

# WORK→INT



Assessing and enhancing integration in workplaces

## RESEARCH REPORT

# MIGRANT WORKERS IN THE HEALTHCARE SECTOR IN 5 EUROPEAN COUNTRIES:

## A QUANTITATIVE OVERVIEW FROM EU-LFS

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February 2015



“Co-funded by the European Union”







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This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the European Commission cannot be held responsible for any use which may be made of the information contained therein.

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## **Introduction**

This paper has been prepared as part of the international project 'WORK-INT: Assessing and enhancing integration in workplaces'. It provides a statistical portrait of the main characteristics of migrant workers in the health sector in five European countries: Germany, Spain, Italy, Ireland and UK. More specifically, the aim of the paper is to:

Measure the incidence of migrant workers in the health sector in the five analysed countries;

Describe the main characteristics of the migrant health workforce in these countries in terms of country of origin, gender and working conditions;

Analyse whether migrant health workers' characteristics are different from the average characteristics of migrant workers and of native health workers, in each country.

The paper is organised into four main sections. The first section presents the methodology adopted to define the health workforce and the data used to measure it in the five selected countries. The second shows the main characteristics of the migrant health workers (MHW hereafter) according to the objectives highlighted above for the most recent period available, 2011-2012. The third offers some statistics on the phenomenon in the recent past. Section four provides some conclusions.

## **Methodology**

### **1.1 Definition of the health workforce**

The health workforce is defined by the World Health Organization (WHO) as "all people engaged in actions whose primary interest is to promote, restore or maintain health" (Dal Poz et al., 2009). Moving from this definition to an operational concept of health workers is not an easy task. A useful starting point is the classification provided by Dal Poz et al. (2009), which integrates in an overall framework the elements of training, occupation and industry<sup>1</sup>.

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<sup>1</sup> Dal Poz et al. 2009 "Handbook on monitoring and evaluation of human resources for health: with special applications for low- and middle-income countries", WHO, The World Bank and USAID.

**Table 1. Framework for defining the health workforce**

Individual's training, occupation & place of work	Working in the health industry	Working in a non-health industry or unemployed/inactive
Training in health and employed in a health occupation	A. For example, physicians, nurses, midwives working in health-care facilities	C. For example, nurses working for private companies, pharmacists working at retail outlets
Training in health but not employed in a health occupation	A. For example, medically trained managers of health-care facilities	C. For example, medically trained university lecturers, unemployed nurses
Training in a non-health field or no formal training	B. For example, economists, clerks, gardeners working in health-care facilities	D. For example, primary school teachers, garage mechanics, bank accountants

Source: Dal Poz et al. 2009, pag. 14

According to this framework, three main categories of workers can be distinguished in order to get to an operational definition of the health workforce:

- A. people with health vocational education and training, working in the health services industry;
- B. people with training in a non-health field (or with no formal training) working in the health services industry;
- C. people with health training who are either working in a non-health-care-related industry, or who are currently unemployed or not active in the labour market.

Categories A and C together form the trained (skilled) health workforce (active or inactive) available in given country or region, while A and B represent the workforce employed in the health industry.

In this paper we are interested in the *health workforce*, i.e. in workers with a health educational background and performing health tasks whether or not they are employed in the health industry. Our focus is, thus, on individuals belonging to categories A and C and currently employed in a health occupation (first row of table 1).

Therefore, we base our main selection of health workers on the International Standard Classification of Occupation (ISCO) developed by the International Labour Organization (ILO), which classifies and records the tasks and duties performed in a job.

According to the most recent version of ISCO (ISCO08) the main health occupations fall in two major groups:

- sub-major **group 22**, “health professionals” (generally well-trained workers in jobs that normally require a university degree for competent performance). Health professionals include medical doctors, nursing and midwifery professionals, and others such as dentists and pharmacists.
- sub-major **group 32**, “health associate professionals” (generally requiring knowledge and skills acquired through advanced formal education and training but not equivalent to a university degree). Health associate professionals include medical and pharmaceutical technicians, nursing and midwifery associate professionals and others such as dental assistants, physiotherapy technicians and dispensing opticians.

## **1.2 The EU Labour Force Survey**

For cross-country comparability objectives, the preferred source of data is the Eurostat Labour Force Survey (EU-LFS). The EU-LFS is a large quarterly household sample survey of people aged 15 and over conducted in the 28 Member States of the European Union and two countries of the European Free Trade Association (EFTA). The survey uses internationally agreed concepts and definitions and it is carried out in each member country by the respective National Statistical Institutes. Data collected are then forwarded to Eurostat in accordance with the common coding scheme, ensuring cross-country comparability. The EU-LFS collects a large number of socio-demographic respondents' characteristics (including nationality and country of birth) their household structure and their labour market status during a reference period of one to four weeks immediately prior to the interview.

The EU-LFS also presents some limitations, especially in terms of the coverage of the migrant population. Recent migrants and irregular ones are likely to be excluded from the sample design and/or to refuse to answer the survey. Furthermore EU-LFS does not have information on respondents' ethnicity. However, these shortcomings do not appear to limit substantially our analysis, which mostly refers to regular employed migrants.



### 1.3 Selection of the health workforce in the EU-LFS

The EU-LFS database incorporates the ISCO08 classification starting from 2011 data.

EU-LFS data collected before 2011 are based on the previous version of ISCO (known as ISCO-88) which was less detailed and clear-cut in the definition of the professions in the health sector. For this reason some problems of comparison, when referring to data prior 2011 may arise. In both cases (pre and post 2011), EU-LFS data on occupations are available at the 3-digit level of the ISCO classification which allow us to distinguish between the two main segments of the health workforce: doctors and health professionals, and nurses and midwives (referred for simplicity hereafter as doctors and nurses respectively).

According to the ISCO08 classification, thus applying to data collected from 2011 onwards, the following occupations fall in our operational definition of health workers:

**Table 2a. Occupations in the health workforce in the ISCO08 classification**

ISCO08 code	Definition
<b>Medical doctors and others health professionals:</b>	
221	Medical doctors
223	Traditional and complementary medicine professionals
224	Paramedical practitioners
226	Other health professionals
323	Traditional and complementary medicine associate professionals
325	Other health associate professionals
<b>Nurses:</b>	
222	Nursing and midwifery professionals
322	Nursing and midwifery associate professionals

For data collected before 2011, the occupational categories in the health profession according to the ISCO-88 classification were the following:

**Table 2b. Occupations in the health workforce in the ISCO-88 classification**

ISCO-88 code	Definition
<b>Medical doctors and others health professionals:</b>	
222	Health Professionals (except nursing)
322	Modern health associate professionals (except nursing)
324	Traditional medicine practitioners and faith healers
<b>Nurses:</b>	
223	Nursing and midwifery professionals
323	Nursing and midwifery associate professionals

The following tables show the size – in absolute terms and as share of the total workforce - of the health workforce in the five countries, according to the previous definition.

**Table 3. Workers age 15-64 in the health professions (X000): total**

	YEAR	Germany	Spain	Ireland	Italy	UK
isco-88	2002	1,612				1,010
isco-88	2003	1,656				1,031
isco-88	2004	1,686				1,046
isco-88	2005	1,708	566		867	1,097
isco-88	2006	1,632	588	83	876	1,155
isco-88	2007	1,808	600	85	899	1,114
isco-88	2008	1,762	596	86	948	1,183
isco-88	2009	1,810	630	90	978	1,178
isco-88	2010	1,787	607	94	953	1,162
<b>Change from isco-88 to isco-08</b>						
isco-08	2011	2881	606	91	963	1252
isco-08	2012	2,942	631	94	1015	1,279

Source: Our elaboration on Eurostat EU-LFS.

**Table 4. Share of workers in the health professions over total workers**

	<b>Germany</b>	<b>Spain</b>	<b>Ireland</b>	<b>Italy</b>	<b>UK</b>
2006	4.4%	3.0%	4.2%	3.9%	4.1%
2007	4.7%	3.0%	4.1%	3.9%	3.9%
2008	4.6%	3.0%	4.2%	4.1%	4.1%
2009	4.7%	3.4%	4.8%	4.3%	4.2%
2010	4.6%	3.3%	5.2%	4.2%	4.1%
<b>Change from isco-88 to isco-08</b>					
2011	7.3%	3.4%	5.0%	4.3%	4.4%
2012	7.3%	3.7%	5.2%	4.5%	4.4%

Source: Our elaboration on Eurostat EU-LFS.

It emerges from them that the change from isco-88 to isco08 definition poses some problems of comparability across time, which seem to be more severe in some countries. In Germany and to a lesser extent in UK, in fact, a strong increase in the number of health workers is detected between 2010 and 2011, which is presumably to be ascribed to the change in the classification. For the sake of comparability, our main analysis has been restricted to the 2011-2012 period.

#### **1.4 Identification of the migrant population in EU-LFS**

In the EU-LFS data, information on both nationality and country of birth are available for Spain, Ireland, Italy and UK. For Germany, data on nationality only are available. In this study, nationality is the criterion adopted to select the migrant health workers. This choice is justified by the WORK-INT focus on the integration of migrants at the workplace level. Nationality, in fact, is considered to capture, in a more accurate way than country of birth, the population at risk of discriminatory treatments at the different stages

of the work relationship, including, in particular, recruitment<sup>2</sup>. It is, however, important to consider some caveats when commenting the statistics reported below. The selection based on nationality avoids counting as migrants national workers born abroad. However it excludes from the migrant group those individuals with a migration background who have acquired the nationality of the host country after a period of residence. Furthermore, second generations born in the host country are included in the migrant population in countries where the citizenship laws is based on the *ius sanguinis* (e.g., children of foreign nationals born in Germany) and excluded in countries where the *ius solis* system is adopted, as in the UK.

## Results 2011-2012

### 1.5 The composition of the health workforce: profession, gender and nationality

Before analysing the characteristics of migrants among the health workforce, we firstly investigate the composition of the health workers in terms of profession (doctors and nurses), gender and nationality (foreigners and nationals).

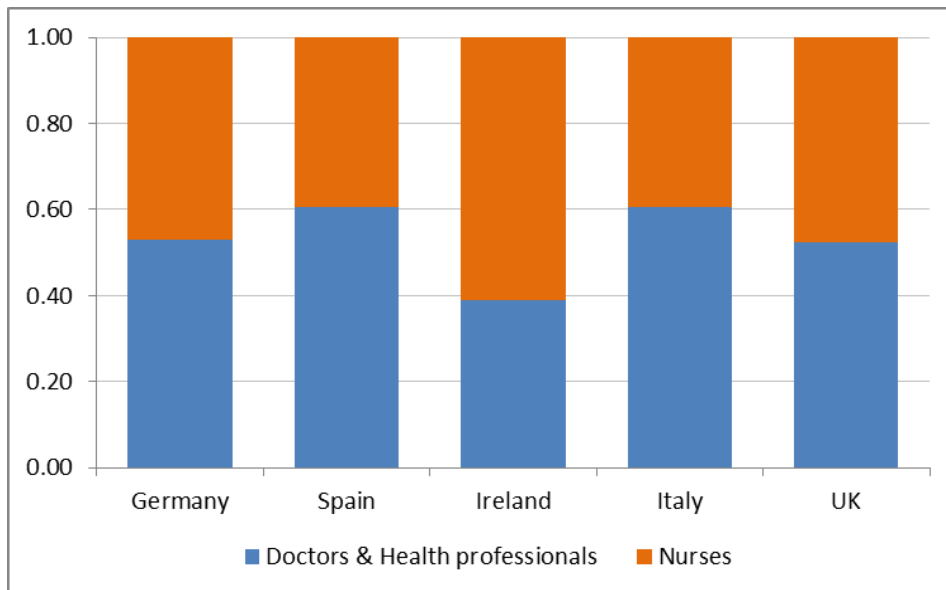
According to Table 4, health workers account for a share going from 3.7 per cent (Spain) to 7.3 per cent (Germany) of the total workforce in 2012.

Health workers are mostly composed by doctors and health professionals in four out of five countries analysed. An exception is the case of Ireland where 60 per cent of the health workforce is represented by nurses and midwives (Figure 1). The health profession is mainly a female-run sector (Figure 2): more than 70 per cent of the health workforce in the five countries under analysis are women. The incidence of females is particularly high among the German and Irish health workforce (79 per cent), followed by the UK. The two Mediterranean countries, Spain and Italy, have the lowest degree of feminization (67 per cent and 60 per cent respectively). Feminization is more pronounced among nurses than doctors, however women represent the majority of workers also in this segment of the health workforce in all countries analysed but Italy.

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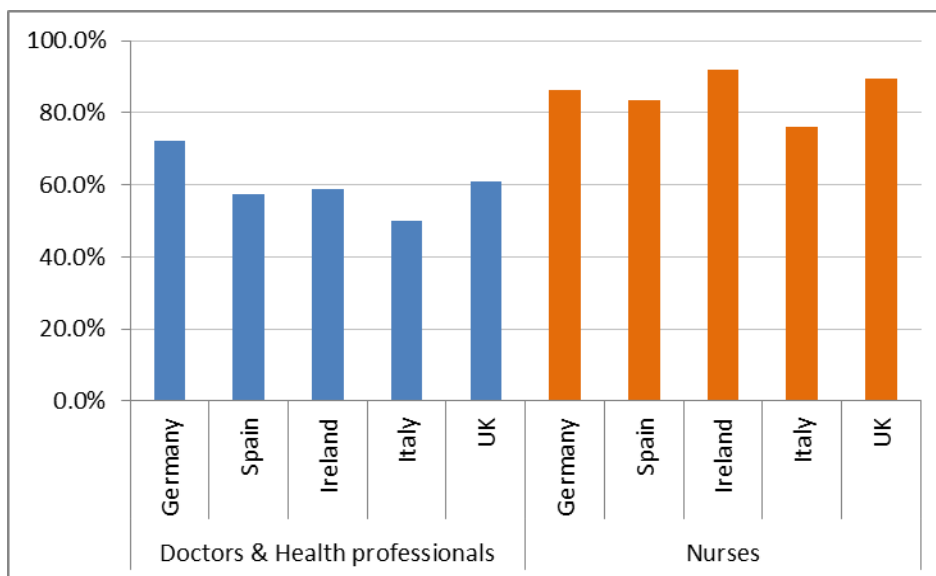
<sup>2</sup> Country of birth is the preferred selection criteria when the objective of the study is the measure of the dimension of migrant population meant as people who have come from abroad at a certain point of their lifetime.

**Figure 1. Workers in the health professions: composition by occupation (average 2011-2012)**



Source: Our elaboration on Eurostat EU-LFS.

**Figure 2. Share of female workers among doctors and nurses (average 2011-2012)**



Source: Our elaboration on Eurostat EU-LFS.

Turning to the presence of migrants among the health workforce, our analysis shows a very heterogeneous situation in the five EU countries. Migrant workers, in fact, represent a share of the health workforce ranging from about 18 per cent in Ireland to 3.5 per cent in Italy (Table 5).

Remarkable differences emerge also when comparing the incidence of migrant workers in the health and non-health occupations. In three countries, namely Germany, Spain and Italy, the incidence of migrant workers in the health occupations is lower than the average; in UK no differences are detected between the health occupations and the average, while in Ireland the health occupations employ a larger share of migrants than the non-health occupations. It is also worth noticing that Spain and Italy, the two countries with the lowest incidence of migrants in the health workforce, display the highest difference in the share of migrants between the health and non-health occupations<sup>3</sup>.

**Table 5. Share of migrant workers on total workers in the health and non-health occupations (average 2011-2012)**

	<b>Germany</b>	<b>Spain</b>	<b>Ireland</b>	<b>Italy</b>	<b>UK</b>
<i>% migrants in health occupations</i>	5.5%	6.1%	18.0%	3.5%	9.0%
<i>% migrants in NON-health occupations</i>	9.4%	13.0%	14.5%	10.3%	9.0%

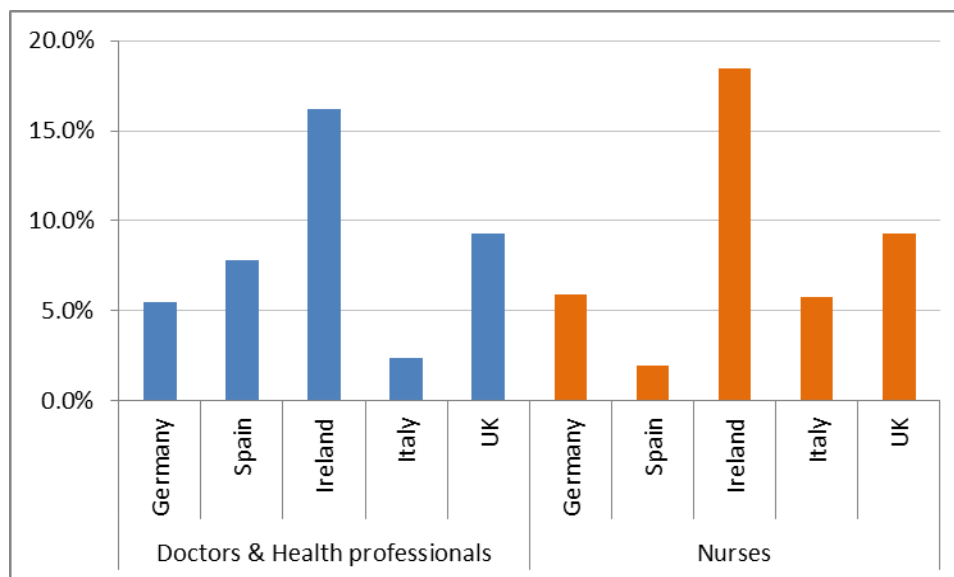
*Source: Our elaboration on Eurostat EU-LFS.*

Migrants are more present among nurses than doctors. Taking all the five countries together, migrant workers account for about 6.7 per cent of nurses and 5.8 per cent of doctors in the 2011-2012 period. However, as highlighted in Figure 3, the incidence of migrants in the two main segments of the health workforce is highly variegated across countries. Migrants account for a substantial share in both Irish nurses and doctors, though with a higher incidence among nurses. In Italy, the foreign contribution to the nurse segment is twice as high as it is among doctors. For Germany and UK no significant differences are

<sup>3</sup> For an analysis of the barriers faced by migrants in being recruited as doctors or nurses see the background reports prepared as part of the WORK-INT project

found in the incidence of migrants in the two segments of the health workforce. Figure 3 also shows that Spain is the only country in which the presence of migrant workers is higher among doctors than nurses. As a result, the MHW is dominated by nurses in Italy and Ireland, by doctors in Spain, while it is almost equally divided into nurses and doctors in UK and Germany.

**Figure 3. Share of migrant health workers among doctors and nurses (average 2011-2012)**



Source: Our elaboration on Eurostat EU-LFS.

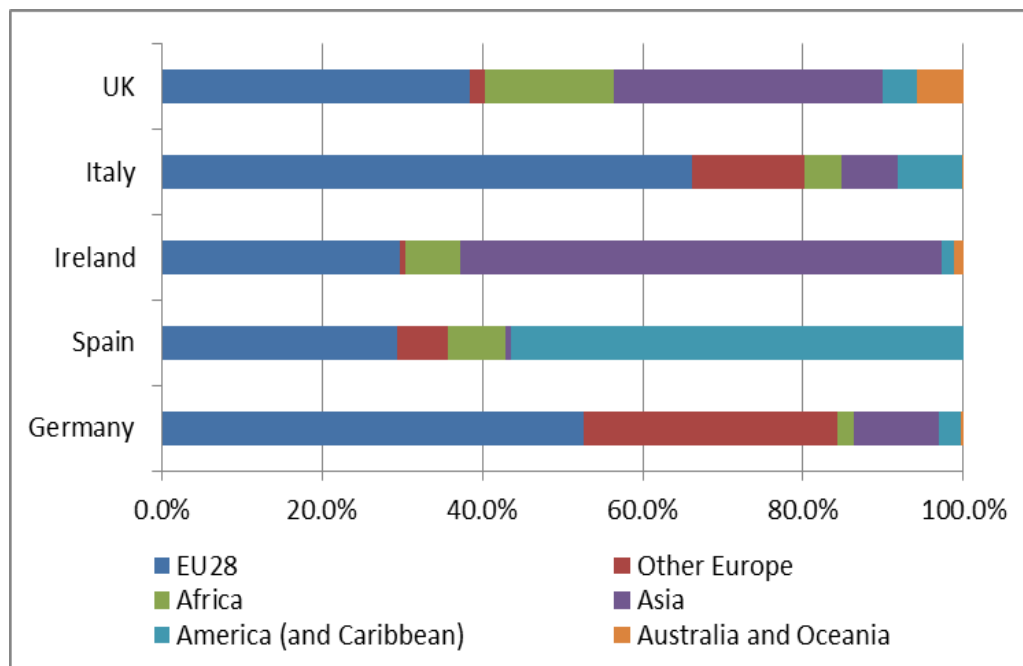
## 1.6 Characteristics of MHWs

In this section some main characteristics of the MHWs are reported. They include the distribution by nationality and by gender. The analysis by age does not highlight any significant pattern or peculiarity and thus not reported here. It is also not reported any analysis on the variable years of residence in the host country because it could be misleading given the criterion adopted to define the migrant population which is based on nationality (see section 1.4). In fact our group of MHWs includes those workers with a foreign nationality and exclude those ones with a migration background who have acquired the nationality of the host country, most likely the longer-term migrants. Furthermore, given the legal requirements in terms of the educational level necessary to be enrolled in the health occupations, which are different in the different

countries, the analysis on the educational achievements of migrant and native health workers is not very informative as it is determined by the above mentioned legal requirements, and thus omitted.

There is a substantial variation across the five EU countries in the main nationalities of MHWs (Figure 4)<sup>4</sup>. This is certainly driven by the different countries of origin of migration flows in the different host countries. However, for some countries, the composition in terms of nationalities of the migrant health workers substantially differs from the composition found in the overall migrant workforce.

**Figure 4. Migrant Health Workers by nationality (average 2011-2012)**



Source: Our elaboration on Eurostat EU-LFS.

<sup>4</sup> In the EU-LFS data, from reference year 2004 onwards, the following grouping for workers' nationality is available: National / Native of own Country; EU15; NMS10 (10 new Member States of 2004); NMS3 (3 new Member States of 2007); EFTA; Other Europe; North Africa; Other Africa; Near and Middle East; East Asia; South and South East Asia; North America; Central America (and Caribbean); South America; Australia and Oceania.

For the sake of clarity, in the graphs and tables of this section, the available nationality have been grouped into: EU28; Other Europe; Africa; Asia; America (and Caribbean); Australia and Oceania.



Considering the health workforce, Germany and Italy stand out for the massive presence of European migrant workers. In the German case, the highest share is represented by migrants coming from a non-EU28 country, in the Italian case, the vast majority (45 per cent of the total) is composed by migrants with nationality from the 3 latest 'New Member States' (particularly Bulgaria and Romania). In UK, Ireland and Spain, instead, more than 60 per cent of migrant health workers have a non-European nationality. However, also these three countries display a huge heterogeneity in the origin of their foreign health workforce. In fact, migrant health workers in UK come from all over the world, with a slightly more pronounced presence of Asian workers; in Ireland 58 per cent of MHW have a South-East Asian nationality; in Spain little less than half (45 per cent) of MHWs are South American nationals.

When comparing for the 5 countries of the present study, the nationalities of migrant health workers with that of migrant workers on average, we find that only in the case of Germany the composition of MHW mirrors that of migrant workers as a whole (Table 6). In most cases, composition by nationality of MHW is quite far from the average situation. The last row of Table 6 reports an index of dissimilarity in the composition of health and non-health occupations by nationality<sup>5</sup>. It shows that the country where the two distributions are mostly different is Ireland, followed by Italy, UK and Spain. Only for Germany the index displays a very low degree of dissimilarity in the nationality of MHW compared to the average migrant workforce. These descriptive statistics do not allow us to conclude about the presence of occupational segregation for some ethnic groups, however data clearly highlight that in most countries some groups of migrants specialize in health occupation: it is the case of Asian workers in Ireland and UK, Eastern Europeans in Italy and Latin Americans in Spain.

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<sup>5</sup> The index of dissimilarity (ID) reported here is based on the index proposed by Duncan and Duncan in 1955 (Duncan, O. B. & Duncan, B. 'A methodological analysis of segregation indexes', *American Sociological Review* 20:210-217, 1955). In our case the ID-index measures the sum of the absolute difference in the composition by nationality between the health and non-health occupations. The ID-index equals 0 in case of complete equality (where nationality in the health occupations is distributed similarly to the one in the non-health occupations) and 100% in the case of complete dissimilarity (where composition by nationality in the health and non-health occupations are totally different). The index of dissimilarity (ID) is defined as:

$$ID = \frac{1}{2} \sum_i \left| \frac{H_i}{H} - \frac{NH_i}{NH} \right|$$

Where **H** represents the total number of migrant workers in health occupations, **H<sub>i</sub>** the number of migrant workers in health occupations with nationality *i*, **NH** is the total number of migrant workers in non-health occupations, **NH<sub>i</sub>** migrant workers in non-health occupations with nationality *i*.

**Table 6. Migrant workers in health and non-health occupations by nationality (average 2011-2012)**

	Germany	Spain	Ireland	Italy	UK
<b>NON-HEALTH OCCUPATIONS</b>					
Nationality:					
EU15	28.9%	15.8%	28.3%	2.9%	23.5%
Other Europe	54.0%	22.9%	52.1%	54.9%	33.0%
Africa	3.2%	12.7%	5.7%	16.4%	10.4%
Asia	10.0%	5.1%	8.4%	16.9%	21.1%
America (and Caribbean)	3.6%	43.5%	4.5%	8.9%	8.2%
Australia and Oceania	0.4%	0.1%	0.9%	0.0%	3.8%
<b>HEALTH OCCUPATIONS</b>					
Nationality:					
EU15	28.3%	19.3%	23.5%	9.2%	26.6%
Other Europe	56.1%	16.5%	6.9%	71.1%	13.6%
Africa	2.0%	7.2%	6.8%	4.6%	16.1%
Asia	10.6%	0.6%	60.1%	6.9%	33.6%
America (and Caribbean)	2.8%	56.4%	1.6%	8.2%	4.2%
Australia and Oceania	0.2%	0.0%	1.2%	0.1%	5.8%
Index of dissimilarity	10.1%	21.7%	54.7%	36.7%	24.7%

Source: Our elaboration on Eurostat EU-LFS.

Table 7 analyses the importance of women among the national and migrant health workers. The feminization phenomenon already described, is found also when considering migrant workers only. However, the female presence appears to be slightly attenuated among migrant doctors and health professionals in most countries. The opposite happens among nurses where feminization is even more pronounced among migrants than among nationals. Feminization is particularly evident among MHW, both doctors and nurses, in Italy. In Germany and Spain women are very close to 90 per cent among migrant nurses, with respect an average of 86 and 83 per cent respectively for national nurses. Ireland and UK stand out by having a female presence, in both doctors and nurses, which is lower among migrant than among national health workers.

**Table 7. Share of female workers in the health sector by occupation and nationality (average 2011-2012)**

Occupation	Nationality	Germany	Spain	Ireland	Italy	UK
All health workers	Foreign	81.7%	55.9%	72.2%	77.1%	68.9%
	National	78.6%	68.4%	80.3%	59.6%	75.1%
Doctors and health professionals	Foreign	72.3%	47.0%	49.0%	64.4%	57.9%
	National	72.1%	58.2%	60.5%	49.6%	61.1%
Nurses	Foreign	90.1%	89.9%	85.0%	83.1%	82.5%
	National	86.0%	83.3%	93.4%	75.5%	90.2%

Source: Our elaboration on Eurostat EU-LFS.

### 1.7 Job characteristics and working conditions among health workers

In this section we investigate the working conditions of health workers by means of some indicators available in the LFS dataset.

The average working time for health workers in the five countries analysed is 35 hours a week for native workers and 36 for migrants. However, looking at cross-countries differences (Table 9) we observe that migrants work longer hours than natives in all countries with the exception of Germany. Such a difference is particularly pronounced in Ireland and UK and in Italy to a lesser extent. In more detail, higher gap in working hours between migrants and natives is found among nurses, and particularly in Spain and Ireland. In Ireland also migrant doctors and health professionals exhibit significantly longer working hours than natives.

The evidence on working hours is confirmed by the lower share of part-timers among migrants with respect to natives founded in all countries, except for Germany where part time work is quite diffused also among MHW. Again, the disadvantage for migrants in the participation to part-time working arrangements is stronger for nurses.

**Table 9. Hours of work and share of part-time work among health workers by nationality (average 2011-2012)**

		Average hours of work		% of part time jobs	
		Natives	Migrants	Natives	Migrants
<b>All health workers</b>	<i>Germany</i>	34.8	34.3	34.0%	35.8%
	<i>Spain</i>	35.9	37.1	12.2%	8.4%
	<i>Ireland</i>	31.9	36.3	24.6%	6.9%
	<i>Italy</i>	36.1	38.0	14.7%	5.2%
	<i>UK</i>	35.5	38.1	30.0%	17.8%
<b>Doctors and health professionals</b>	<i>Germany</i>	36.3	35.7	31.1%	30.3%
	<i>Spain</i>	36.6	36.2	12.7%	10.7%
	<i>Ireland</i>	32.1	36.9	19.1%	12.1%
	<i>Italy</i>	36.5	38.2	17.2%	9.8%
	<i>UK</i>	36.7	39.1	27.8%	15.5%
<b>Nurses</b>	<i>Germany</i>	33.0	33.0	37.3%	40.7%
	<i>Spain</i>	34.8	40.2	11.5%	0.0%
	<i>Ireland</i>	31.7	36.0	28.0%	4.3%
	<i>Italy</i>	35.6	37.9	11.1%	4.0%
	<i>UK</i>	34.3	36.9	32.4%	20.7%

Source: Our elaboration on Eurostat EU-LFS.

Table 10 reports three different indicators of incidence of non-standard work among health workers. The first panel shows the share of temporary or fixed term jobs. Working with a temporary contract is more likely among migrants than native health workers. This is particularly true in Spain where 44 per cent of migrant health workers have a temporary contract with respect to 22 per cent of natives. Working on a temporary basis is the rule for half of migrant doctors in Spain – with respect to only 20 per cent of native doctors- while the opposite happens for migrant nurses who are less likely than native ones to have a fixed-term job. Migrant doctors are employed with temporary contracts more often than migrant nurses also in the other countries analysed, however only in Italy, Ireland and UK the same situation is found among native health workers too.

The second panel reports the incidence of atypical schedules in the working day. It is the share of workers working in the evening or night, or on Saturday or Sunday. Being a health worker implies being subject to non-standard working schedule, however it appears that the occurrence of such non-standard schedule is higher among migrants than natives in all the five countries and more frequent for nurses. This difference is particularly high in Ireland, Italy and Spain, less so in Germany.

Finally, the last panel of table 10 shows the share of health workers doing shift work. Again, with the only exception of Spain where only few differences are detected, shift work is carried out more by migrant workers than native health workers, with migrant nurses bearing most of the burden. The higher differences in the incidence of shift work across worker groups are found in Italy, Ireland and UK where on average more than half of the migrant health workforce work shift. This share goes up to over 70 per cent in the case of migrant nurses.

**Table 10. Share of non-standard work (Temporary jobs, Atypical schedules of working time and shift work) among health workers by nationality (average 2011-2012)**

		% of Temporary jobs		% of Atypical schedules		% of Shift work	
		Natives	Migrants	Natives	Migrants	Natives	Migrants
<b>All health workers</b>	<i>Germany</i>	15.0%	21.8%	74.3%	75.3%	38.6%	41.7%
	<i>Spain</i>	22.7%	44.3%	61.2%	73.4%	30.9%	29.5%
	<i>Ireland</i>	7.4%	7.3%	67.6%	83.3%	41.4%	60.3%
	<i>Italy</i>	6.0%	11.5%	60.6%	74.4%	36.3%	56.6%
	<i>UK</i>	4.0%	8.8%	63.8%	71.1%	36.8%	47.9%
<b>Doctors and health profess.</b>	<i>Germany</i>	13.3%	24.8%	62.8%	63.6%	11.5%	15.5%
	<i>Spain</i>	19.6%	52.3%	56.8%	66.2%	16.6%	24.0%
	<i>Ireland</i>	8.9%	16.8%	59.8%	70.3%	17.0%	36.4%
	<i>Italy</i>	7.4%	14.7%	53.1%	44.4%	21.6%	21.2%
	<i>UK</i>	5.2%	11.2%	55.9%	59.8%	16.4%	23.7%
<b>Nurses</b>	<i>Germany</i>	17.0%	19.0%	87.1%	85.9%	69.1%	65.4%
	<i>Spain</i>	27.2%	15.1%	67.4%	100.0%	51.4%	49.6%
	<i>Ireland</i>	6.4%	2.1%	72.7%	90.3%	57.1%	73.3%
	<i>Italy</i>	3.7%	10.0%	72.4%	88.4%	59.2%	73.1%
	<i>UK</i>	2.8%	5.7%	72.1%	85.1%	58.5%	77.7%

Source: Our elaboration on Eurostat EU-LFS.

## A look to the past: migrant health workers in years 2006-2010

In the first paragraph we have pointed out that, due to the change in the occupations' classification, a comparison of earlier data with the latest available is not viable. It is however possible to analyse some trends for the first decade of the millennium relying on the isco-88 classification of occupations. In this section some statistics on migrant health workers referring to the period 2006-2010 are presented for the five WORK-INT countries. Selection of health workers is performed according to Table 2b.

The incidence of the foreign workforce in the health occupations is rather stable in the past five years. However, when comparing the health with the non-health occupations, the health profession appears to be less attractive (or more inaccessible) than the other professions for migrant workers. In fact, in the majority of the countries analysed, the share of migrant workers in the non-health occupations increases in this period. The incidence of migrants in the health workforce, on the contrary, increases at a much slower pace (Germany, Spain and Italy), or decreases (UK and Ireland).

**Table 11. Share of foreign workers on total workers in the health and non-health occupations (year 2006-2010)**

	Germany		Spain		Ireland		Italy		UK	
	Non-health	Health	Non-health	Health	Non-health	Health	Non-health	Health	Non-health	Health
<b>2006</b>	6.7%	3.5%	12.6%	3.9%	12.7%	18.3%	6.1%	2.1%	6.3%	12.2%
<b>2007</b>	6.7%	3.3%	13.9%	4.4%	15.0%	18.2%	6.7%	3.0%	7.2%	13.6%
<b>2008</b>	9.0%	3.2%	14.6%	3.9%	16.1%	20.5%	7.8%	3.0%	8.0%	13.1%
<b>2009</b>	8.7%	4.6%	14.1%	3.9%	14.1%	17.0%	8.6%	3.3%	7.9%	11.9%
<b>2010</b>	8.9%	3.7%	13.7%	4.1%	12.4%	15.8%	9.5%	3.4%	8.2%	11.1%

Source: Our elaboration on Eurostat EU-LFS.

Within the MHW, the two components analysed in the previous section, doctors and nurses, haven't followed the same trend in the observed period in the WORK-INT countries (Table 12). In Germany and Spain the presence of migrant nurses and midwives has increased while at the same time that of migrant doctors has decreased. This has brought to a strengthening of the nursing component among MHW in these two countries. The opposite has happened in UK and, to a lower degree, in Ireland where migrant doctors have grown more than nurses in the 5-years-period analysed.

**Table 12. 5-years growth rate of MHW by occupation and share of nurses on MHW (year 2006-2010)**

	Germany	Spain	Ireland	Italy	UK
<b>2006-2010 growth rate</b>					
Doctors	-8.4%	-13.2%	2.6%	n.a	13.7%
Nurses	44.5%	174.9%	-3.7%	n.a	-34.8%
<b>Share of nurses on MHW</b>					
2006	46.1%	11.8%	66.9%	n.a.	47.1%
2010	57.5%	29.8%	65.5%	n.a.	33.8%

Source: Our elaboration on Eurostat EU-LFS. Data for Italy not reliable and not presented

## Conclusions

This paper presents some descriptive statistics about migrant health workers in five European countries: Germany, Spain, Ireland, Italy and UK.

The incidence of migrant workers in the health sector is very heterogeneous across such countries and goes from 18 per cent in Ireland to 3.5 per cent in Italy and, being Ireland the only exception, it is lower than the average incidence of foreign workers in employment. This result, combined with the evidence of a substantial stability of the phenomenon over the last years - in a scenario where the foreign presence has grown on average - highlights the difficulties faced by migrant workers to be employed as health workers in most EU countries.

Migrants appear also to be prevented from acceding the highest level of the profession in some countries. In Germany and Italy, for instance, doctors are the majority of the health workers among natives, but, when restricting the analysis to migrants only, we find that nurses are by far the most important component.

A well-known aspect of the health sector is the large presence of female workers (70 per cent of the total health workforce); perhaps less known is that the feminization phenomenon is present also when considering the migrant health workers only, and even more pronounced in Italy and Germany.

Looking at the working conditions, our analysis has shown that migrant health workers are subject, in most cases, to less favourable working conditions than natives. They appear to work longer hours and to have a higher incidence of temporary contracts, non-standard working schedule and shift work than their native colleagues.