Designing an organizational pathway for illegal immigrants to perform vaccino-prophylaxis interventions

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Key words
 Illegal immigrants • Access to NHS • Vaccination interventions

Introduction. Immigration is constantly increasing in Italy. In spite of the last regularization, after the "Bossi-Fini" law (n. 189, 30 July 2002) came into force, at the present illegal quota of immigrants is about 800,000 units. Many Public Health issues arise with this phenomenon. Above all, infectious diseases are serious problems. The evaluation of immigrants’ health needs and health care demand, and the assessment of National Health Service (NHS) offer and its accessibility to them are essential for a correct Public Health approach. The aim of our study is the design of an organizational pathway to facilitate immigrants’ access to NHS both for diagnosis services and vaccination interventions.

Methods. A feasibility assessment was carried out through structured interviews to the medical and administrative chiefs of involved different organizations. The serological survey (before vaccination interventions) was carried out by Elisa test for rubella (in women at fertile age), tetanus, diphtheria and hepatitis B and by neutralizing antibody titration for poliomyelitis. Descriptive and inferential statistics were carried out to evaluate the frequency distribution of the recorded variables. Differences among groups were tested at a p value significance level of 0.05 using Chi-square test for categorical variables and Student’s t test for numerical variables.

Results. An organizational pathway to facilitate the immigrants’ access to NHS was planned and implemented.

In the study period 229 immigrants accepted to participate; among them 99 immigrants reached the hospital to perform the diagnostic analysis, resulting in a compliance of 43.23%. No significant statistical differences were shown by gender. The average time between the prescription of the analysis and the arrival to the hospital was 4 days for females, and 11.8 days for males and the different was statistically significant at the Student’s t test (p value < 0.05).

Continent of origin, school attendance, and age, were also studied comparing the two groups (responders and non-responders). Migrants coming from Eastern Europe were the largest group, but they showed the lowest compliance.

Discussion. The results of our study give an example of integrated health services for immigrants performed by the collaboration between private and public providers with the aim of facilitating the access of migrant people to the NHS.

Conclusion. Notwithstanding our efforts, the results of this study confirm immigrant’s difficulties to access to services as it is showed by the low compliance value (49.23%). Even if Italian laws protect and promote illegal immigrants’ health rights, difficulties in the access rise up all the same, maybe because of the scarce knowledge of their rights, because of the different cultures and the insufficient confidence on preventive interventions.

Summary

Illegal immigrants • Access to NHS • Vaccination interventions

Introduction. Immigration is constantly increasing in Italy. According to census data, immigrant people have increased from 356,159 to 1,334,889 over the period 1991-2001. Due to a relevant amount of immigrants, there is a great need of knowing and studying this phenomenon in more depth, because it affects the choices to be made in Health Care Policies and in Public Health practices. The consequences of these choices will have a large impact into social, cultural, economic and health behaviours in the new integrated community.

In 2001, immigrants were coming from 191 different countries, all over the world. Forty-three point nine per cent came from other European countries, 29.0% from Africa, 16.1% from Asia, 10.7% from America, 0.3% from Australia. Females were about 50.5% of total. The distribution of immigrants within Italy was heterogeneous, with a larger presence in Northern Regions (61.8%), possibly due to greater job opportunities, while 25.0% was in Central Italy, 8.7% in Southern Regions, and 4.5% in the Isles. Lombardy had the greatest presence of immigrants (319,564), Veneto ranked second (153,074), and Latium third (151,567). However, census data cannot be considered exhaustive, because some differences rise up when these data are compared to those of the General Registry Offices. Furthermore, the Italian Institute of Social Studies (EURISPES) “Rapporto Italia 2005” reports that the number of regular immigrants is 2.6 million, which is equivalent to 4% of the Italian population.

In spite of the last regularization, after the “Bossi-Fini” law (n. 189, 30 July 2002) came into force, the illegal quota of immigrants, according to an Eurispes evaluation, is current about 800,000 units. Many Public Health problems arise with this phenomenon of increasing pro-
portions. These people are often emarginated because they do not have a job, nor a house and they live in unstable conditions. The new living environment, poverty, unsafe housing (cold, often overcrowded and lacking basic hygienic conditions), as well as the social instability expose them to a greater risk of illness. Above all, infectious diseases and maternity health are serious problems which require important public health efforts. The evaluation of immigrants’ health needs and health care demand, the assessment of National Health Service (NHS) supply and its accessibility to them are essential for a correct Public Health approach. For example, communicable diseases are often endemic in the countries of origin and could be prevented with a global policy of vaccination which benefits both local population and immigrants. For this reason European countries should pay more attention to promote immigrants’ health since their entrance in the new communities.

In Latium (Central Italy), Caritas outpatient clinic gives a relevant contribution to solve immigrants’ health problems, which, in most of the cases have no stay permission. In Italy, for “Transitorily Present Strangers” (TPS), who are indigent, the right to access health care services (hospital and outpatient care) is guaranteed and includes preventive medicine programmes through the release of the TPS card (Regional Council Resolution 5122/97, Healthcare Regional Commission) 12.

The aim of our study is the design of an organizational pathway to facilitate immigrants’ access to NHS both for diagnosis services and vaccination interventions. Another specific objective of this study is to evaluate the immunity status for preventable diseases through compulsory vaccination in Italy (tetanus, diphtheria, hepatitis B, poliomyelitis) and rubella in women at fertile age.

Materials and methods

A feasibility assessment was carried out through structured interviews with the medical and administrative chiefs of different organizations involved in the project: Caritas Medical Area, Policlinic “A. Gemelli” and Local Health Agencies. Questions regarded three main areas:

• the supply of services for each organizational unit;
• economic sustainability of the project;
• logical and chronological integration of the working processes of the different units in a unique and integrated pathway focused on immigrants needs.

All the involved personnel was trained in specific meetings jointly performed by university researchers and local staff.

The serological survey was carried out by Elisa test for rubella (in women at fertile age), tetanus, diphtheria and hepatitis B and by neutralizing antibody titration for poliomyelitis 13.

This descriptive cross-sectional study was carried out during the period May-October 2004 in a sample of adult immigrants aged 18 years or above and without stay permission. Descriptive and inferential statistics were carried out to evaluate the frequency distribution of the recorded variables. Differences among groups were tested at a p value significance level of 0.05 using Chi-square test for categorical variables and Student’s t test for numerical variables. In this paper, the results are shown using Graphs, frequency Tables and reporting p-values.

Results

An organizational pathway to facilitate the immigrants’ access to NHS was planned and implemented according to the following steps:

• first contact with the immigrants at Caritas outpatient clinic, identification of the health problems and the diagnostic pathway. A written consent form to the study was translated in eight languages and was collected after the signature of the patients. Caritas volunteers explained the pathway to immigrants and handed out an illustrated brochure describing the steps of the pathway;
• access to the hospital “A. Gemelli”, which provided the medical and laboratory services needed to evaluate the immunity status for preventable diseases through compulsory vaccination in Italy and rubella in women at fertile age;
• medical report delivery by voluntary physicians at Caritas outpatient clinic;
• vaccination offer (in case individual’s immunity status was judged to be poor) at the Local Health Unit vaccination service.

From May 21st to October 7th 2004, 229 immigrants accepted to participate in the study, and 64.19% were females. The median age was 35 years (min: 18, max: 63); 43.23% came from East Europe, 23.14% from Asia, 20.09% from Latin America, 13.54% from Africa. Most of them (53.71%) came to Italy in the period 2003-2004, 30.13% in the period 2000-2002, 16.16% came before 2000. Almost sixty per cent of them were unemployed, and only 16.81% had stay permission. Educational level was also analyzed according to the number of years of school attendance: 3.17% were illiterate, 1.81% attended 5 years, 40.72% attended 8 years, 44.80% attended 13 years, 9.50% had a University degree. As concern the civil status, 50% were married, 44.38% were single, 3.37% were divorced, and 2.25% were widowed. In the study period 99 immigrants reached the hospital to perform the diagnostic analysis, resulting in a compliance of 43.23%. No significant statistical differences were shown by gender: the compliance was 41.67% for females, and 47.50% for males (Chi square test: p > 0.05). The average time between the prescription of the analysis and the arrival to the hospital was 4 days for females, and 11.8 days for males (Graph 1). This difference was statistically significant at the Student’s t test (p value < 0.05).

The evaluation of the compliance, according to the continent of origin, showed the following values: 56.67% (17/30) for people coming from Africa,
50.00% (22/44), for people coming from Latin America, 44.23% (23/52) for immigrants from Asia, 36.73% (36/99) for people coming from East Europe.

The school attendance was studied comparing responders and non-responders (Graph 2): among responders, 46.94% had 13 years of school attendance, 37.76% had 8 years, 2.04% had 5 years, 11.4% was graduated, 2.04% was illiterate. Among non-responders, 43.09% had 13 years of school attendance, 43.09% had 8 years, 1.63% had 5 years, 8.13% was graduated, and 4.07% was illiterate. No significant statistical differences in compliance were shown among different educational levels (Chi square test: p > 0.05).

The continent of origin was also studied comparing the two groups (Tab. 1): responders and non-responders. In the first group, 37.37% was from Eastern Europe, 23.23% was from Asia, 22.23% from Latin America, 17.17% from Africa, while for non-responders, 49.20% was from Eastern Europe, 23.02% was from Asia, 17.46% from Latin America, and 10.32% from Africa. No significant statistical differences were shown in the compliance according to the continent of origin (Chi square test: p > 0.05).

The study of the age and the compliance shows a mean age of 37.63 years old for responders and a mean age of 35.92 years old for non-responders subjects. No significant statistical differences were shown in mean age between the two groups (Student’s t test: p > 0.05). The study of frequency distribution of age (Graph 3) showed that younger people (20-30 years old) are more frequent among non-responders (41%) than in responders (36%), but the difference was not statistically significant (Chi square test: p > 0.05).

Discussion

The results of our study give an example of integrated health services for immigrants performed by the collaboration between private and public providers with the aim of facilitating the access of migrant people to the NHS. Notwithstanding our efforts, the results of this study confirm immigrant’s difficulties to access to services, as it is showed by the low compliance value (42.29%). Migrants coming from Eastern Europe were the largest group, but they showed the lowest compliance (36.73%). The compliance of groups coming from
Latin America and Africa were larger: 50% for the former and 56.67% for the latter, possibly because of greater language abilities (for the former group) or a longer duration in Italy.

The meaningful result of the different time between prescription and access to the medical service (collection of a blood sample) between males and females is probably due to different possibility to get free time from work activities to devote to health care.

**Conclusion**

Even if Italian laws protect and promote illegal immigrants’ health rights, difficulties in the access rise up all the same, maybe because of the scarce knowledge of their rights, the different cultures and the insufficient confidence on preventive interventions.

Moreover, the language still represents one of the greatest difficulties: probably new professional figures mediating between different cultures could reduce problems in the accessibility and the wariness of immigrants towards NHS.

Another important issue is the correct and continuous information and education of immigrated people about health promotion and other health topics, such as risks factors or accessibility to NHS. Nevertheless, administrative simplifications of NHS procedures could reduce the problems experienced by immigrants in the access to health services.

**References**


**Graph 3. Age frequency distribution in non-responders and responders**