
Portuguese skilled migration in DIOC 2010/11

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OEm Fact Sheets

08

June 2018

According to the data of DIOC 2010/11 (Database on Immigrants in OECD Countries), there were one million and 400 thousand Portuguese emigrants in OECD countries. Regarding educational attainment, the majority of Portuguese emigrants had a low level of education, namely in the countries which had the highest stock of migrants. Nevertheless, it is possible to verify a progressive qualification of the emigrants according to the duration of stay. An increase in the number of Portuguese emigrants which have a high level of education has been recorded when the duration of stay is more recent, i.e., one year or less. Thereby, the recent emigration tends to be a more skilled one.

Keywords Skilled migration, Portugal, OECD, DIOC.

Título Emigração portuguesa qualificada na DIOC 2010/11.

Resumo De acordo com os dados da DIOC 2010/11 (base de dados sobre imigrantes portugueses nos países da OCDE), cerca de 1 milhão e 400 mil portugueses estavam emigrados em países da OCDE. No diz respeito às qualificações, os emigrantes portugueses possuíam maioritariamente um nível de escolaridade baixo, incluindo nos países com um maior *stock* de emigrantes portugueses. Ainda que existisse um predomínio de emigrantes com baixa escolaridade, assiste-se a um aumento do número de emigrantes com escolaridade mais alta no caso dos que emigraram mais recentemente, isto é, quando o tempo de estadia corresponde a um ano ou menos. A emigração mais recente tende, pois, a ser mais qualificada.

Palavras-chave Emigração qualificada, Portugal, OCDE, DIOC.

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1 Portuguese migration in DIOC 2010/11

In order to characterize skilled Portuguese migration, the database on immigrants in OECD – DIOC, 2010/11, fourth revision – was analyzed.¹ This database compiles microdata from the national census of the OECD countries,² including information about place of birth, demographic characteristics, duration of stay, educational attainment, and labor market integration, among others.³

The data extracted from DIOC 2010/11 covers migrants aged 15 and above born in Portugal and living in one of the OCDE countries at 2010/11. The database contains four files, A to D, focused in specific themes. Each one includes a number of variables, some common to the other files, others specific to it. This generates a great variety of cross-tabulations on the characteristics of migrants born in Portugal and living in OECD countries. File A includes migrants of all ages, but it was not used because of some limitations. There are different values for the migrant population in the files A to B and it results in distinct numbers of Portuguese emigrants by country. For example, Germany records 5,454 in file A and 76,724 in file B. Additionally, in file D the variable sex shows 59,2% of missing's. Therefore, it was impossible to cross this independent variable with occupations, what could have been interesting. The same happened with “over qualification” with the value of 86.3% missing's which makes it impossible to analyze in detail.

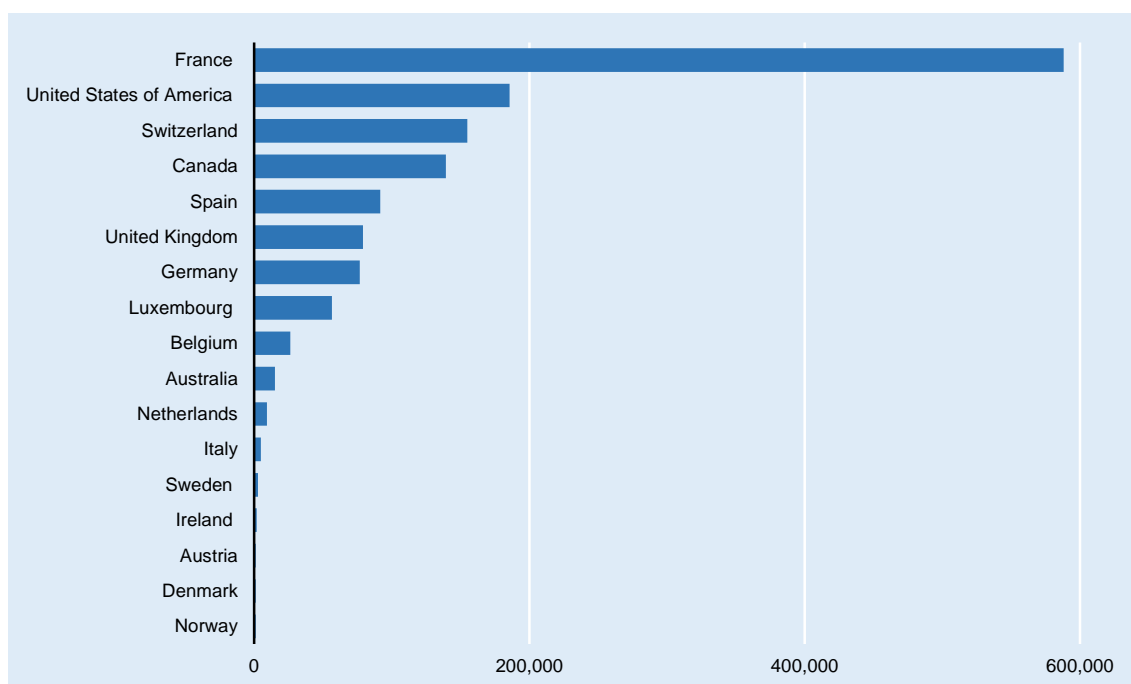
The database was examined through SPSS, selecting only the cases where the country of birth is Portugal and the country of residence is not Portugal. It should be noted that census allow the analyses of the stock of migrants since it consists in the universe of residents in a country and it counts the people who lives there. Consequently, census are the most reliable data to analyze migrant populations because they allow the description of the sociodemographic structure, including place of birth values, whereas annual data, depending on the accounting of the inflows in the destination countries, is usually based on citizenship records. And foreign citizenship does not mean migrant status.

¹ The Organization for Economic Co-operation and Development (OECD) is an intergovernmental organization founded in 1960 and has, nowadays, 35 member countries.

² For more and detailed information see *DIOC 2010/11: Variables, Coverage, Sources*, a methodological note by OECD - <http://www.oecd.org/els/mig/methodology-DIOC-2010-11.pdf> and the report *A New Profile of Migrants in the Aftermath of the Recent Economic Crisis*, <http://dx.doi.org/10.1787/5jxt2t3nnjr5-en>.

³ For some countries, OECD also used population registers and data from the labour force survey to fill gaps in census.

Chart 1 Stock of Portuguese-born emigrants in OECD countries, 2010/11



Note Only countries with more than one thousand Portuguese migrants.

Source Chart by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

According to DIOC 2010/11 there were 1,437,973 Portuguese-born living abroad, of which 51,7% (743,415) were male and 48,3% (694,558) were female (see table A2).⁴ This means that the distribution between sexes was balanced. Chart 1 show the countries with more than one thousand of Portuguese-born migrants, where France (588,218) stands out, followed by USA (185,629), Switzerland (154,818) and Canada (139,365). France continues to be the country where more Portuguese migrants live due to the long history of emigration to this destination in the past.⁵ If one considers the values of permanent inflows,⁶ it is of notice that today the countries recording a greater number of entrances are the United Kingdom, France, Switzerland and Germany. This mean that people are leaving Portugal, a European peripheral country, and going to core countries of Europe. It is impossible to know if these migrants have a higher level of education. We need to wait for the 2020/21 census to characterize this more recent Portuguese emigration.

⁴ DIOC 2010/11, version 4, file B.

⁵ Regarding the total number of Portuguese emigrants, but the country with the highest number of Portuguese emigrants in relation to the total population is Luxembourg.

⁶ See Observatório da Emigração, *Portuguese Emigration Factbook 2016*.

In relation to chart 1, one more point should be noted. As stated by Observatório da Emigração,⁷ “(the) stock of the population born in Portugal but residing abroad increased across all main destination countries, with the exception of Spain. The number of Portuguese arrivals to Spain in recent years has been insufficient to compensate for the number who either returned to Portugal or moved on to another country as a result of the crisis (as well as those who died in Spain”. So, it is likely that in next census stock of emigrants will be higher in the UK than in Spain.

⁷ See Observatório da Emigração, *Portuguese Emigration Factbook 2015*.

2 Educational attainment

According to Parsons et al. (2014), we can adopt three approaches to conceptualize high-skilled migration, namely, migrant's education level, occupation and salary. In this paper, it is used the first approach because of the variables available in DIOC.

Portuguese emigration in the XXI century includes more skilled individuals than in the XX century.⁸ However there are more migrants with low qualifications (chart 2),⁹ even in the case of the migrants which the duration of stay is one year or less (chart 5). Taking into account the educational attainment, only 10,6% of the stock of Portuguese emigrants living in OECD countries had a high educational attainment [ISCED 5A/5B/6], that is, the first level (Bachelor and Master) or second level of tertiary education (PhD).¹⁰ Moreover, there were 62.4% individuals with low qualifications (pre-primary/primary/lower secondary education) and 26.9% with medium qualifications (upper secondary/post-secondary non-tertiary education). Moreover, according to the *Portuguese Emigration Factbook 2015* (Observatório da Emigração: 33), the values of Portuguese-born emigrants with high educational increased 6.2% (census 2000/01) to 10.5% (census 2010/11) whereas the values of low educational attainment decreased 69.4% (census 2000/01) to 62.1% (census 2010/11).

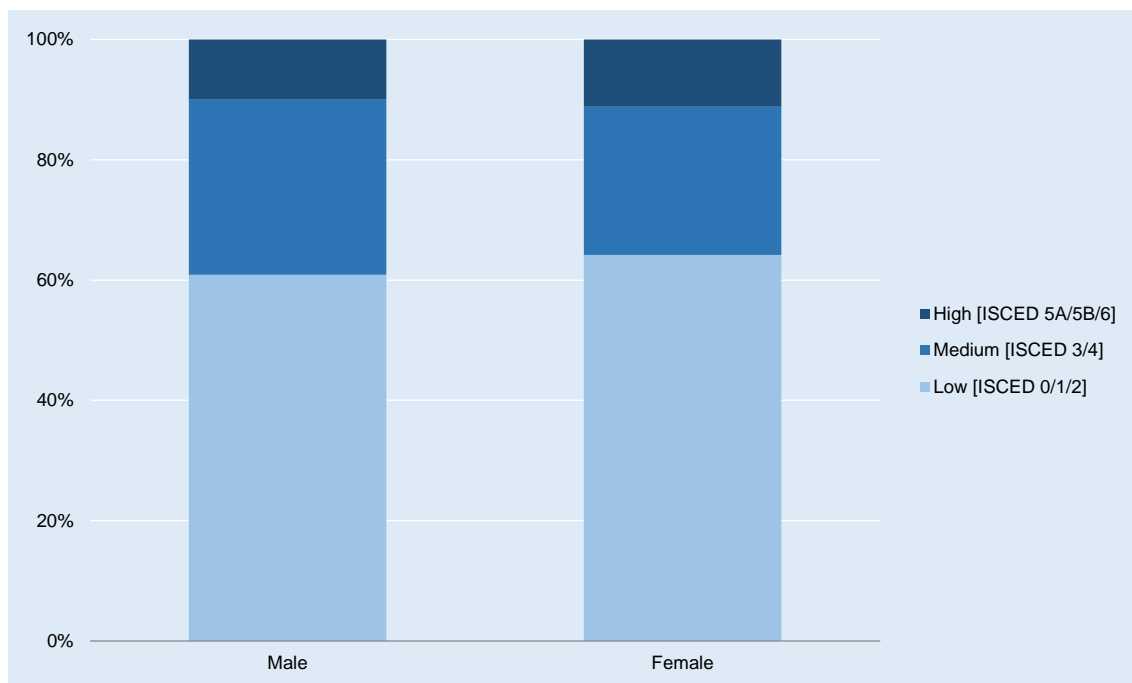
Chart 3 introduces the data on the stock of Portuguese-born emigrants in the OECD countries with high educational attainment. No country records a majority of Portuguese migrants as highly educated, which means that high skilled migrants tend to be generally a minority. However, Norway (39.8%), the United Kingdom (38.3%) and Ireland (36.6%) have high proportions of Portuguese migrants with tertiary education. Luxembourg is the country with the lowest proportion of Portuguese-born emigrants high educated (4.1%).

⁸ Without information about the individuals age of entry in the host country, it is not possible to know where qualifications were acquired.

⁹ Table A2 in appendix shows the total number and percentage of Portuguese emigrants by educational attainment.

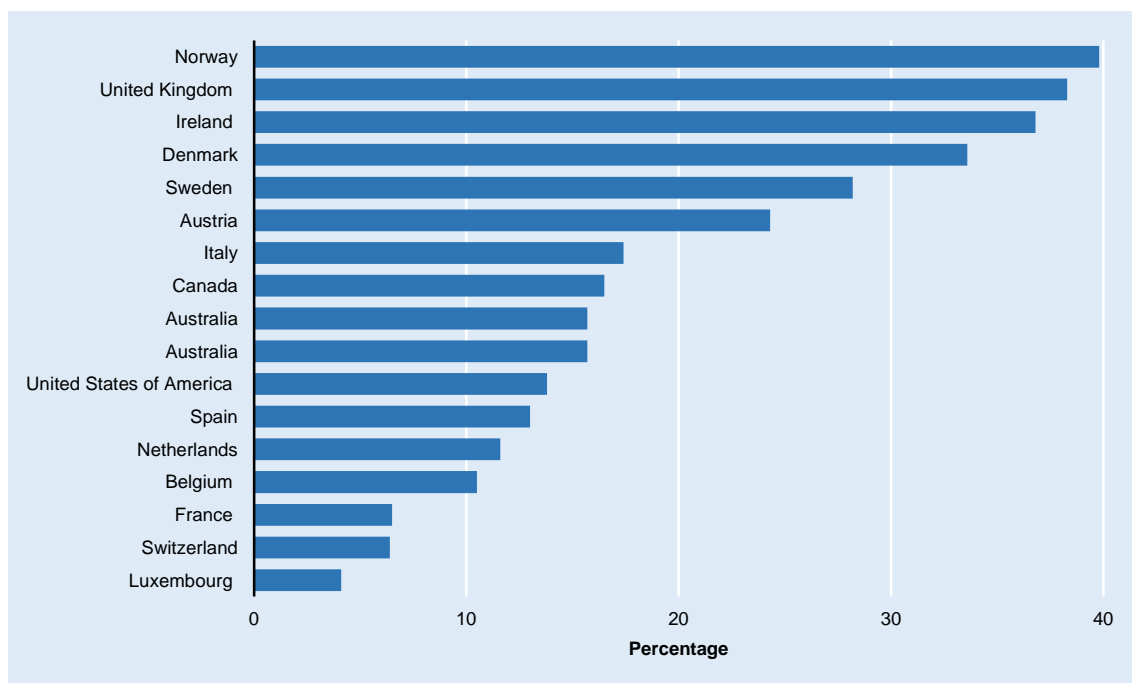
¹⁰ ISCED is the reference to the international classification for organizing education programs and related qualifications by levels and fields. Nowadays, it is constituted by nine levels of education, from level 0 to level 8 (tertiary education), but when the census were completed there existed only six levels, which are represented in this paper.

Chart 2 Stock of Portuguese-born emigrants in OECD countries by educational attainment and sex, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Chart 3 Stock of Portuguese-born emigrants in OECD countries with tertiary education, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

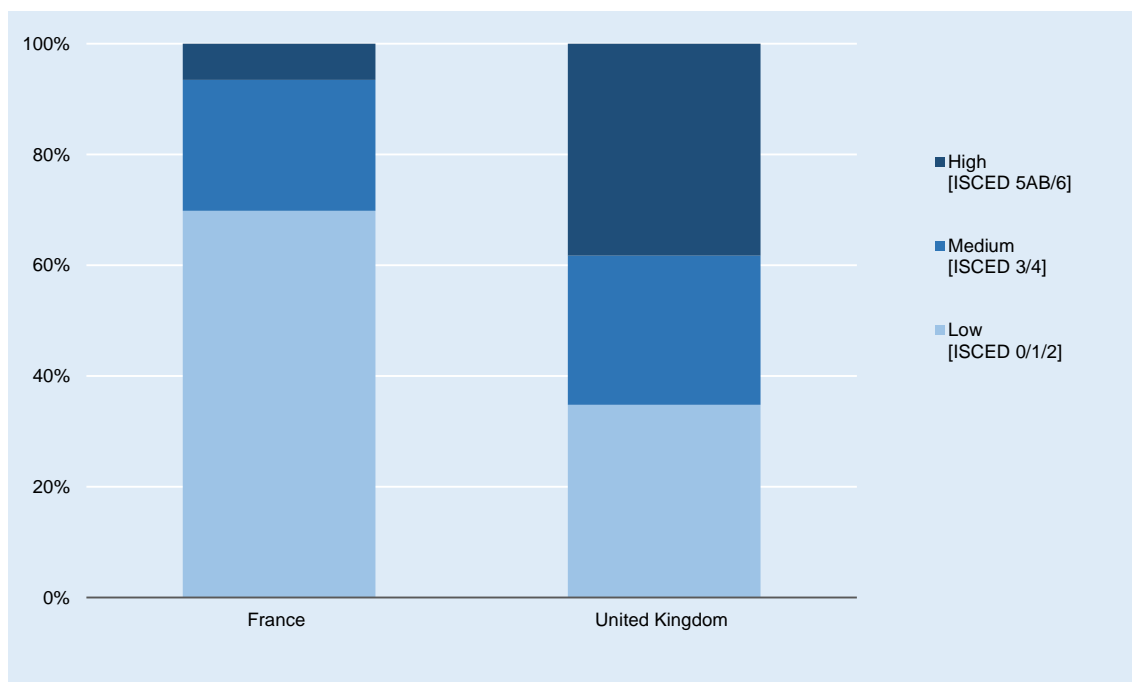
While analyzing the values concerning educational attainment in the United Kingdom (UK) and France (chart 4), it is possible to conclude that there are more highly Portuguese-born migrants in the UK than in France. Although they are both the main countries of destination (permanent inflows in 2016) for Portuguese emigrants, France, in relative terms, considering only the migrants living there, shows a higher proportion of low educated individuals (69,8%) and a significantly low proportion of high educated individuals (6,5%).¹¹ Inversely, United Kingdom has higher qualified Portuguese migrants (38.3%), although it has a similar proportion of low qualified individuals (34.8%).

There may be a lot of reasons that explain this, for instance, policies in United Kingdom that discriminate in favor of skilled and educated migrants (Özden, 2006) or, in geographical terms, France is closer to Portugal and therefore the lower educated Portuguese with fewer resources have higher accessibility to this country. Moreover, historically, France is the oldest main destination of Portuguese's since World War II when the emigration flow was essentially intra-European (Pires et al., 2010). Russel King conceptualizes London as a Eurocity and a global city which attracts people from different continents: Africa, Latin America and Europe, especially Eastern Europe. There are two reasons that could explain this: the first is that the London labor market was and still is relatively immune to the recent crisis; and the second is that the London labor market allowed "a welcome refuge for graduates fleeing unemployment, blocked career paths or mere boredom in their home countries" (King, 2016: 4). It is likely that the Portuguese migrants, particularly the higher educated ones, are part of those affected by the European and domestic crisis. Thus, it was expected to observe the rise of UK to a position of much greater dominance for current intra-European flows as it is observed in the Portuguese emigration case. Furthermore, in Portugal English is nowadays more spoken than French, what facilitates emigration to UK (Peixoto et al., 2016: 94). There is also recent skilled emigration as a result of UK's employment agencies, such as the migration of Portuguese nurses (Pires et al., 2015). According to a survey reported by Observatório da Emigração, 83% of the nurses were working in the UK through employment agencies.¹²

¹¹It should be highlighted that the other countries with major stocks of Portuguese-born emigrants in OECD 2010/11 also show a higher proportion of low educated individuals: Switzerland (64,9%); Spain (74,1%); USA (47,4%) and Canada (53,2%). For more information see: Table A2, in the appendix.

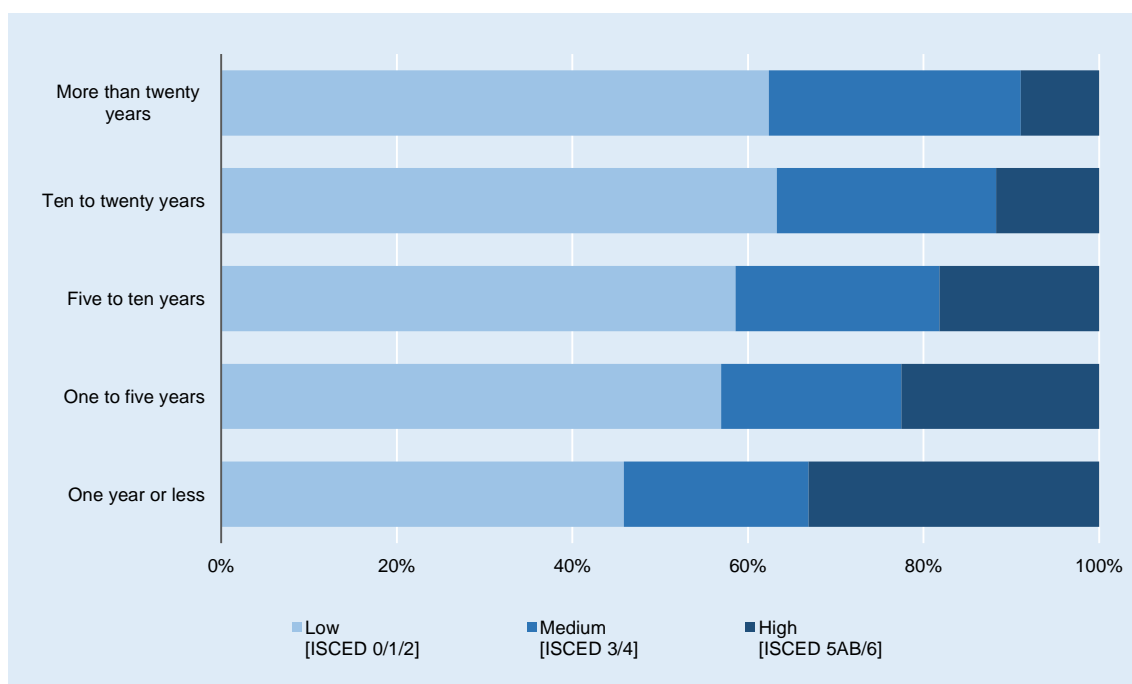
¹² For more information see: <http://observatorioemigracao.pt/np4EN/4317.html>.

Chart 4 Stock of Portuguese-born emigrants in France and United Kingdom by educational attainment, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Chart 5 Stock of Portuguese-born emigrants in OECD countries by duration of stay and educational attainment, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Chart 5 (stock of Portuguese-born emigrants in OECD countries by duration of stay and educational attainment, 2010/11) shows the relation between duration of stay and educational attainment. There are fewer highly qualified individuals when the duration of stay increases – “one year or less” (33.1%) and “more than twenty years” (8.9%). Conversely, there are lower qualified individuals when the duration of stay is longer – “one year or less” (45.9%) and “more than twenty years” (62.4%). Although, the latter (low qualified individuals) are the most predominant in all duration of stay categories, except for the one year or less (45,9%) category. The individuals with medium educational attainment show the same pattern as the ones with the lower educational attainment.

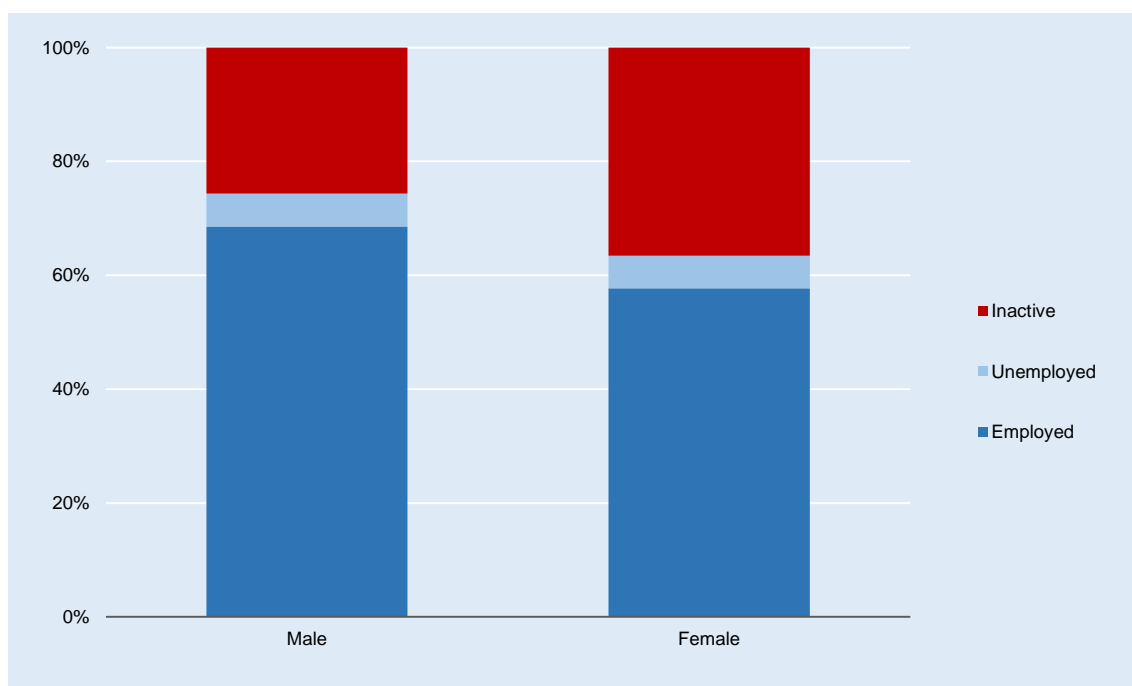
There are two points that should be emphasized. First, this data may be somewhat ambiguous, given that there is not data about the age that people entered in the host country, which therefore does not allow the knowledge of where those qualifications were acquired. For instance, individuals with higher educational attainment and living abroad from ten to twenty years or more are more likely to have acquired those qualifications in the host country.

It is impossible to know how long these emigrants will stay outside of Portugal, however, it is noted that Portuguese emigrants which are living abroad for one year or less, in 2010/11 census, show higher qualifications compared to longer duration of stay. Thus, recent emigration is more skilled.

The majority of migrants are employed in their host countries (63%) and about 6% are unemployed (table A5).¹³ Besides that, 30% are inactive, which is still too much. Inactive refer to the ones which are not employed or unemployed like students, domestics and retired people. Thereby, inactive shows a bigger proportion in aged groups (65+), where constituted 94.2% of the total and 39.1% of 15-24 aged group (table A7). Conversely, the group aged between 25-64 shows a bigger proportion of employed individuals (72.8%) and only 20.6 inactive. Through chart 6, it is possible to conclude that male individuals record a bigger proportion employed (68.6%), whereas female are also mostly employed (57.7%). In relation to unemployed, the values are balanced between sexes. Lastly, the female migrants show a bigger proportion of inactive people (36.6%).

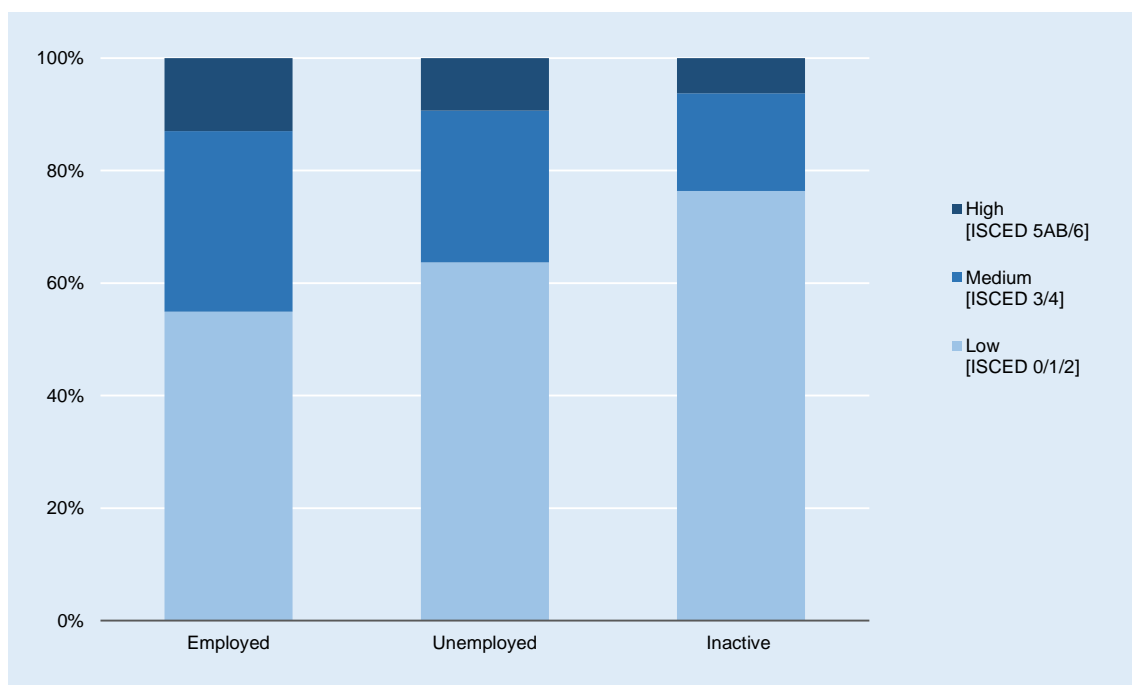
¹³ The frequency table with absolute values can be consulted in the appendix A6.

Chart 6 Stock of Portuguese-born emigrants in OECD countries by labor force status and sex, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Chart 7 Stock of Portuguese-born emigrants in OECD countries by labor force status and educational attainment, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Regarding the labor force status link to educational attainment (chart 7 and table A9) it is possible to mention two important conclusions. Firstly, in global terms, there are individuals with low educational attainment in all categories of labor force status, although the values are higher in relation to the ones in a situation of unemployment (63, 7%) or inactiveness (76, 4%). The higher educated individuals are the lowest in all categories, which is considered normal in proportional terms (considering that the most educated individuals are less in the total of universe), and the values decrease even further when the individuals are unemployed or inactive, respectively 9.4% and 6.3%. Secondly, the values of educational attainment by labor force status (table A9) demonstrate that individuals with higher qualifications and employed (76.9%), in relative terms (considering only the total of individuals with high educational attainment), are more than the ones with lower qualifications and employed (56.2%) (table A2). Medium educated individuals (74.7%) are identical to higher educated ones. At last, inactive individuals are more when the educational attainment is lower, even though there are more individuals with this attainment and employed.

The six major countries of the stock of Portuguese-born emigrants constitute approximately 85% (733,459 thousands) of employed people.¹⁴ Of these countries, the United Kingdom is the one with more people employed (67.3%), followed by France (61.5%), the USA (56.9%), Canada (53.6%) and Spain (45.9%).¹⁵ The proportion of unemployment is small in all countries, in which Canada reports the lowest (3.1%).

As referred by Iredale (2010: 8) “individuals [especially the highly skilled] often seek to maximize return on their investment in education and training by moving in search of the highest paid and/or most rewarding employment”. Thus, it is important to analyze the type of occupations of Portuguese migrants and whether they correspond to their qualifications or if there is over qualification.

According to ISCO 2008 Occupations (chart 8),¹⁶ which excludes the USA, craft and trade workers (24,9%) and elementary occupations (14,0%) constitute the bigger proportion (48,7%) of individual’s occupations, while in the occupations which demand high skills such as professionals, managers and technicians (8,2%) there are only 18,4% of the Portuguese migrants. The USA occupations (table A14) show a similar structure to that of ISCO, with the majority of migrants (55.0%) in the country having occupations that do not require high skills

¹⁴ Table A8 in appendix.

¹⁵ Indeed, Switzerland is the one with more people employed (84,4%) but labor market data for this country is based in labour force survey covering only people aged 15-64 years.

¹⁶ ISCO 2008 is the International Standard Classification of Occupations and its main objective is to provide a system for classifying and aggregating occupational information obtained by means statistical census and surveys, as well as from administrative records. It allows us to compare international data available because it is used by almost all countries.

such as:¹⁷ production (13.7%); construction and extraction (12.2%); office and administrative support (11.8%); building and grounds cleaning and maintenance (9.1%) and sales and related (8.2%). However, about 47.4% of the individuals have a low educational attainment, something that might explain the distribution of low skill occupations. Besides that, there are approximately 10% of the individuals in management occupations and 2.7% have a business or financial related occupation. The latter represent jobs which appeal to more qualified people and are likely to be pursued by individuals with high educational attainment, that is 13,8% of the Portuguese migrants in the USA.

Examining the educational attainment part of the ISCO 2008 (table A13) again, the reported data allows the observation of the main occupations of high educated individuals, namely, professionals (64,0%), technicians and associated professionals (27,9%), managers (31,4%), whereas the jobs that demand lower skills are also practiced by individuals with low qualifications.¹⁸ Thus, it is likely that there is a predominance of continuity between occupations and the educational level of the Portuguese emigrants.

Skill level of occupation also allows us to verify what was mentioned above (chart 9).¹⁹ The bigger proportion of individuals with low educational attainment are in skill level 1 (29.3%) and skill level 2 (62.5%), while level 3 has a higher proportion of individuals with high qualifications (57.4%).

The three highest skilled occupations (table A12), in relative terms, are more practiced by migrants that live in Canada (29.5%) and the UK (26.9%).²⁰ Although taking into account only the elementary positions in the six major countries of Portuguese migration, the UK is the country that has the highest proportion of individuals with jobs related to elementary positions.²¹ Besides that, France is the one which demonstrates the majority of individuals working in the three lower skilled occupations (64.2%) almost corresponding to the percentage of individuals that obtain low educational attainment (69.8%).

¹⁷ Özden (2006: 232) also used two categories – high skilled and low skilled – to examine the data more generally.

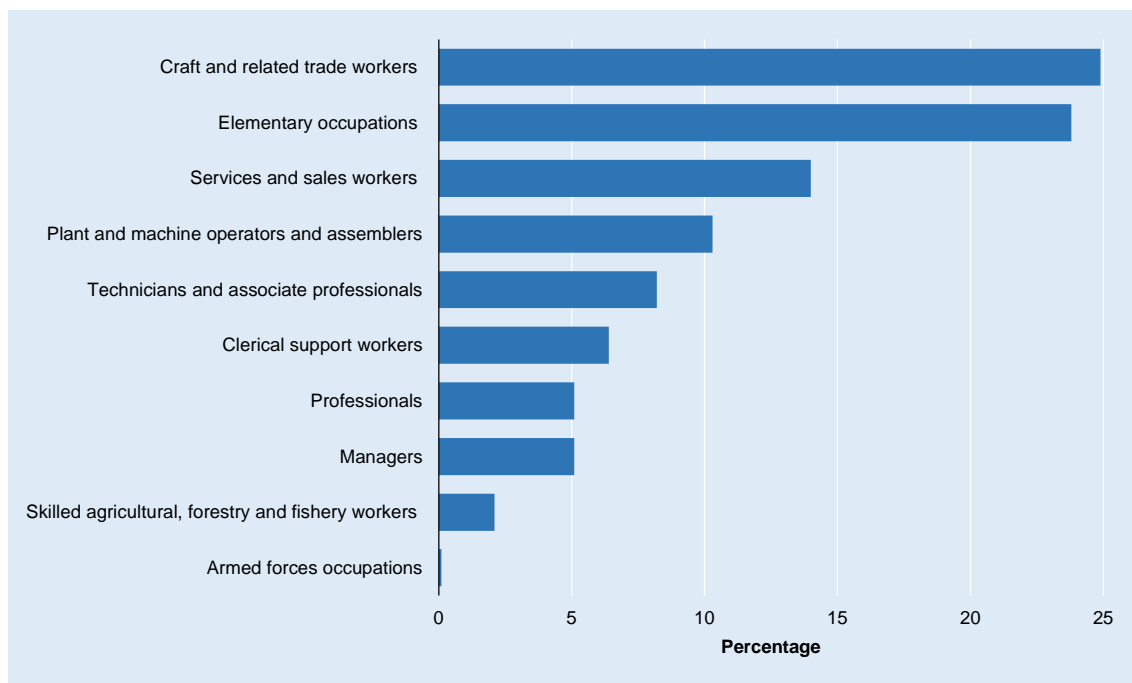
¹⁸ These occupations are craft and related trade workers (65,4%), Plant and machine operators and assemblers (63,2%) and elementary occupations (77,8%), which reports the majority of Portuguese emigrants with low educational attainment.

¹⁹ This variable is constructed through skills levels of ISCO, where the first and second level involve jobs which do not require high levels of education, whereas the third and fourth level demand for higher skilled individuals (ISCED- 5 to 6). More information in http://www.ilo.org/wcmsp5/groups/public/---dgreports/---dcomm/---publ/documents/publication/wcms_172572.pdf, pages 12-15.

²⁰ Followed by Spain (21,3%), France (16,7%) and Switzerland (13,5%).

²¹ Except the USA because they do not use the same typology.

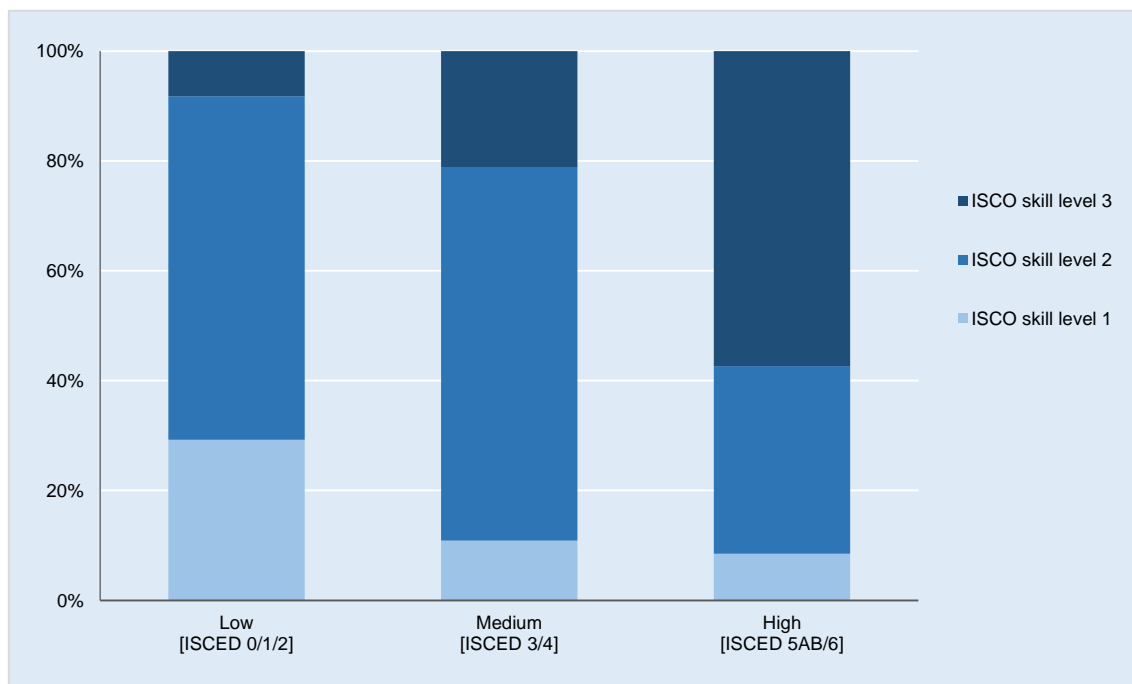
Chart 8 Stock of Portuguese-born emigrants in OECD countries by occupation, 2010/11



Note ISCO 2008 Occupations

Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Chart 9 Stock of Portuguese-born emigrants in OECD countries by educational attainment and skill level, 2010/11



Source Chart by Observatório da Emigração [Emigration Observatory], author’s calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Özden (2016: 227) affirmed that “the type of jobs that the migrants obtain is a crucial issue that influences their performance in the destination country. This is especially important for the highly educated migrants (...)”. Thus, as already stated above, it becomes relevant to perceive if occupations of individuals correspond to their qualifications or if there is over qualification. Despite the pertinence, it is impossible to make a correct analysis of the data regarding over qualifications due to database problems (table A15) where there is a significant amount of missing’s (86,3%).

3 Concluding remarks

In 201/11 Portugal was a country that was going through a domestic crisis which contributed to the reduction of opportunities in the national labor market for individuals as well to the worsening of their standard of living. Thus, those who had resources like a high educational attainment and an extensive network end up having a greater opportunity to emigrate and to maximize their opportunities to have a better life. Additionally, the internationalization of professions and labor markets and the policies underlying them, at the national and the international levels, promote and facilitate their mobility. And the ones who emigrate are especially going to the Europe's core as predicted by "the theory of core-periphery structures".

Given the growth of flows in recent years, it will be necessary to wait for the next census to see if the stock of qualified migrants continues to increase or if the stabilization of the crisis in Portugal has contributed to maintain or decrease the stock of Portuguese-born emigrants.

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Appendix (tables)

Table A1 Stock of Portuguese-born emigrants in OECD countries by country of residence, 2010/11

| Country of residence | Number | Percentage |
|--------------------------|------------------|--------------|
| Total | 1,437,973 | 100.0 |
| Australia | 15,101 | 1.1 |
| Austria | 1,150 | 0.1 |
| Belgium | 26,358 | 1.8 |
| Canada | 139,365 | 9.7 |
| Chile | 13 | 0.0 |
| Cyprus | 109 | 0.0 |
| Czech Republic | 52 | 0.0 |
| Denmark | 1,138 | 0.1 |
| Estonia | 23 | 0.0 |
| Finland | 327 | 0.0 |
| France | 588,218 | 40.9 |
| Germany | 76,724 | 5.3 |
| Greece | 313 | 0.0 |
| Hungary | 242 | 0.0 |
| Iceland | 273 | 0.0 |
| Ireland | 1,939 | 0.1 |
| Israel | 57 | 0.0 |
| Italy | 4,835 | 0.3 |
| Luxembourg | 56,450 | 3.9 |
| Malta | 12 | 0.0 |
| Mexico | 320 | 0.0 |
| Netherlands | 9,399 | 0.7 |
| Norway | 1,126 | 0.1 |
| Poland | 236 | 0.0 |
| Russian Federation | 80 | 0.0 |
| Slovakia | 22 | 0.0 |
| Slovenia | 20 | 0.0 |
| Spain | 91,585 | 6.4 |
| Sweden | 2,840 | 0.2 |
| Switzerland | 154,818 | 10.8 |
| United Kingdom | 79,199 | 5.5 |
| United States of America | 185,629 | 12.9 |

Note Non-OECD countries also included: Cyprus, Malta, and Russian Federation.

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A2 **Stock of Portuguese-born emigrants in OECD countries by country of residence and educational attainment, 2010/11**

| Country of residence | Total | Number | | | Percentage | | |
|--------------------------|------------------|-------------------------|-----------------------|--------------------------|-------------------------|-----------------------|--------------------------|
| | | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] |
| Total | 1,413,577 | 883,221 | 380,862 | 149,494 | 62.5 | 26.9 | 10.6 |
| Australia | 13,604 | 6,966 | 4,498 | 2,140 | 51.2 | 33.1 | 15.7 |
| Austria | 1,150 | 545 | 326 | 279 | 46.4 | 28.3 | 24.3 |
| Belgium | 16,742 | 11,910 | 3,067 | 1,765 | 71.1 | 18.3 | 10.5 |
| Canada | 139,365 | 74,080 | 42,275 | 23,010 | 53.2 | 30.3 | 16.5 |
| Chile | 13 | | | 13 | | | 100.0 |
| Cyprus | 109 | 23 | 68 | 18 | 21.1 | 62.4 | 16.5 |
| Czech Republic | 52 | | 16 | 36 | | 30.8 | 69.2 |
| Denmark | 657 | 167 | 269 | 221 | 25.4 | 40.9 | 33.6 |
| Estonia | 22 | 1 | 3 | 18 | 4.5 | 13.6 | 81.8 |
| Finland | 327 | 201 | 52 | 74 | 61.5 | 15.9 | 22.6 |
| France | 588,218 | 410,850 | 139,157 | 38,211 | 69.8 | 23.7 | 6.5 |
| Germany | 76,724 | 52,384 | 24,340 | | 68.3 | 31.7 | |
| Greece | 313 | 82 | 139 | 92 | 26.2 | 44.4 | 29.4 |
| Hungary | 242 | 34 | 124 | 84 | 14.0 | 51.2 | 34.7 |
| Iceland | 264 | 140 | 106 | 18 | 53.0 | 40.2 | 6.8 |
| Ireland | 1,843 | 489 | 675 | 679 | 26.5 | 36.6 | 36.8 |
| Israel | 57 | | | 57 | | | 100.0 |
| Italy | 4,835 | 2,772 | 1,222 | 841 | 57.3 | 25.3 | 17.4 |
| Luxembourg | 45,954 | 33,437 | 10,647 | 1,870 | 72.8 | 23.2 | 4.1 |
| Malta | 12 | | | 12 | | | 100.0 |
| Mexico | 320 | 4 | 173 | 143 | 1.3 | 54.1 | 44.7 |
| Netherlands | 9,399 | 5,281 | 3,027 | 1,091 | 56.2 | 32.2 | 11.6 |
| Norway | 881 | 297 | 233 | 351 | 33.7 | 26.4 | 39.8 |
| Poland | 236 | | | 236 | | | 100.0 |
| Russian Federation | 80 | 6 | 27 | 47 | 7.5 | 33.8 | 58.8 |
| Slovakia | 21 | 6 | 6 | 9 | 28.6 | 28.6 | 42.9 |
| Slovenia | 20 | 4 | 6 | 10 | 20.0 | 30.0 | 50.0 |
| Spain | 90,935 | 67,405 | 11,710 | 11,820 | 74.1 | 12.9 | 13.0 |
| Sweden | 2,590 | 820 | 1,040 | 730 | 31.7 | 40.2 | 28.2 |
| Switzerland | 153,764 | 99,840 | 44,159 | 9,765 | 64.9 | 28.7 | 6.4 |
| United Kingdom | 79,199 | 27,578 | 21,312 | 30,309 | 34.8 | 26.9 | 38.3 |
| United States of America | 185,629 | 87,899 | 72,185 | 25,545 | 47.4 | 38.9 | 13.8 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

TableA3 Stock of Portuguese-born emigrants by educational attainment and sex, 2010/11

| Educational attainment | Male | | Female | |
|------------------------|----------------|--------------|----------------|------------|
| | Number | Percentage | Number | Percentage |
| Total | 729,865 | 100.0 | 683 712 | 100 |
| Low [ISCED 0/1/2] | 444,439 | 60.9 | 438,782 | 64.2 |
| Medium [ISCED 3/4] | 212,438 | 29.1 | 168,424 | 24.6 |
| High [ISCED 5A/5B/6] | 72,988 | 10.0 | 76,506 | 11.2 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A4 Stock of Portuguese-born emigrants in OECD countries by duration of stay and educational attainment, 2010/11

| Duration of stay | Number | | | Percentage | | |
|------------------------|-------------------|--------------------|--------------------|-------------------|--------------------|--------------------|
| | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] |
| Total | 700,094 | 307,374 | 129,341 | 61.6 | 27.0 | 11.4 |
| One year or less | 10,677 | 4,896 | 7,703 | 45.9 | 21.0 | 33.1 |
| One to five years | 43,771 | 15,770 | 17,304 | 57.0 | 20.5 | 22.5 |
| Five to ten years | 42,211 | 16,737 | 13,089 | 58.6 | 23.2 | 18.2 |
| Ten to twenty years | 119,531 | 47,143 | 22,144 | 63.3 | 25.0 | 11.7 |
| More than twenty years | 483,904 | 222,828 | 69,101 | 62.4 | 28.7 | 8.9 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A5 Stock of Portuguese-born emigrants in OECD countries by labor force status, 2010/11

| Labor force status | Number | Percentage |
|--------------------|------------------|--------------|
| Total | 1,431,348 | 100.0 |
| Employed | 905,585 | 63.3 |
| Unemployed | 82,845 | 5.8 |
| Inactive | 442,918 | 30.9 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A6 Stock of Portuguese-born emigrants in OECD countries by labor force status and sex, 2010/11

| Labor force status | Number | | Percentage | |
|--------------------|----------------|----------------|--------------|--------------|
| | Male | Female | Male | Female |
| Total | 736,018 | 695,330 | 100.0 | 100.0 |
| Employed | 504,543 | 401,042 | 68.6 | 57.7 |
| Unemployed | 42,729 | 40,116 | 5.8 | 5.8 |
| Inactive | 188,746 | 254,172 | 25.6 | 36.6 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A7 Stock of Portuguese-born emigrants in OECD countries by labor force status and age, 2010/11

| Labor force status | Number | | | Percentage | | |
|--------------------|---------------|------------------|----------------|--------------|--------------|--------------|
| | 15-24 | 25-64 | 65+ | 15-24 | 25-64 | 65+ |
| Total | 64,968 | 1,007,568 | 204,798 | 100.0 | 100.0 | 100.0 |
| Employed | 31,072 | 733,466 | 11,003 | 47.8 | 72.8 | 5.4 |
| Unemployed | 8,511 | 66,224 | 858 | 13.1 | 6.6 | 0.4 |
| Inactive | 25,385 | 207,878 | 192,937 | 39.1 | 20.6 | 94.2 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A8 The six major countries of stock of Portuguese-born emigrants in OECD countries by labor force status, 2010/11

| Country of residence | Number | | | Percentage | | |
|--------------------------|----------------|---------------|----------------|-------------|------------|-------------|
| | Employed | Unemployed | Inactive | Employed | Unemployed | Inactive |
| Total | 773,459 | 76,180 | 399,400 | 61.9 | 6.1 | 32.0 |
| Canada | 74,680 | 4,255 | 60,430 | 53.6 | 3.1 | 43.4 |
| Switzerland | 129,019 | 7,215 | 16,595 | 84.4 | 4.7 | 10.9 |
| Spain | 41,750 | 20,515 | 28,700 | 45.9 | 22.6 | 31.6 |
| France | 361,708 | 29,632 | 196,883 | 61.5 | 5.0 | 33.5 |
| United Kingdom | 53,290 | 5,842 | 20,067 | 67.3 | 7.4 | 25.3 |
| United States of America | 113,012 | 8,721 | 76,725 | 56.9 | 4.4 | 38.7 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A9 **Stock of Portuguese-born emigrants in OECD countries by labor force status and educational attainment, 2010/11**

| Labor force status | Number | | | Column percentage | | | Row percentage | | |
|--------------------|-------------------------|--------------------------|--------------------------|-------------------------|--------------------------|--------------------------|-------------------------|--------------------------|--------------------------|
| | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] |
| Total | 875,789 | 384,754 | 151,576 | 100.0 | 100.0 | 100.0 | 75.9 | 33.4 | 13.1 |
| Employed | 492,029 | 287,250 | 116,609 | 56.2 | 74.7 | 76.9 | 54.9 | 32.1 | 13.0 |
| Unemployed | 52,346 | 22,146 | 7,704 | 6.0 | 5.8 | 5.1 | 63.7 | 26.9 | 9.4 |
| Inactive | 331,414 | 75,358 | 27,263 | 37.8 | 19.6 | 18.0 | 76.4 | 17.4 | 6.3 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A10 **Stock of Portuguese-born emigrants in OECD countries by occupation, 2010/11**

| Occupation | Number | Percentage |
|--|----------------|--------------|
| Total | 734,596 | 100.0 |
| Armed forces occupations | 870 | 0.1 |
| Managers | 37,661 | 5.1 |
| Professionals | 37,752 | 5.1 |
| Technicians and associate professionals | 60,623 | 8.2 |
| Clerical support workers | 43,297 | 6.4 |
| Services and sales workers | 103,177 | 14.0 |
| Skilled agricultural, forestry and fishery workers | 15,546 | 2.1 |
| Craft and related trade workers | 184,050 | 24.9 |
| Plant and machine operators and assemblers | 76,114 | 10.3 |
| Elementary occupations | 175,506 | 23.8 |

Note ISCO 2008 Occupations.

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A11 Stock of Portuguese-born emigrants in five OECD countries by occupation, 2010/11

| Occupation | Number | | | | | Percentage | | | | |
|--|---------------|----------------|---------------|----------------|----------------|------------|-------------|-------|--------|----------------|
| | Canada | Switzerland | Spain | France | United Kingdom | Canada | Switzerland | Spain | France | United Kingdom |
| Total | 74,350 | 126,948 | 76,130 | 361,710 | 53,290 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Armed forces occupations | 0 | 0 | 65 | 512 | 0 | 0.0 | 0.0 | 0.1 | 0.1 | 0.0 |
| Managers | 6,705 | 3,113 | 2,020 | 17,356 | 4,750 | 9.0 | 2.5 | 2.7 | 4.8 | 8.9 |
| Professionals | 6,470 | 4,326 | 3,525 | 13,420 | 5,515 | 8.7 | 3.4 | 4.6 | 3.7 | 10.3 |
| Technicians and associate professionals | 8,720 | 9,902 | 3,370 | 29,692 | 4,123 | 11.7 | 7.8 | 4.4 | 8.2 | 7.7 |
| Clerical support workers | 7,085 | 7,230 | 2,565 | 22,283 | 3,055 | 9.5 | 5.7 | 3.4 | 6.2 | 5.7 |
| Services and sales workers | 10,315 | 31,094 | 8,945 | 36,066 | 7,096 | 13.9 | 24.5 | 11.7 | 10.0 | 13.3 |
| Skilled agricultural, forestry and fishery workers | 590 | 2,495 | 1,355 | 9,836 | 609 | 0.8 | 2.0 | 1.8 | 2.7 | 1.1 |
| Craft and related trade workers | 14,630 | 35,142 | 8,600 | 103,238 | 6,298 | 19.7 | 27.7 | 11.3 | 28.5 | 11.8 |
| Plant and machine operators and assemblers | 5,900 | 12,322 | 38,200 | 40,549 | 6,111 | 7.9 | 9.7 | 50.2 | 11.2 | 11.5 |
| Elementary occupations | 13,935 | 21,324 | 7,485 | 88,758 | 15,733 | 18.7 | 16.8 | 9.8 | 24.5 | 29.5 |

Note ISCO 2008 Occupations.

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A12 Stock of Portuguese-born emigrants in OECD countries by educational attainment and skill level of occupation, 2010/11

| Skill level of occupation | Number | | | Percentage | | |
|---------------------------|----------------------|-----------------------|-----------------------|----------------------|-----------------------|-----------------------|
| | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5AB/6] |
| Total | 464,819 | 266,116 | 116,971 | 100.0 | 100.0 | 100.0 |
| ISCO skill level 1 | 135,984 | 28,887 | 9,946 | 29.3 | 10.9 | 8.5 |
| ISCO skill level 2 | 290,617 | 181,107 | 39,939 | 62.5 | 68.1 | 34.1 |
| ISCO skill level 3 | 38,218 | 56,122 | 67,086 | 8.2 | 21.1 | 57.4 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A13 **Stock of Portuguese-born emigrants in OECD countries by occupation and educational attainment, 2010/11**

| Occupation | Number | | | Percentage | | |
|--|-------------------------|--------------------------|----------------------------|-------------------------|--------------------------|----------------------------|
| | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5A/5B/6] | Low [ISCED 0/1/2] | Medium [ISCED 3/4] | High [ISCED 5A/5B/6] |
| Total | 424,452 | 214,425 | 94,807 | 57.9 | 29.2 | 12.9 |
| Armed forces occupations | 364 | 298 | 208 | 41.8 | 34.3 | 23.9 |
| Managers | 12,192 | 13,519 | 11,754 | 32.5 | 36.1 | 31.4 |
| Professionals | 6,193 | 7,340 | 24,089 | 16.5 | 19.5 | 64.0 |
| Technicians and associate professionals | 17,325 | 26,281 | 16,893 | 28.6 | 43.4 | 27.9 |
| Clerical support workers | 17,334 | 21,305 | 8,500 | 36.8 | 45.2 | 18.0 |
| Services and sales workers | 56,341 | 36,685 | 9,637 | 54.9 | 35.7 | 9.4 |
| Skilled agricultural, forestry and fishery workers | 12,155 | 2,666 | 674 | 78.4 | 17.2 | 4.3 |
| Craft and related trade workers | 119,891 | 54,591 | 8,789 | 65.4 | 29.8 | 4.8 |
| Plant and machine operators and assemblers | 46,673 | 22,853 | 4,317 | 63.2 | 30.9 | 5.8 |
| Elementary occupations | 135,984 | 28,887 | 9,946 | 77.8 | 16.5 | 5.7 |

Note ISCO 2008 Occupations.

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A14 **Stock of Portuguese-born emigrants in USA by occupation, 2010/11**

| Occupation | Number | Percentage |
|--|----------------|--------------|
| Total | 112,512 | 100.0 |
| Management occupations | 10,931 | 9.7 |
| Business and financial operations occupations | 3,063 | 2.7 |
| Computer and mathematical occupations | 1,682 | 1.5 |
| Architecture and engineering occupations | 1,464 | 1.3 |
| Life, physical, and social science occupations | 680 | 0.6 |
| Community and social services occupations | 827 | 0.7 |
| Legal occupations | 665 | 0.6 |
| Education, training, and library occupations | 2,826 | 2.5 |
| Arts, design, entertainment, sports, and media occupations | 1,024 | 0.9 |
| Healthcare practitioners and technical occupations | 2,614 | 2.3 |
| Healthcare support occupations | 3,488 | 3.1 |
| Protective service occupations | 1,270 | 1.1 |
| Food preparation and serving related occupations | 4,156 | 3.7 |
| Building and grounds cleaning and maintenance occupations | 10,305 | 9.2 |
| Personal care and service occupations | 3,486 | 3.1 |
| Sales and related occupations | 9,211 | 8.2 |
| Office and administrative support occupations | 13,318 | 11.8 |
| Farming, fishing, and forestry occupations | 1,169 | 1.0 |
| Construction and extraction occupations | 13,743 | 12.2 |
| Installation, maintenance, and repair occupations | 4,641 | 4.1 |
| Production occupations | 15,473 | 13.8 |
| Transportation and material moving occupations | 6,330 | 5.6 |
| Military specific occupations | 146 | 0.1 |

Note USA Occupations.

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.

Table A15 **Stock of Portuguese-born emigrants in OECD countries by overqualification, 2010/11**

| Overqualified | Number | Percentage |
|-------------------|----------------|--------------|
| Total | 854,973 | 100.0 |
| Not overqualified | 67,086 | 7.8 |
| Overqualified | 49,885 | 5.8 |
| Unknown | 738,002 | 86.3 |

Source Table by Observatório da Emigração [Emigration Observatory], author's calculations, data from Database on Immigrants in OECD Countries, DIOC 2010/11, fourth revision.



Observatório da Emigração

The Emigration Observatory (OEm) is an independent technical and research structure within the Centre for Research and Studies in Sociology (CIES-IUL) of ISCTE - University Institute of Lisbon. The Observatory is based on a partnership between the CIES-IUL, the Institute of Sociology (IS-UP) of the University of Porto, and the Centre for Geographical Studies (CEG) and the Centre for Research in Economic and Organizational Sociology (SOCIUS/CSG), both of the University of Lisbon. The Observatory is supported by the Portuguese Ministry of Foreign Affairs under a cooperation agreement.

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|------------------|---|
| Series | OEm Fact Sheets, 8 |
| Title | Portuguese skilled migration in DIOC 2010/11 |
| Author | Ana Filipa Cândido |
| Publisher | Observatório da Emigração, CIES-IUL, ISCTE-IUL |
| Date | June 2018 |
| ISSN | 2183-4385 |
| DOI | 10.15847/CIESOEMFS082018 |
| URI | http://hdl.handle.net/10071/16659 |

Cite as Cândido, Ana Filipa (2018), "Portuguese skilled migration in DIOC 2010/11", *OEm Fact Sheets*, 8, Observatório da Emigração, CIES-IUL, ISCTE-IUL.
DOI: 10.15847/CIESOEMFS082018

www.observatorioemigracao.pt



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