

BMJ Open Usefulness and practicality of a multidisease screening programme targeting migrant patients in primary care in Spain: a qualitative study of general practitioners

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ABSTRACT

Objectives Some migrant groups are disproportionately affected by key infectious diseases in European countries. These pose a challenge for healthcare systems providing care to these groups. We aimed to explore the views of general practitioners (GPs) on the acceptability, adaptability and feasibility of a multidisease screening programme based on an innovative clinical decision-support system for migrants (the ISMiHealth tool), by examining the current gaps in healthcare provision and areas of good practice and the usefulness and limitations of training in the health needs of migrants.

Methods We undertook a qualitative descriptive study and carried out a series of focus groups (FGs) taking a pragmatic utilitarian approach. Participants were GPs from the four primary healthcare (PHC) centres in Catalonia, Spain, that piloted an intervention of the ISMiHealth tool. GPs were recruited using purposive and convenience sampling. FG discussions were transcribed and analysed using thematic content analysis.

Results A total of 29 GPs participated in four FGs. Key themes identified were: (1) GPs found the ISMiHealth tool to be very useful for helping to identify specific health problems in migrants, although there are several additional barriers to screening as part of PHC, (2) the importance of considering cultural perspectives when caring for migrants, and of the impact of migration on mental health, (3) the important role of PHC in healthcare provision for migrants and (4) key proposals to improve screening of migrant populations. GPs also highlighted the urgent need, to shift to a more holistic and adequately resourced approach to healthcare in PHC.

Conclusions GPs supported a multidisease screening programme for migrant populations using the ISMiHealth tool, which aided clinical decision-making. However, intercultural participatory approaches will need to be adopted to address linguistic and cultural barriers to healthcare access that exist in migrant communities.

STRENGTHS AND LIMITATIONS OF THIS STUDY

- ⇒ Our study is the first to describe the perception and attitudes of general practitioners (GPs) concerning the challenges of screening of migrant populations and the role of PHC in these programmes.
- ⇒ Focus groups (FGs) enabled the researchers to explore in depth the views of GPs about embedding the ISMiHealth tool within clinical practice. Data generated will be used to improve the tool and better understand its clinical applicability.
- ⇒ The study is limited as it does not consider the views of other professionals involved in delivering primary care, or of other stakeholders or of the migrants themselves.
- ⇒ Another limitation is the lack of response by some GPs, since the opportunity to attend the FGs was offered primarily to the more motivated GPs.

INTRODUCTION

In a globalised world with demographic imbalances and political-economic crises, migration is a complex phenomenon involving all European countries.¹ According to 2021 data, there were more than 5 million migrants (defined as foreign-born people) in Spain, which represents 11.3% of its total population.² In fact, migrants account for more than 15% of the population in certain regions, such as Catalonia.³ Migrants are entitled to full access to primary healthcare (PHC) in Spain; the current legislation also allows for the provision of healthcare to undocumented immigrants, but there are barriers that limit the provision of these benefits arising from problems with proof of residency and the lack of both legal and administrative clarity.⁴

On the whole, migrants are healthy,⁵ but vulnerable migrants, in particular, those in



an irregular situation, asylum seekers and refugees, are disproportionately affected by key infectious diseases, including tuberculosis (TB), HIV and viral hepatitis⁶ and other imported diseases that have a low incidence in Spain.^{7,8} These diseases are chronic, asymptomatic for the majority of individuals, but potentially severe in certain circumstances. These characteristics make them the target of screening programmes.^{9,10} Various studies have provided evidence for the cost-effectiveness of screening these conditions in migrants^{9,11–14} and have argued for a more holistic, multidisease approach to addressing the health needs of migrants, in so doing, moving away from the historic focus of single-disease screening—for example, for TB.¹⁵ Despite the availability of screening guidelines for PHC in Europe,¹⁶ these recommendations are often not implemented thoroughly, and key health-care professionals lack the appropriate training and skills in many cases to understand the needs of mobile populations.

There are socioeconomic, cultural and legal factors throughout European countries that may affect the physical and psychological health of migrants,^{17,18} including precarious labour conditions, stigma and discrimination, migrant legal status or even the infection risk associated with their countries of origin or through which they transit.¹⁹ The migratory trajectory and its related health risks and exposure to violence can influence the emergence or exacerbation of different types of mental health problems.²⁰ Issues such as female genital mutilation (FGM) may also need to be considered.²¹

Primary care is often the first contact point with health systems, and often the only one for migrants. However, there are recognised challenges for health professionals when providing healthcare to migrants.²² To attempt to address some of the current shortfalls in the provision of screening to migrant patients as part of PHC, we successfully piloted the implementation of an innovative clinical decision-support system, called the ISMiHealth tool, that guides general practitioners (GPs) through computer prompts about screening recommendations for migrants.²³ During the pilot, the tool was integrated within the primary care electronic patient record (EPR) in Catalonia and displayed prompts about screening recommendations based on an individualised approach that uses three variables: sex, age and country of origin. These variables are routinely registered in the EPR system of health centres, thereby providing a passive yet practical tool for health professionals, who receive a prompt with screening recommendations based on a migrant person's background characteristics when they attend the centre for any reason. In our study, we defined migrants as foreign-born people, irrespectively of when they arrived in Spain.²³ No exclusion criteria were stipulated concerning the year of arrival to provide the screening recommendation, except for TB. This criterion was established because all other infections are chronic and because, for several infections, the risk remains even after migration. We also organised training sessions on specific areas of

migrant health (infectious diseases, mental health and FGM) in all the centres involved in the study. A guideline was written with the screening recommendations and made available for GPs in digital format. Our pilot study highlighted an increasing yield of infections in the centres where the tool was implemented compared with centres that followed the routine care procedures.²³

The tool can easily be adapted to accommodate epidemiological changes of the disease under consideration and to cover other at-risk populations (eg, travellers), settings and conditions, such as rare infections in migrants, and other relatively neglected topics, such as mental health, which is not included systematically in migrants' health assessments.²³

We subsequently wanted to explore the views and concerns of frontline clinicians regarding approaches to multidisease testing, treatment gaps and potential strategies and the extent to which prompting tools such as the ISMiHealth could be useful. Qualitative evaluation before embarking on a rigorous randomised clinical trial to validate and scale up the tool can be invaluable for optimising the tool. Therefore, we conducted a study to evaluate GPs' views on the acceptability, adaptability and feasibility of a multidisease screening approach, the current knowledge gaps and areas of good practice, the use of decision support tools implemented in PHC from their perspective and the usefulness and limitations of face-to-face training in migrant health.

METHODS

Design

We carried out a qualitative, descriptive study using focus groups (FGs), guided by a pragmatic, utilitarian approach.²⁴ This approach is used for process evaluation studies, which adopts standards that require evaluations to be useful, practical, ethical and accurate.²⁴ FGs were used as the technique in which to learn about GPs' opinions and experiences of the ISMiHealth tool and about the screening programme for migrants. They gave the participants the opportunity to discuss matters while comparing their responses in small groups that are 'focus' on a particular topic or set of issues.²⁵ These were guided by a topic-schedule developed by the research team under the following headings: usefulness and limitations of face-to-face training in migrant health; usefulness of the new guidelines for screening recommendations for migrants in primary care; use of the ISMiHealth tool in daily clinical practice and the healthcare provision gaps and areas that require strengthening in migrant health, areas for improvement and benefits of digital tools to support clinical decision-making regarding migrant health. The research team comprised researchers in PHC, public health, social science and clinical practice.

Study setting and participants

We conducted one FG per centre. FG participants were GPs from the four PHC centres in Catalonia, Spain,

involved in the intervention arm of the pilot study of the ISMiHealth tool. The distribution of GPs by PHC centre was: 32 in Barcelona, 18 in Lleida, 17 in Manresa and 29 in Tortosa. Other characteristics of the PHC centres are summarised in a previous publication.²³ GPs were recruited using purposive and convenience sampling.²⁶ All GPs from each centre were invited by e-mail to participate in the FG. A reminder email was sent 48 hours before each scheduled FG in order to avoid absenteeism. The number of GPs agreeing to participate was less than the normal recommended limit of 12 participants for an FG,²⁴ then the final sample was made up of all the GPs who volunteered and who met the inclusion criteria.

Patient and public involvement

Migrant communities were not formally involved in the study design. However, as part of another study, we organised an FG with patients with Chagas disease, which highlighted the importance of screening at primary care rather than specialised care. This finding informed the design of the current study. The results of the study have been disseminated through seminars involving migrant communities, held in the PHC centres where the study was carried out.

Data collection and analysis

Data were collected in the form of digital audio recordings of the FGs in each participating PHC centre between March and June 2019. FGs lasted 60–70 min and were conducted by an experienced moderator (PhD expert in qualitative research) and an observer (PhD in the biomedical field). Participants had no previous contact with the research team before the FG sessions.

All FGs were manually transcribed by one interviewer and field notes were made during or after the session. Data were evaluated by thematic content analysis, which consisted of six phases: becoming familiar with the data, generating initial codes, searching for themes, reviewing themes, defining final themes and writing up.²⁷ The analysis was flexible and iterative. In order to validate the data, reflexivity was carried out in the different phases of the study. In addition, the coding and final categories were triangulated by the research team. The diversity of perspectives of the research team members aided the discussion and analysis of the data, eventually enabling a consensus to be reached.²⁸

Ethical approval was granted by the Research Ethics Committee of *IDIAPJGol* (number:19/020-P). All participants in the FGs gave their oral consent for their contributions to be used.

The study was reported using the Standards for Reporting Qualitative Research (see online supplemental annex 1).²⁹

RESULTS

A total of 29 GPs (22 women and 7 men) with a mean age of 43 (± 9.27) years participated in the FGs. The

distribution of participants by setting was: 7 in Barcelona (FG1), 3 in Lleida (FG2), 10 in Manresa (FG3) and 9 in Tortosa (FG4).

Four key themes were identified from the FGs. The first comprised four subthemes covering the benefits of training on migrant health, the usefulness of the screening tool and the challenges and barriers to screening in PHC. The second theme consisted of three subthemes describing the difficulties in clinical practice related to cultural perspectives, with especial emphasis on GPs' lack of skills for offering adequate care for some groups of migrant women and on GP's views about the impact of migration on mental health. The third theme, comprising two subthemes, described GPs' opinions about the role of PHC in healthcare provision for migrants and the challenge of more holistic care that takes account of the social determinants of health. The fourth theme comprised five subthemes related to GPs' proposals for improving the screening performance when targeting migrant populations.

Theme 1: training and the use of the IS-MiHealth tool to identify health problems in migrants

Broadening knowledge about migrant health

The training on migrant health was generally highly valued. GPs explained that it broadened their knowledge about migrant health-related problems, particularly for imported diseases about which many health professionals are unfamiliar. Chagas disease was exemplified as a neglected problem about which the training enabled GPs to become more knowledgeable.

Yes, I studied [imported diseases] when I did the MIR [Internal Medical residence] and all this and so on, but I am not aware that here we can screen for Chagas, can we not? Because, ... until a few years ago, there wasn't this awareness... (FG4)

The lack of training and guidelines as barriers to healthcare

GPs emphasised that training in migrant health is not usually offered in PHC centres. PHC consultations with a high percentage of migrants together with the lack of training in migrant-related diseases (including imported diseases, FGM and mental health) were identified by GPs as barriers to providing adequate healthcare, and for mental health in particular. Another challenge they reported was the absence of guidelines to support healthcare provision for migrants. The need for more thorough training about FGM was identified as a new health issue for GPs.

I do not have any training in migrant health ... You see the agenda of my patients and, ... I also have more than 20% of migrants ... I mean, ... how do you handle all this? (FG4)

Usefulness of the ISMiHealth tool for screening

We explored the usefulness of ISMiHealth as a screening tool for health professionals. The participants considered it to be very valuable for several reasons. They mentioned that, without it, they would have not screened most of their patients. They also stated that, in the case of infections

with which they were more familiar (eg, HIV and viral hepatitis), the screening would not have been done in many cases because of the absence of symptoms or clinical risk factors. More significantly, without the tool, they would not have screened for imported parasitic infections since they would not have been able to assess information about the epidemiology of such conditions.

If we had not had the prompt, we would not have tested for this ... Anyway, if there are clinical symptoms, yes you think about it, but in a first visit screening... no. For HIV, for example, you think about it... because you know the risk,...but for these parasites...(FG3)

Challenges and barriers to screening in primary care

Some GPs reported difficulty performing the screening on the first occasion the person attended the PHC. However, other GPs differed in opinions, saying that they carried out more screenings during patients' first visits.

The first visit is quite difficult. Sometimes...with a "greeting" in his language, it breaks the ice. I do this a lot "Salam Alaikum", and they smile from ear to ear (FG3).

An additional challenge for them was to schedule the follow-up visits after the screening had been performed. Accordingly, GPs pointed out to a subgroup of migrants who are highly likely to move or who do not undertake the blood test, both behaviours resulting in a high percentage of loss to follow-up.

Furthermore, the lack of time during the clinical appointment due to the high workload currently experienced by GPs in primary care was highlighted as another barrier during the implementation of the screening programme. However, this work overload was not related to the introduction of the ISMiHealth tool. Some participants also expressed concerns about the utility or cost-effectiveness of screening people who have lived in Spain for many years even though all infections included in the screening programme were chronic infections.

Theme 2: GPs' views on the influence of cultural perspectives when caring for migrants and on the impact of migration on mental health

Difficulties with clinical practice arising from distinct cultural perspectives

GPs reported considerable variation in the ways patients expressed their health problems, possibly depending on which cultural or ethnic group to which they belonged. For example, GPs had the perception that migrants from Asian countries do not usually express their feelings, whereas those from South American communities are perceived as culturally closer to the host country (cultural proximity) and are used to talking more openly about their problems. Furthermore, certain migrant groups were described as being more difficult to approach, such as those from the Indian subcontinent. Finally, the GPs felt that some cultures do not place great importance on mental health, or at least that it is considered in a different way from how it is viewed within host countries.

For example,... in Eastern culture or so... specifically depression is very difficult to identify, because they are programmed to work and not to feel (FG3).

Other aspects were recognised by the participant GPs that may influence their clinical practice, such as a lack of identification with other cultures, which leads to stereotyping and prejudiced attitudes towards the migrant groups.

We are marked by prejudices,... I have prejudices too. I have a kind of mistrust, too. I don't know why...With things that I have come across...this prejudice affects my work, affects the relationship...(FG3).

The feeling or the fear of stigmatising migrant individuals by offering screening only to migrant communities was also expressed.

It is somehow a way of stigmatizing people..., for being immigrants... and why is the screening not offered to other people, too? Just because they are immigrants, should this be done to them? (FG4)

Unheard voices of some migrant women and GPs' lack of skills to care for them adequately.

The main concern of the participants was the difficulty of communicating effectively with migrant women from some geographical regions. According to GPs' views, women from the Maghreb region are a very 'closed group', such that they only interact with each other, and they barely speak the languages of the host country—instead they speak only their local languages—and they only attend the medical appointments very occasionally. GPs declared that when Maghreb women come to the PHC centre, they are always accompanied by a man, who takes charge of the communication with health professionals in Spanish or Catalan.

They [woman and a man from the family], come to the PHC centre for her sake [for the woman to obtain health care], but the woman does not speak. She cannot really express herself (FG1).

The perception of GPs about the lack of autonomy, especially among Maghreb women, and the cultural differences between doctors and patients make communication more difficult. Some GPs expressed a feeling of powerlessness, arising from not being able to understand their patients properly and so were less able to offer them adequate care.

... she expresses herself through someone else and, you know, you miss a lot of information.(FG1)

GPs also experienced frustration because the expected relationship of trust between doctor and patient did not develop. Conversely, several GPs mentioned that some female patients gained confidence over time, which led to improve communication. In the case of the approach to FGM, GPs remarked on the need to establish a trusting relationship and noted their lack of the theoretical and clinical skills needed to address it.

Migration process and mental health

Women were also identified by GPs as having a higher risk of mental health problems due to their difficulties in

adapting to life in a new country, as a consequence of the migration process.

Immigrant women have an added problem, especially if they come from the Maghreb culture,...their adaptation is very complex, much more than that of men. They are locked up at home, they communicate much less, and...they only have relationships with women from their own cultural group (FG4).

One participant, though aware of the emotional impact of ablation on women, expressed the difficulty of addressing FGM, and the need to approach other cultures with an attitude of humility and with cultural competence.

Of course...for that woman who does not get ablated, it is brutal, because...she is taken out of the village, she is not allowed to eat because she is "unclean" and...she will bring sickness to the village. Of course, dismantling this belief is very complicated. It has to be done without the arrogance of the "white coat"...(FG3).

Theme 3: role of PHC in the healthcare provision for migrant populations

PHC as a migrant care referent and challenges for adequate care

Some participants talked about the importance of considering the perspective of PHC when implementing a screening programme for migrant populations. There is a general understanding in Spain that the responsibility of migrant care lies with GPs, since they are the backbone of the National Health system. However, some GPs agreed that few resources are allocated to the reception of migrants (ie, specific programmes for migrant care, supported by intercultural mediators) and that there are too few resources to address the social problems of the migrant population in PHC.

Very scarce, the resources are very limited....and I think we are very unable to offer help to mothers who are separated from their children, to families or to children who come alone (FG1).

The neglect of social problems in PHC

The GPs' opinion about promoting a social approach in PHC emerged particularly strongly, due to the need to change the healthcare approach to include social determinants of health, since society has evolved over time and health needs have changed markedly, most health problems being directly related to social problems.

What is happening is that we are working as we did 30 years ago, and society is very different. So, what happens? Most of the pathologies we see are social problems and are very complex... (FG4).

Some of the participants observed a conservative perception of healthcare provision and that social problems are being medicalised in PHC, whereas others felt that PHC was outdated in terms of adapting to changes in society, given the current complex social problems that need to be addressed. In addition, the idea that PHC could no longer be sustained without an integrated social perspective was also noted.

I think that primary health care will either be "social" or it will not be... I mean... nowadays... the problems we have are the determinants of health, social problems, immigration, and all of

this. And we have to integrate these problems in the health care provision, because otherwise ...we are lost (FG4).

On the other hand, positive aspects were also identified. One participant believed that, overall, healthcare provision at PHC has substantially improved and that new innovative programmes are emerging, such as social prescription.

Theme 4: proposals for improving screening of the migrant population

Key areas for improving the screening of the migrant populations were highlighted by GPs. These are presented as five subthemes (table 1).

In the field of training, the participants expressed the need for more training on cultural competence, and also continuous training in screening. They also specifically suggested training one health professional in each health catchment area in the field of FGM, so they could become an expert referent for this aspect of health for the rest of health professionals in her/his centre. Regarding technical improvements to the ISMiHealth tool, they suggested adding one indicator (time since arrival in Spain) to the screening algorithm, and to register follow-ups, especially for patients with mental health conditions.

GPs also suggested incorporating a variable that reported travel of migrants to their country of origin, although disagreements about its usefulness emerged given the large amount of additional information that might have to be collected and managed. With respect to screening, the importance of including nursing professionals and of improving referrals to specialised units in International Health was highlighted. Support groups based at PHCs were proposed, such as psychoeducational groups, targeting migrants with mental health problems and other support groups specifically addressing FGM. In addition, the development of quality-of-care indicators related to screening performance in migrants was proposed.

DISCUSSION

Our findings suggest that the multidisease screening tool targeting migrant population that was piloted in four PHCs in Spain was positively valued by GPs and that it may help them to individualise the screening decision-making process based on epidemiological evidence. Qualitative analysis based on GPs' opinions indicated that the screening approach was well accepted. In fact, training on specific migrant health expanded GPs' knowledge of migrant health-related topics and the active participation in the screening intervention improved the sensitivity of GPs with respect to migrant-related health problems and highlighted the need for continuous training in these problems and in culturally competent care. However, not all migrant health problems can be easily addressed or evaluated as part of a screening programme in PHC settings. In this regard, when addressing mental health

**Table 1** Subthemes and quotations of proposals for improving screening the migrant population in PHC

Subthemes	Quotations
Cultural competency training	<i>Mourning, for example. We express the death of someone in different ways and each culture does it differently. And it is also a mental health approach that we face on many occasions, and we need to understand that every culture has a way of working and dealing with it, do we not? And ... well, of course, training in how to support mourning is very important so that we can understand all this too. (FG3)</i>
Training of professionals in female genital mutilation	<i>This requires training, huh. Because it is violent for us. I think there should be some training, that it should be more centralized only in one person who will become an expert on the topic... (FG1)</i>
Upgrade referral to specialised units in international health	<i>And updating referrals [to specialized International Health units] again, because ... I personally did not ask for it, but, if there had been one occasion [to make a referral], I would have thought, let's see how I will manage to do it. (FG1)</i>
Create quality standard indicators for screening	<i>... this could also be considered as an indicator of the standards of quality of care.... In this regard, an immigration section could be created in the system, which could indicate the total number of migrants and how many of them have been requested to take an HIV test? (FG4)</i>
Group approach in PHC: psychoeducational groups for migrants at risk of mental health problems	<i>...the adjustment disorder often improves more with this kind of support groups, rather than with the drugs/ pills... Because they get into a dynamic,... First of all, they do not feel lonely,... they share their problems, they can talk about them ... And indeed, perhaps, this would be a place for discussion for certain migrant groups that are more vulnerable. (FG4)</i>
PHC, primary healthcare.	

and FGM, the screening performance could be evaluated through a series of quality-of-care indicators.

Among the barriers to the implementation of the screening programme, some GPs reported the difficulty of screening during initial visits, due to the lack of trust in the care doctor–patient relationship and the challenge of performing follow-up visits in a highly mobile population with large numbers lost to follow-up in some migrant groups. They also remarked the overload of work that GPs usually experience in primary care as being a barrier, although this was not related to the introduction of the ISMiHealth screening tool. The GPs questioned the utility of screening for migrants who had lived in Spain for many years. This suggests that more epidemiological and clinical aspects of these health problems should be addressed on training sessions, since most of the health conditions featured in the programme are chronic and should be addressed irrespective of when the patient first arrived in the host country.

The ISMiHealth tool has room for improvement and some approaches have been suggested, such as adding other indicators (eg, time since arrival in the host country), establishing organised and efficient referrals to specialised international health units and improving the registry of follow-up and outcomes.

There has been a similar initiative in the United Kingdom that integrates screening for multiple infectious diseases. A qualitative study confirmed the programme's feasibility and acceptance by migrants and healthcare professionals.³⁰ However, as far as we know, our study is the first to describe the perceptions and attitudes of GPs concerning the challenges of screening migrant populations and the role of PHC in such programmes, including the evaluation of the clinical decision-support system.

With the trend towards increasing migrant populations in European countries, several guidelines have been put in place and screening recommended for certain conditions in migrant populations.^{8 9 11–16} Primary care is the strategic level of care where these programmes would be most suitable, but at the same time, it is the most challenging.²³ One study addressing knowledge and attitudes among health professionals recommended interventions to improve professional awareness of migrants who require specific testing for certain diseases to reduce the undiagnosed and untreated burden of infections in this vulnerable population.³¹ Our study highlighted additional challenges, such as the lack of knowledge among staff regarding the testing policy and screening recommendations. This is one specific advantage of our tool that we have identified in this study. Our tool provides prompts for infections about whose risks in migrants, physicians are not sufficiently aware.

Language and cultural barriers in everyday clinical practice and during the implementation of a screening programme were highlighted by GPs as additional challenges when implementing interventions targeting migrant populations. In this regard, some cultural and gender barriers of migrant communities (eg, women from non-Spanish-speaking countries) may prevent adequate healthcare provision, especially for those who have newly arrived, because the feasibility of the screening programme is compromised. In our study, GPs expressed great concern about the inadequate healthcare provision in certain groups of migrant women (especially those from Maghreb, who form a very prevalent migrant community in the area studied) due to communication difficulties and different cultural outlooks. However, they also stated that the trust gained over time with some

women substantially improves the quality of the relationship, which was highlighted to be key, for example, to the approach adopted for dealing with FGM. Therefore, addressing these cultural and gender barriers when designing the strategy for implementing the screening tool is essential if certain health aspects, such as FGM and mental health.

Gender inequalities affect all societies, but the intersectionality of being a woman and a migrant may represent an even greater disadvantage because some migrant women experience more socioeconomic disadvantage, have fewer opportunities to learn the language and to connect to the labour market, have a greater childcare burden and are at greater risk of violence, all of which are risk factors for mental disorders.^{32–34} This must be considered when developing culturally and gender-sensitive strategies. These aspects have also been recognised in other qualitative studies targeting migrant groups^{30 31 35 36} and should be addressed in future studies.

Participants in our study remarked that they faced difficulties when addressing women's emotional problems during a consultation due to a lack of training in intercultural competence. On the other hand, different understandings of mental health and the perceived stigma may inhibit patients in this population from seeking care. The lack of culturally sensitive health services that are adapted to the family and social environment of patients can also create barriers to healthcare access.^{37–39} Unfortunately, mental health problems may not be a priority for patients and for the health systems, which consider other social and structural problems to be more relevant. The cultural awareness of health professionals has previously been identified as a component of good clinical practice that needs to be reinforced.⁴⁰ This is even more important for conditions, such as FGM, that are difficult to address with some migrant populations.⁴¹ The perception that some migrant groups understand and express illnesses in different ways, making the doctor–patient relationship more difficult, was previously identified in a study in 14 European countries⁴⁰ and indicates a lack of fit with the hegemonic medical model by which the GPs were trained.⁴²

The heterogeneity in migrant communities may lead to conflicts in healthcare.⁴³ This is a key aspect for guaranteeing culturally competent healthcare services and for building trust-based relationships with migrant patients.⁴⁴ This was also noted in our study, in which GPs recognised how their own prejudices towards the migrant population could affect their clinical practice, and likewise, the feeling that they could stigmatise migrants by offering screening of certain infections, which were of relevance only to members of migrant communities. In the study by Seedat *et al*, migrant community leaders highlighted this stigma as being a barrier in their migrant screening programme.⁴⁵ In another study, the stigma did not have the expected effect, but rather generated trust in the health professionals as a result of them, providing a clear

and simple explanation of test results that were a cause for concern among the migrants.³⁰

Finally, GPs discussed the role of PHC in migrant healthcare and the urgent need to change to more holistic type of healthcare provision that takes social determinants of health into consideration. However, they commented on the lack of resources in PHC centres for targeting the reception (health assessment) of migrants and the social and health needs of migrant populations. This means that a multidisciplinary approach and good practice should be developed when addressing migrant health needs, whereby social needs are taken into consideration to indirectly improve the health of migrant populations.³⁶ Social prescribing, as noted by GPs in our study, is another way by which gaps in healthcare treatment could be filled, through connecting migrant populations with community services run by councils or charities. In addition to the social connection involved, this approach helps migrant communities to find the resources they need and to facilitate the pursuit of pathways to change.

To implement this kind of screening programme in the future, they will have to be adapted in accordance with GPs' experiences and views, so that they reinforce a participatory research approach.⁴⁶ This could be achieved by expanding the qualitative study to migrants and other PHC stakeholders to obtain other relevant opinions. A policy brief could compile the final recommendations for PHC improvements. Some of the relevant policy recommendations made so far are: (1) to allocate more human and economic resources for the holistic care of migrant populations; (2) to improve continuous training for health professionals, including aspects such as cultural competence; (3) to upgrade the clinical guidelines and (4) to create quality indicators for screening migrant health problems. In addition, it is important to offer a service that responds to the needs of the population while taking care not to stigmatise certain groups on the basis of their origin or race.⁴⁷

The ISMiHealth tool is inexpensive to run. It is estimated to cost around 10 000 €, including its maintenance for 5 years, in one EPR system.²³ The next steps are to redesign and validate the screening tool on a larger scale through a robust trial, including cost and a cost-effectiveness analysis of the intervention, and to test the clinical decision-support system further in other EU/EEA countries that receive large numbers of migrants.

Limitations

The study has some limitations. First, the targeted groups included only GPs from PHC and no other health professionals such as nurses or administrative staff. This may have limited the introduction of other themes during the discussion. Other limitations include the lack of response by some health professionals, since the fact that only more motivated GPs were attending FGs, implies thereby, that the FG did not fully represent the diversity of GPs as a whole. In this sense, the gender imbalance of the participants, with its clear predominance of women, is



remarkable. Although professional women predominate in PHCs in Catalonia, it is possible that they are also more motivated than men to participate voluntarily studies of this nature.⁴⁸ New strategies should be employed to obtain the male perspective in qualitative studies. Finally, efforts should be made to evaluate the perception of members of migrant communities about the screening programme that targets them specifically.

CONCLUSIONS

This study demonstrates the acceptance and positive evaluation by GPs of implementing a screening programme for migrant populations through a clinical decision-support system implemented at PHC. The tool helps health professionals to identify health problems in migrants. GPs highlighted the importance of specific training on in PHC screening including learning about cultural competence. Intercultural participatory approaches should be adopted during implementation to address linguistic and cultural barriers among migrant communities related to healthcare access and lack of follow-up. GPs also identified an urgent need to switch to a model of holistic care in PHC that considers the social determinants of health, and that invests in the necessary sources. Further qualitative studies that evaluate other views, (of migrants and other stakeholders), about the screening programme are warranted.

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Patient and public involvement Patients and/or the public were involved in the design, or conduct, or reporting, or dissemination plans of this research. Refer to the Methods section for further details.

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Data availability statement Data are available upon reasonable request. Digital audio recordings and transcriptions of the recordings were stored and secured on the local server of IDIAPJGol, where only participating researchers had access to them. These will be erased 5 years after the completion of the study. No international data transfer of the recordings made in the FG discussions will take place. All other data pertaining to the study are included in the article or have been uploaded as supplementary information.

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Abstract - Summary of key elements of the study using the abstract format of the intended publication; typically includes background, purpose, methods, results, and conclusions	2/43-60
Introduction	
Problem formulation - Description and significance of the problem/phenomenon studied; review of relevant theory and empirical work; problem statement	3-4/78-116
Purpose or research question - Purpose of the study and specific objectives or questions	4/117-125
Methods	
Qualitative approach and research paradigm - Qualitative approach (e.g., ethnography, grounded theory, case study, phenomenology, narrative research) and guiding theory if appropriate; identifying the research paradigm (e.g., postpositivist, constructivist/ interpretivist) is also recommended; rationale**	5/129-134
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Links to empirical data - Evidence (e.g., quotes, field notes, text excerpts, photographs) to substantiate analytic findings	6-11/173-331

Discussion

Integration with prior work, implications, transferability, and contribution(s) to the field - Short summary of main findings; explanation of how findings and conclusions connect to, support, elaborate on, or challenge conclusions of earlier scholarship; discussion of scope of application/generalizability; identification of unique contribution(s) to scholarship in a discipline or field	11-13/333-404
Limitations - Trustworthiness and limitations of findings	13/406-413

Other

Conflicts of interest - Potential sources of influence or perceived influence on study conduct and conclusions; how these were managed	15/458-459
Funding - Sources of funding and other support; role of funders in data collection, interpretation, and reporting	14/445-451

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**The rationale should briefly discuss the justification for choosing that theory, approach, method, or technique rather than other options available, the assumptions and limitations implicit in those choices, and how those choices influence study conclusions and transferability. As appropriate, the rationale for several items might be discussed together.

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