

Chapter II: Internal Migration and population flows

It is evident that as time has passed, the migration flows in Mexico have changed depending on various factors. Some of the factors were described on the previous chapter. It is not only important to look at today's flows, we must too understand the reasons for today's situation, thus we must look at the process which took to get there. In order to better understand the migration flows we will look at the migration theories that will allow us to pin down certain correlations. Since the population growth may have to do with internal migration we will be taking a look at this aspect as well. Then, we will be giving a summary of the migration flows pre-2000, to follow I will concentrate on the period being assessed on this work from 2000 to 2015, in order to understand and cross-reference with the migration theories explained before.

A lot of these theories mentioned, mainly our focus on "push-pull" theory there exists a balanced on a plus or minus system meaning that the individuals assess the pros and cons before deciding to migrate. Within the push-pull factors, "push factors" usually include population growth, and population density, lack of economic opportunities and political repressions" (Castles & Miller, 2014, 28) and then the "pull factors" usually included demand of labour, availability of land, economic opportunities and political freedoms" (Castles & Miller, 2014, 28). As explained by Castles and Miller this model is somewhat vague due to the fact that it covers many aspects at the same time whilst leaving out other important aspects. For the same reason I thought this theory could be complemented by the segmented labour market theory. This theory bases itself on the fact that modern capitalist economies have certain patterns of demand for high and low-skilled immigrant labour, and although the theory mainly addresses international migration it can be scaled down to national level especially when we talk about rural-urban migration. As we will be assessing the triggers of rural migration, the relation between locations may be the same as the one referred to under the push-pull theory. Also under the assessment of theories there are a lot of similarities such as the important growth in the tertiary sector that has triggered migration for both high and low-skilled labour, this is the case that we are trying to demonstrate when looking at Monterrey. Under the same idea of theories we must take into account that there is both a positive and negative approach, I decided for this work that the positive approach was a better fit, since in this case migration is seen to have benefits for both the individuals and the society, as well as the fact that it gives migrants better living conditions (Rivera, 2010, 150).

It has been due to the different population flows together with the population growth that Mexico has acquired certain demographic aspects which characterize its distribution today. Now internal migration might connect to other types of migration as well, since there is migration that occurs within states as well as international migration. During this work we will be assessing mainly rural-urban migration, we will first be establishing which are the “pull” states and which are the “push” states in order to see the net migration and cross reference together with the population growth occurring in Monterrey. Part of this is due to the volume of people that decide to migrate into big cities or growing cities, since “migration is usually associated with a larger economy, so there is a bias in favour of migration from individuals and governments seeking to maximize economic growth”(Brettel & Hollifield, 2015, 109). As it was mentioned in the previous chapter, a lot of the reasons for internal migration may rest on economic development, including the diversification of the phenomenon states.

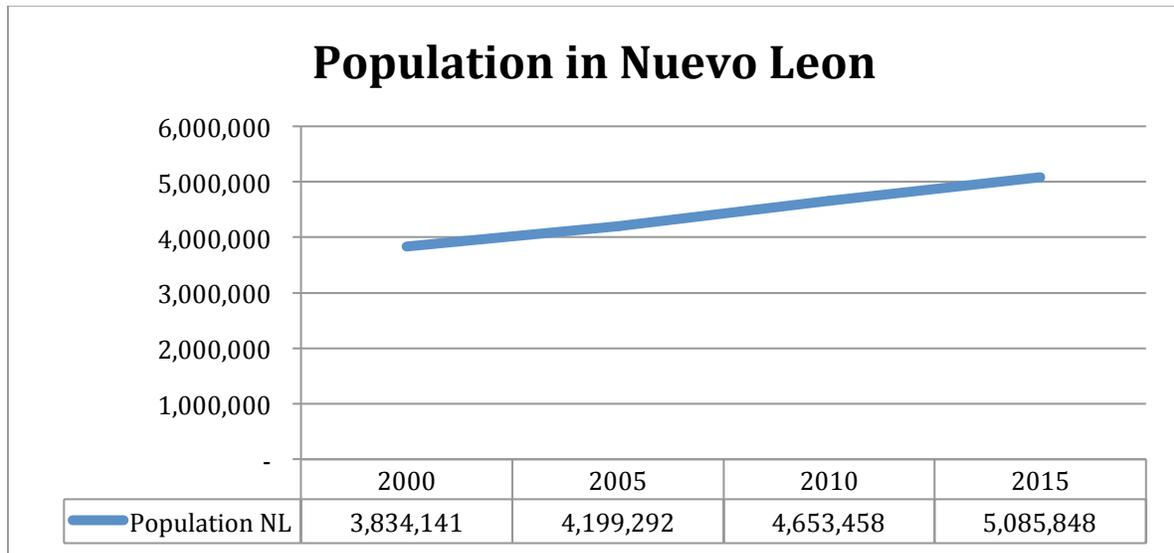
We must understand that another factor that may trigger migration is population growth, aspect which influence in the migration flow patterns and numbers. For this it is important to acknowledge that the population growth has had a slowdown in the more recent years. On the same note we can expect a slowdown in the net migration demonstrated through the data. Net migration refers to the total population involved in migration that are left after counting both immigration and emigration. Since we can expect that as the population growth slows down so will migration since there will be less people to migrate. As mentioned before migration patterns may be theorized through the push-pull migration model, theory under which we can understand that “size and structure of populations influence” the population flows (Brettell & Hollifield, 2014, 67). This idea can be assessed together with population growth, since the more investment there is on infrastructure, as well as growth in amenities of the territory specified. As a whole, Mexico has shown that the population growth rate has begun to fall specifically since 2008, meaning that there is every time less growth in the amount of population mobility average. From 2000 to 2010 the population growth was equal to 1.4%, as opposed to a 3.4% rate that was experienced in the 1960s (INEGI, 2014). This drop in population growth has been estimates to plateau after 2015. This phenomenon is one that does not single out the case of Mexico on the contrary it is something that has been seen all through the world and an estimate shows that there too will be a plateau in world population after 2015 (World Bank, 2016). Internal net migration of Mexico as a whole between the period of 2005- 2010 was equal to 27.1%,

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where as in the case of 2010- 2015 we see a net migration went down to a 19.3%. With the same data in mind we can see that the decrease may to a certain extent be proportional to the population slowdown. In order to begin assessing this aspect we will demonstrate the slow population growth through the following graph.

Graph 5

Population in Nuevo Leon 2000 - 2015



Source: graph created through INEGI 2015

In the graph we can see that the data represented demonstrates a slow growth specially in comparison to the population growth it had in earlier years. Even after this slow down in 2015 it was registered in INEGI that four of the municipalities in Nuevo Leon are in the top five in the country when it comes to population growth. On the same note we can see that the population growth was not entirely by natural growth, since in INEGI census 2015 demonstrated that the net migration from 2005 to 2010 was equal to 4%, followed by a net immigration of 1.9% in the 2010 to 2015 period, also demonstrating a slowdown. These aspects may be further explained by the history of migration and development in Mexico.

When looking at the development of cities in both size and infrastructure we need to see that the economic aspects had certain implications that have defined the process through which Mexico has gone to have a higher population concentration in urbanized cities. According to Gustavo Garza the urbanizing process can be divided into three periods: “[i]

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moderate-low, 1900-1940; ii] accelerated-medium, 1940- 1980; iii] low-accelerated, 1980-2005” (2010, 33). Part of the population flow shift and urbanization may too be marked as pre- NAFTA and post-NAFTA, since in the pre-NAFTA period we can see that the urbanization growth appeared to be slower, and as industrialization is introduced as well as NAFTA the growth percentage appears to be higher. Still the first appearances of rural-urban migration go back to the 60’s where the population of Monterrey experimented a growth of close to 4.4 million inhabitants. But in 1980’s with the economic crisis the urban population greatly slows down and then in the period from 1990 till 2000 the growth remains similar but the concentration of the total population remains in 10 top cities one of which was Monterrey. In the time frame from 1985 up until 2000 the northern states remained as “pull” states in a medium and high level with the exception of Coahuila (Garza,50, 2010). Except that past 2000 most northern states began to show a decrease without it necessarily being negative. This will be shown more in detail as we go through this chapter.

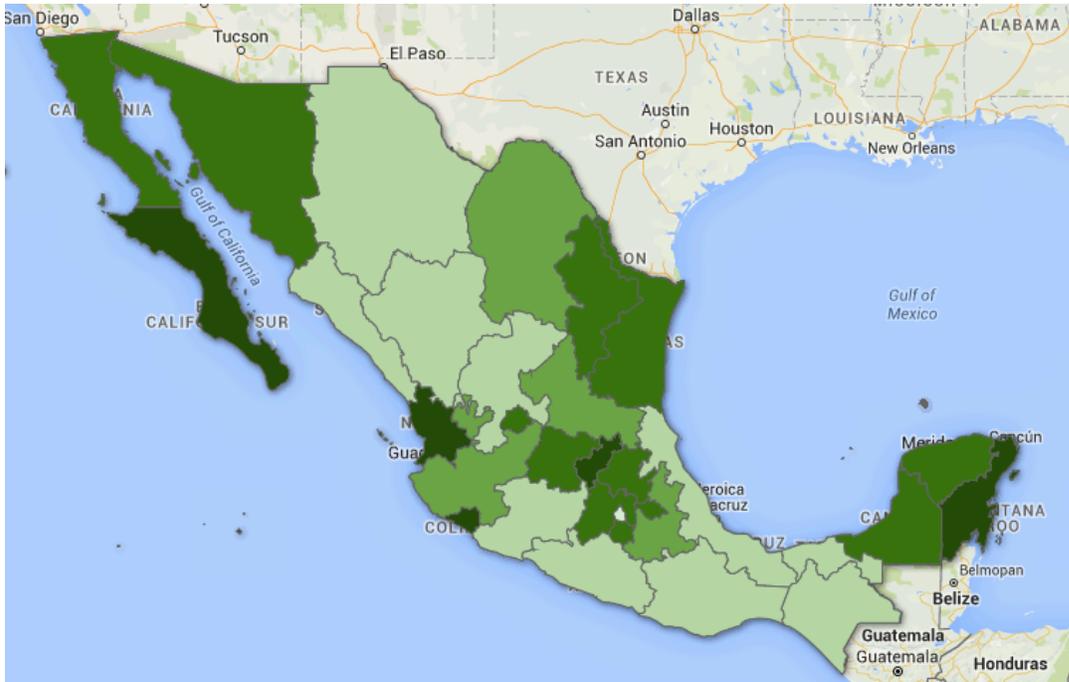
The data that will be used comes from CONAPO and INEGI, the only problem with this data is that the census is made every 10 years (one full detailed census) and inter census every 5 years (which has more condensed information and some estimations). In Monterrey (2010) there was a total population of 1 135 550, and half of the municipalities (10 of 20) including Monterrey had a total of 86% of the population is in these. Through the analysis of the information we can see that through the years the distribution of population has continued to reflect with a vast concentration in the already large cities or in this case cities surrounding highly developed cities or the metropolitan areas. Some of this demographic aspects may have to do with the proximity that there is to the industry and thus the source of employment demand as well as the transportation facilities.

When looking at migration levels in the latest information gathered by INEGI and further broken down by CEPAL. The information gathered demonstrates that there where ten cities that together concentrated 40% of the migratory flows, the characteristics of three of these cities (including Monterrey) where based on geographic location: being border cities with the USA (some of which concentrate on maquilas), or cities located near to Mexico City, and finally some of the main tourist cities. The phenomenon of larger cities near the northern border has always been present and part of it is due to the fact that it serves as a passing place for migrants that seek to end in the Unites States, allowing there to be low priced work force.

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Through the following map we will be able to see the migration trends which are appreciated during the period of 2005 till 2010.

Map 1



Source: SEGOB 2005 – 2010

In the map above we can see that the two lightest colours represent the areas of expulsion (high levels of expulsion and low levels of expulsion), the middle green represents an equilibrium on net migration, finally the two darker colours represent medium and high levels of attraction. In general we can see that the places with highest attraction would be the centre of the country or surrounding areas to Mexico city, aside from that we see that the second highest pull would occur in the northern part of the country. The population in general demonstrates that there is a medium attraction in Nuevo Leon, when looking at more information presented by SEGOB we can see that the areas of high levels of attraction are those surrounding Monterrey. This part proves that population concentration begins to spread in surrounding areas which may concern lower prices in leaving quality.

Based on 2015 census in which we can see a shift of from past years migration pull and push states. On this shift we see that recent population flows have places a negative net migration on more states than of previous years demonstrating a slight change in the

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demographics and development within Mexico. Part of which might be related to the population density which would make less jobs available, this can be presented as a factor within the push-pull model and the idea that the higher the density the less internal migration that will occur.

Map 2: Net Internal Migration



Fuente: INEGI, Encuesta Intercensal 2015.

Source: INEGI census 2015

SNM: Migration Net salary

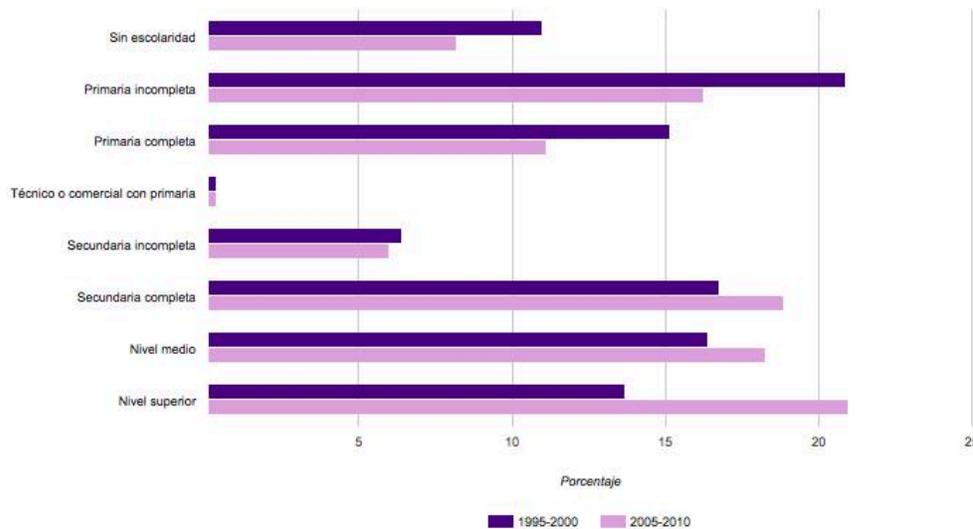
Through map 2 we can see that the expulsion of people seems to be greater than that registered in the 2005 to 2010 period in the globalized states (meaning greater emigration) as opposed to the pull feature these globalized cities used to have. Even if we see a lower net migration this continues to be positive. The difference is that the pull motion can now be seen in cities surrounding the metropolitan area, this has been described by Gustavo Garza as the hinterland, which is the case of Mexico City. So would be the case of other cities like Cuernavaca which have maintained high rates of population growth ever since

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the 1980's (Garza, 2010, 40). The same correlation can be seen in the case of Saltillo, whose connection with Monterrey have allowed Saltillo to maintain a somewhat rapid growth and integration with Monterrey (Garza, 2010, 41). As a whole the Nuevo Leon state continues to demonstrate a positive net migration even though it is in a small degree. And looking at the state and migration flows we see the phenomenon of surrounding cities to Monterrey having a greater pull than the metropolitan area itself. On recent years we see that the only states that demonstrated a high net migration are Baja California Sur, Campeche and Quintana Roo. When talking about the population density we refer to how many people inhabit per squared kilometre, globalized cities

To further understand other specific aspects of internal migration we must see the school level depending on the migration, this idea means that the we can see how much of the migration is composed by high-skilled labour and how much by low-skilled. This is important since it may determine the possible opportunities in the labour sector depending on the place that is being assessed.

Percentage of population according to education level (Graph 6)



Source: Estimations of CONAPO basing on INEGI, XII General Population and housing census 2000 and 2010

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The graph above breaks the education levels into eight groups: no schooling, unfinished primary school, primary school completed, technical school with primary school, incomplete high school, completed high school, middle high education, and superior education. Looking at the chart we can see that the shift of population migration was quite marked in the sense that the population with less education was a higher percentage of the total migration population in the period 1995 – 2000, in comparison to the data from 2005 – 2010 which changes in order to place a higher proportion of the migration population. The shift was not only reflected on the two extremes, on the contrary we see a complete shift in balance, which on the second period appears to concentrate the population flows on the high school to high education.

To start looking more specifically we first need to acknowledge that Monterrey is one of the eleven cities that have more than one million inhabitants (CONAPO, 2012). Of these eleven cities we can see that four of them are situated in the northern border of the country and the same four are the ones that have demonstrated the highest development in the north part of the country. Within Nuevo Leon, Monterrey is the largest municipality out of the nine in the state, as well as the largest contributor in the state's GDP which as mentioned before is one of the largest contributor in the national GDP. The metropolitan area of Monterrey is the third largest after Mexico City (CDMX) and Guadalajara, as well as the 10th largest in Latin America. Part of this population growth and population density may be reflecting the lack of labour opportunities in the rural areas or the agricultural economy, making an obsolete market. In recent studies it has been seen that most of the agriculture labour is covered or led by people which are older than 50 years old on average. This demonstrates that it is the younger generation the one that have been emigrating in order to find better growth opportunities.

It is important to assess the population growth together with the immigration and population flows, since although it is true that development is meant to foster the opportunities for the different individuals, it is understandable that rapid growth of population may not be sustainable for a set industry even if this one demonstrates growth patterns.

Looking at previous data we can see that the net migration has appeared to decrease dramatically since in 2000, states that used to be “pull” states have now become “push” states. This is the case of Mexico City, Chihuahua, and Coahuila, states that had

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previously demonstrated to have a higher level of internal net migration. Thus in cases such as Mexico City may have to do with over population having 5967 people per square kilometre (INEGI, 2015). This may mean that there is not enough employment for the economically active population, or people with higher education seek to go to smaller cities to try and avoid contamination or transport congestion.

Internal Migration 2006 – 2012

Migración interna, 2006-2012

Entidad Federativa y Año	Inmigrantes Interestatales	Emigrantes Interestatales	Migración Neta Interestatal	Tasas		
				Inmigración Interestatal	Emigración Interestatal	Migración Neta Interestatal
Michoacán						
2006	8 493	11 018	- 2525	2.12	2.75	- 0.63
2007	8 539	10 958	- 2419	2.14	2.75	- 0.61
2008	8 593	10 885	- 2292	2.16	2.74	- 0.58
2009	8 660	10 797	- 2137	2.18	2.72	- 0.54
2010	8 707	10 707	- 2000	2.20	2.71	- 0.51
2011	8 769	10 641	- 1872	2.23	2.70	- 0.48
2012	8 837	10 569	- 1732	2.26	2.70	- 0.44
Morelos						
2006	9 176	4 402	4 774	5.61	2.69	2.92
2007	9 225	4 442	4 783	5.60	2.69	2.90
2008	9 277	4 482	4 795	5.58	2.70	2.89
2009	9 329	4 526	4 803	5.57	2.70	2.87
2010	9 367	4 548	4 819	5.55	2.70	2.86
2011	9 425	4 582	4 843	5.55	2.70	2.85
2012	9 461	4 598	4 863	5.53	2.69	2.84
Nayarit						
2006	8 900	3 794	5 106	9.26	3.95	5.31
2007	8 930	3 790	5 140	9.26	3.93	5.33
2008	8 972	3 794	5 178	9.28	3.92	5.35
2009	9 028	3 790	5 238	9.31	3.91	5.40
2010	9 070	3 784	5 286	9.33	3.89	5.44
2011	9 091	3 781	5 310	9.33	3.88	5.45
2012	9 147	3 769	5 378	9.37	3.86	5.51
Nuevo León						
2006	17 074	8 793	8 281	3.99	2.05	1.93
2007	17 168	8 868	8 300	3.96	2.04	1.91
2008	17 242	8 944	8 298	3.92	2.04	1.89
2009	17 298	9 016	8 282	3.89	2.03	1.86
2010	17 353	9 070	8 283	3.85	2.01	1.84
2011	17 390	9 129	8 261	3.82	2.00	1.81
2012	17 396	9 189	8 207	3.78	1.99	1.78

Continúa...

Source: CONAPO, 2013

Referring to the net migration demonstrated on the chart above we can see that, although immigration growth has actually decreased through the years, still the numbers appear to be higher compared to other states. This is one of the reasons why looking at the net migration would not serve justice to the growth in migration and how the same may affect the density of population. In this case we can refer to Newton's law and the idea of push-pull factors, since even though high density of population may lead us to communicate the same into less available jobs. But when other factors are taken into account we can see

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that the concentration of population can actually “encourage innovation” (Castles & Miller, 2014, 28). As there are more people that work in order to fulfil the economic and structural needs of the city it allows for higher skilled workers to seek new market opportunities, whilst competition between companies triggers innovation as well. At the same time we need to pay attention at the density of the population since this allows us to see as well how the population numbers have come to reflect on the territory. It is explained by

Sassen that the main characteristics which encircle the globalization of cities rest on “headquarters ... corporate service complex, that is, the network of financial, legal, accounting, advertising firms” (Sassen, 2005, 34) etc. all of which occur in a rapid way through innovations and specialization of services.

When looking at a more national data which reflect the period from 2005 to 2010, from the 10 metropolitan areas, which have the most population immigration the three, top ones (Mexico City, Guadalajara, Monterrey) concentrate 54.4% of all of the immigration occurring in Mexico. The same way we can see that from the top metropolitan areas involved in emigration, seven of them are too in the top ten emigration contributors of the country. This is important since we can assess the way in which there has been a plateaus of economic diversification creating less employment opportunities. (CONAPO, 39, 2014)

It is also important to take into account the age range when looking at the reasons behind migration since it may too reflect to some extent the reasons behind the migration phenomenon. In the case of this information there has been also an estimate of the following years to see which sector of the population is pulled more towards population mobility. For this CONAPO's data demonstrate that the main set of the migrant population was the group of people from 15 to 64 years old. The growth of this group slowed down and after 2010 and it is expected to continue to decrease from its fast acceleration up until 2040. This section of the population is important since it covers the part of the population which is considered to be the economically active population. Other projections that have been done concerning the internal migration where published by SEGOB which had set projections from 2010 to 2030, all of this with the information gathered up until 2014 by CONAPO. This set of data represents an average net flow per federal entity within the ten years that are assessed between the three groupings of years. In these charts we can see that the net migration maintains itself entirely around the 0.20 percentage growth. Although it was not one of the highest recipients amongst the different federal entities we can still

see that Nuevo Leon is still on the top half when looking at receiving migrants.

Analysing migration mobility and their destination we can see that there has been a categorization, separating which economic sectors migration flows direct themselves to. The information gathered was separated under five classifications: services, commerce, industry, construction, and agriculture. In terms of time period it addresses we see two different ones: one from 1995-2000 and the second from 2005 – 2010. Looking at both we see that the main labour destination for migrants by far is the services sector, followed by both commerce and industry and demonstrating the lowest percentage of the total migration population under agriculture. Although this trend seems to be quite similar in both periods that were showed we can see that the service sector has been more concurred by the migrant population now than before and in comparison as years go by the agriculture sectors seems to be further deteriorating. In terms of construction we can see that the increase in the recent period is almost minimal, this may concern the fact of investment in infrastructure made by governments, but at the same time it does not represent a high number of people developing under these activities.

In terms of the population density, talking specifically about Monterrey we can see that there is a relatively high density of population. Some of it is due to natural growth, whilst the other part comes from the population flows of migration. Nuevo Leon in 2010 had a total population of 4,552,404 of these population 94% lives in urbanized areas (with a population larger than 2,500). From the total population of Nuevo Leon, 48.7% is of female and the 51.3% of male population. Out of the total population 88% of them reside in the metropolitan area of Monterrey, finally we can see that in general Nuevo Leon presents quite a young population having 65% of them being between 15 and 59 years old. The age is important, since it is through this that we can see which percentage of the total population is in working conditions allowing us to further understand the unemployment rates. For example in migration in 2010, 2.8% of the population older than 5 years old had recently moved into the state. When looking at the population density, Nuevo Leon has 80 people per square kilometre and although it is higher than the national average it is the 15th highest. This means that there is still territory in which industry may expand to as well as residential territory to occupy (INEGI, 2015). Although Nuevo Leon is not of the states with the largest surface area it is one with the highest numbers of population. This irony can be seen through many states in Mexico since it is the smallest states (in terms of territory) that demonstrate higher population numbers.

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When looking at the “push” and “pull states, through CONAPO we can see that between 2005 and 2010 the immigration to the metropolitan area of Monterrey was relatively high when the individuals came as well from other globalized cities such as Mexico City. At the same time a lot of the emigration reaches almost seven thousand people (also between 2005 and 2010) that head to Mexico City. With this we can see that most of the internal migration is now occurring between globalized cities, in a way this might reflect that rural-urban migration is occurring less and now population flows concentrate more on urban-urban migration (CONAPO, 2014, 43). Part of this can also be reflected on the fact that overall instead of seeing a drop on rural population there has been a small growth which most likely is a result from natural population growth.

All together we can see that the population flows specifically the “pull” areas appear to concentrate on the globalized cities. In terms of Monterrey we can see that a high concentration of the population is in the metropolitan area and only 5% of the population in Nuevo Leon are in the rural area. For the same reason there has been more immigration to surrounding cities to the metropolitan areas, still concentrating the economic activities within Monterrey.