471

Exponentiated coefficients; \* p< 0.10, \*\* p< 0.05, \*\*\* p< 0.001

#### References

Ackah, C.and D. Medvedev. 2010. "Internal migration in Ghana: determinants and welfare impacts." *World Bank Policy Research Working Paper* 5273.

Anarfi, J., P. Quartey, and J. Agyei. 2010. "Key determinants of migration among health professional in Ghana." *Development Research Centre on Migration, Globalisation and Poverty Working Paper*.

Anarfi, J.K., S. Kwankye, O.-M. Ababio, and R. Tiemoko. 2003a. "Migration to and from Ghana." Working paper C4, Development Research Centre on Migration, Globalisation and Poverty, University of Sussex.

Anarfi, J.K., S. Kwankye, A. Ofoso-Mensah, and R. Tiemoko. 2003b. "Migration from and to Ghana: a background paper." Brighton: Development Research Centre on Migration Globalisation and Poverty, WP-C4.

Awumbila, M., P. Quartey, T. Manuh, T.A. Bosiakoh, and C.A. Tagoe. 2011. *Changing mobility patterns and livelihood dynamics in Africa: the case of transnational Ghanaian traders*. Oxford: International Migration Institute.

Boakye-Yiadom, L.and A. McKay. 2006. "Migration between Ghana's rural and urban areas: the impact on migrants' welfare." Available: <a href="http://www.pegnet.ifw-kiel.de/papers/conference-2007">http://www.pegnet.ifw-kiel.de/papers/conference-2007</a>.

Caldwell, J.C. 1968. "Determinants of Rural-Urban Migration in Ghana." *Population Studies* 22(3):361-377.

Chappell, L., R. Angelescu-Naqvi, G. Mavrotas, and D. Sriskandarajah. 2010. "Development on hte Move: Measuring and Optimising Migration's Economic and Social Impacts." London: Institute for Public Policy Research.

GSS. 2007. *Patterns and trends of poverty in Ghana, 1991-2006*. Accra: Ghana Statistical Service.

IOM. 2009. "Migration in Ghana: A Country Profile 2009." Geneva: International Organization for Migration.

ISSER. 2011. *State of the Ghanaian Economy*. Accra: Institute for Statistical, Social and Economic Research, University of Ghana, Legon.

Quartey, P. 2009. "Migration in Ghana: A Country Profile." Pp. 115pp. Geneva: International Organization for Migraiton.

Reed, H.E., C.S. Andrzejewski, and M.J. White. 2010. "Men's and women's migration in coastal Ghana: an event history analysis." *Demographic Research* 22:771-812.

Shaw, W. 2007. "Migration in Africa: a review of the economic literature on international migration in 10 countries." Washington DC: Development Prospects Group, The World Bank.

Tsegai, D. 2007. "Migration as a household decision: what are the role of income differences? Insights from the Volta basin of Ghana." *European Journal of Development Research* 19(2):305-326.

van Dalen, H., G. Groenewold, and J. Schoorl. 2005. "Out of Africa: what drives the pressure to migrate?" *Journal of Population Economics* 18(4):741-778.