

Trauma, Psychosocial Factors, and Help-Seeking in Three Immigrant Groups in Finland

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Abstract

Multiple psychosocial factors influence help-seeking behavior among immigrants, but studies have focused on separate issues in single cultural groups. This study tested a model of help-seeking behavior among three ethnically different immigrant groups. Participants were 1356 Somali, Russian, and Kurdish immigrants (18–64 years). They reported past traumatic events, social network, acculturation indices, trust in services, and mental health as well as usage of mental and somatic health services. Structural equation modeling (SEM) with multigroup procedure was applied. First, past traumatic events were associated with seeking more mental health services, indirectly mediated through increased risk for mental health problems in all three ethnic groups. Second, acculturation played a significant role in the use of mental and somatic health services only in Kurds and social networks in Kurds and Russians. The unique culturally influenced dynamics in help-seeking behavior should be considered in the development of health services.

Introduction

Untreated mental health problems of immigrants can cause great human suffering as well as a high economic burden on host countries through increased morbidity and negative influence on education, employment, and family relations.¹ To facilitate equal access to mental health services, more knowledge about factors influencing immigrants' mental health help-seeking is urgently

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needed. Theoretical models of help-seeking behavior emphasize the important roles of health beliefs, attitudes, and trust in services, as well as personal, societal, and family resources (e.g., social support) and need for care (e.g., distress or mental health problems).^{2, 3} Research available on single immigrant groups has found acculturation, emigration context, cultural values, and illness explanations as special factors influencing health service use.^{4, 5} Yet, earlier studies have not analyzed similarities and differences in health help-seeking across diverse ethnic immigrant groups.

The present study aims at comprehensive analysis of multiple psychosocial factors influencing the use of mental and somatic healthcare services among the diverse cultural groups of Somali, Kurdish, and Russian immigrants settled in Finland. The tested model is based on research about factors affecting immigrants' help-seeking behavior and acknowledges that especially refugees have a severe trauma history which may influence their service use as well as factors influencing help-seeking.

Immigrants and mental health

Migration occurs voluntarily because of social bonds and better economic and educational prospects or involuntarily because people are forced to leave their country and seek refuge due to military, political, ethnic, or other persecution. Refugees and asylum-seekers have often experienced severe pre-immigration stress and traumatic events, such as war, violence, and torture.⁶ Consequently, they are at an increased risk for mental health problems, including post-traumatic stress disorder (PTSD), depression, and anxiety, as well as severe somatic problems, like chronic pain disorder.⁷ In addition, immigrants face further stress and problems post-immigration, while suffering from separation and worry about family left behind.^{8, 9}

Despite high levels of mental and somatic symptoms and a greater need for health services, refugees seem to use less health services than native residents. Previous studies of Iraqi refugees resettled in Australia and the USA, Bosnian refugees in the USA, and Somali refugees in Great Britain confirm the high levels of symptoms and low use of mental health services.¹⁰⁻¹³ In the Finnish Migrant Health and Wellbeing Study (Maamu), the mental health status of Kurdish immigrants was significantly worse than that of the Finnish native population, indicated by a high level of anxiety and depression symptoms.¹⁴ Similar results were also presented in a sample of Sub-Saharan immigrants to the USA.¹⁵ Concerning voluntary immigrants, findings are inconsistent regarding health service needs and mental health. Research suggests that those who have immigrated to Western countries from the former Soviet Union are more likely to be distressed than native residents, need more health services, and use them more often, especially with age.¹⁶⁻¹⁸ Furthermore, a recent review highlights a generally higher risk of mental illness in first-generation migrants.¹⁹

Factors predicting health help-seeking

Help-seeking comprises a complex set of cultural norms that influence all steps in the process; beginning with the recognition of a health problem, followed by the decision to seek help to solve it, and the selection of a treatment or service. Cultural interpretations navigate the comprehension of mental health problems and their causes, influencing decisions of service use.²⁰ For instance, mental health problems can be interpreted in a religious or spiritual context, as observed in traditional Muslim societies and African tribal communities. Hence, mental illness can be understood as God's will, a punishment from one's ancestors, or witchcraft, which may lead to avoidance of help-seeking due to the fear of generating conflict with the community.^{21, 22} Oftentimes, a more culturally acceptable way to handle mental illness is to construe psychological distress as somatic problems. In fact, many non-Western societies use bodily metaphors to describe

emotional sensations.²³ Thus, somatic interpretations of psychiatric symptoms can influence the way someone seeks help, primarily for somatic health symptoms from general health services.

Distrust in healthcare professionals who represent the host culture may partly explain immigrants' low use of mental health services. Immigrants seem to prefer seeking help from relatives, traditional healers, and religious leaders rather than official healthcare service providers in Finland and elsewhere.^{24, 25} However, positive experiences with healthcare professionals, familiarity with the host culture, and language proficiency increase the degree of trust in health services of the host country.^{26, 27}

Successful acculturation is agreed to influence both mental health and help-seeking behavior.²⁸ For instance, a Dutch study showed that a high level of acculturation to the host culture increased the use of health services among Turkish and Moroccan immigrants.²⁹ Language proficiency is considered the strongest predictor of acculturation, followed by age of immigration, length of residence in the host country, generational status, and cultural similarity with the country of origin.^{30, 31} A qualitative study with Somali immigrants in Finland reported communication problems as a barrier to the use of mental health services.²⁴ Similarly, older Kurdish and Russian immigrants in the USA experienced language problems and cultural differences as barriers for health service use.^{4, 32}

The social network clearly influences immigrants' help-seeking. There is ample evidence that immigrants from interdependent cultures seek help predominantly from family and relatives. The importance of one's own network has been confirmed among Asian, Latin American, Russian, Somali, and Kurdish immigrants.³³⁻³⁷ Among Asian immigrants in the USA, family conflict and loneliness led to help-seeking from professional health services.³¹ Typically, immigrants maintain part of their social network outside of the host country, and friends and relatives will also help them find services in their homeland.³⁸

Generally, women seem to be more active in seeking help for mental and physical health problems, especially when their prior experience is positive.^{39, 40} However, women immigrating from cultures where the men control all access to healthcare are typically not active help seekers and experience more barriers in service use.⁴¹ In a study with Somali immigrants, the men seemed to control doctors' visits of their wives in immigrant conditions, reflecting their patriarchal social system.²⁶ Additional research with immigrants in France emphasizes the positive influence of education on mental health and experiences with health services.⁴² However, a study among immigrants from Sub-Saharan Africa to the USA found no impact of education on help-seeking.⁴³

Context of the present study

Through a steep rise in immigration numbers in recent years, Finland is transforming from a mono-cultural to an increasingly multiethnic country. Nonetheless, Finland's public healthcare system is still based on mono-cultural and biomedical health conceptions. All permanent residents (including immigrants) are entitled to use the municipal healthcare system, which is primarily funded by taxation and patient fees that are relatively cheap and have an upper limit per year.

Russians, Somalis, and Kurds are among the largest immigrant groups in Finland. Russians tend to relocate due to work contracts, private bonds, or as returnees from areas of the former Soviet Union. Somali immigrants have often experienced political turmoil and civil war in their home country and come to Finland to seek refuge. As a stateless nation, Kurdish people constitute in Finland an ethnic minority, and many have endured persecution, oppression, and imprisonment before immigration. Similarly, Russian, Somali, and Kurdish immigrants come from interdependent cultures, emphasizing a relational social identity and an interdependent self-construal.⁴⁴ Instead, Finnish mainstream culture emphasizes independent and individualistic aspirations and a biomedical perspective in healthcare. These culturally discrepant norms may challenge the daily life of immigrants in Finland.

Procedure of the study

The Maamu Study received ethical approval by the Coordinating Ethical Committee of the Helsinki and Uusimaa Hospital District in Finland. All participants provided written informed consent in their native language or in Finnish. Additionally, trained staff of Russian, Somali, and Kurdish origin conducted face-to-face interviews and health examinations in the participants' native language or in Finnish. If the person was unable to read and/or write, help was provided in filling out the questionnaire. The interview portion lasted approximately an hour.

Measures

Background features

Participants reported marital status, education, socioeconomic status, household size, and work situation. Education was coded into three classes: no education, vocational training/some courses, and academic/polytechnic education.

Traumatic events

Personal experience of traumatic events was assessed using a checklist that asked about experiencing war or natural disaster, witnessing a violent death or injury, as well as experiencing sexual violence, assault, kidnapping, torture, or another extremely violent act. Participants were asked to respond yes (1) or no (0) to each question, and a new variable was computed based on the sum of traumatic events.

Indices of acculturation

Acculturation was measured using five variables. (1) Participants reported the year they arrived in Finland, and the according length of residency (years) was calculated. (2) Nationality status in Finland was coded as Finnish versus not Finnish citizen. (3) Language proficiency was indicated by one's level of understanding of both Finnish and Swedish (ranging from 1 = not at all to 4 = I understand well) and being able to "explain things in Finnish/Swedish" (ranging from 1 = not at all possible to 4 = I manage well). (4) The number of Finnish friends as raw numbers. (5) Social contacts with Finns were assessed by asking the amount of communication with Finns (1 = almost daily, 2 = weekly, 3 = monthly, 4 = a few times per year, 5 = seldom, 6 = never/does not apply).

Social network

The social network of participants was measured by five variables: (1) Friends' number refers to participants' responses to the question, "How many good friends do you have?" The answers were coded using a 5-point Likert scale (1 = no friends, 2 = one friend, 3 = two to three friends, 4 = four to six friends, 5 = seven or more friends). (2) Loneliness indicates the subjectively experienced lack of a social network, assessed by the question, "Do you feel lonely?" Response choices were based on a 5-point Likert scale that was reverse scored (ranging from 1 = not at all lonely to 5 = always lonely). Further, researchers inquired about participants' (3) contacts with relatives, (4) members of one's own ethnic group, and (5) people abroad, via a 6-point Likert scale (ranging from 1 = almost every day to 6 = there are no friends/relatives).

Depression and anxiety

The Hopkins Symptom Checklist-25 (HSCL-25), a self-administered questionnaire, was used to assess levels of depression and anxiety. The HSCL-25 includes 15 items covering depressive

symptoms (e.g., “feeling hopeless about the future”) and 10 items measuring anxiety symptoms (e.g., “nervousness and shakiness inside”) during the past week which participants answer on a 4-point Likert scale (ranging from 1 = not at all to 4 = extremely). The checklist is a cross-culturally valid instrument.^{47, 48} Mean scores for depression and anxiety sub-scales were calculated.

Somatization symptoms

Somatic symptoms were assessed with the somatization sub-scale of the Symptom Checklist-90 (SCL-90) by Derogatis.⁴⁹ Each item describes a somatic experience (e.g., dizziness or muscle soreness). The participants marked their own experience on a 5-point Likert scale (ranging from 1 = not at all to 5 = very much).

Life satisfaction

Satisfaction with one’s life was measured via three variables: (1) satisfaction with oneself, (2) satisfaction with relationships, and (3) satisfaction with ones’ own health. Participants answered questions using a 5-point Likert scale with choices that ranged from 1 = very satisfied to 5 = not at all satisfied.

Trust in services

Participants’ level of trust in services was measured via three variables. (1) Trust in healthcare and (2) trust in social services were questioned by single items using four Likert response choices (ranging from 0 = not at all to 3 = I trust totally). (3) Trust in people was measured by asking participants the extent of their belief in the statement, “I believe that people cannot be trusted.” Participants answered using a 5-point Likert-scale (ranging from 1 = I believe very much so to 5 = I do not believe that at all).

Help-seeking of mental health services

Four variables were developed to assess help-seeking of mental health services. (1) Doctor visits refer to the use of mental health services offered by a psychiatrist, a doctor, or a psychologist during the past 12 months (1 = yes, 0 = no; sum variable = 0 to 3). (2) Psychiatric services include 10 mental healthcare providers: healthcare center, occupational health, open clinic, mental hospital, student healthcare, private services, alcohol/substance abuse clinic, and others (1 = yes, 0 = no). (3) Use of mental health services abroad was examined for the past 12 months with a direct question (1 = yes, 0 = no). (4) Participants were asked if they experienced need for mental health services at the time of the study (1 = yes, 0 = no).

Help-seeking of somatic health services

Four variables indicate the use of somatic services: Health care center and General practitioner (GP), Private doctor, Hospital open clinics or Services elsewhere. Participants reported whether they used these services in the past 12 months (1 = yes, 0 = no).

Statistical analyses

The distributions of demographic and trauma variables were described by cross-tables and χ^2 tests among the three immigrant groups. Structural equation modeling (SEM; AMOS 15.0 software; SPSS Framework Version) was applied to test the model of psychosocial factors contributing to help-seeking behavior among the three ethnic groups. Multigroup procedure was applied to the model simultaneously to test direct and mediated paths in each group. The criteria for good model fits in SEM were non-significant χ^2 value, $\chi^2/df < 2.00$, Comparative Fit Index (CFI) and Tucker-Lewis Index (TLI) above .90, and RMSEA below .06.⁵⁰ Missing values in the models were estimated with regression imputation (maximum likelihood estimation available in AMOS), and modification indices (MI) information was

used to specify associations and covariates between estimates. SEM was chosen because it (1) can test multiple regression equations simultaneously, which reflects the phenomenon that multiple psychosocial factors are associated with help-seeking behavior and (2) can produce measurement models of manifest variables to construct comprehensive latent concepts, which was helpful when dealing with single a-theoretical items typical for epidemiological studies. Further, SEM (3) allowed researchers to evaluate the significances of direct and indirect (mediated) paths between trauma and help-seeking behavior simultaneously and (4) provided a multigroup procedure to test whether the models fit indices, standardized coefficients (β) for individual paths, and covariates differed between the three ethnic groups.

First, analyses involved testing the measurement models of the latent constructs of social network, acculturation indices, mental health, trust in services, and help-seeking for mental and somatic/general health services in a multigroup procedure to show factorial invariances (whether the measurement models differ or are similar across the three groups). Second, multigroup procedure was used to test whether the hypothesized model, with direct and mediated effects between traumatic events and help-seeking (Fig. 1), would fit similarly in the data of the three groups. Third, if that multigroup SEM analysis did not fit the data, the hypothesized model was separately tested in the Russian, Somali, and Kurdish groups.

In the SEM model, traumatic events were the exogenous manifest variable, and its associations were tested with the latent constructs of seeking help from mental health services (four manifest variables) and somatic health services (four manifest variables), either directly or mediated through social networks (five manifest variables) or acculturation indices (five manifest variables), and further through mental health (three manifest variables) and trust in services (three manifest variables). The shared variances between the endogenous predictor variables and help-seeking from mental health and somatic health services were allowed to correlate according to the MI; age, gender, and education were included as covariates in the models.

Results

Descriptive statistics

Table 1 presents the background characteristics and traumatic events of the participating Russian, Somali, and Kurdish groups. The groups differed in regard to all characteristics. For example, there were more women (64%) in the Russian group than in the Kurdish (45%) and Somali (56%) groups. Also, Russian immigrants were more likely to report work permit-based residence status (54%), whereas about half of Somali (56%) and Kurdish (54%) participants had a refugee status. Russians were older (40 vs. 23% of participants were within the 45–64 age group) and better educated than others, as 79% had a basic high school education, compared to 42% among Kurds or 22% among Somalis. Additionally, Kurds had lived a shorter time in Finland (10.82 years on average) than the other groups (11.66–11.85 years on average).

Kurdish immigrants reported the highest level of traumatic events, with one fifth (21%) reporting more than six traumatic events, while only a few Somalis and Russians ($n = 4-7$) reported a similar number. Earlier published findings based on the same data revealed that the three ethnic groups also differed in the ways that they endorsed mental health problems: Kurds endorsed depressive, anxiety, and somatic symptoms highly, whereas Somalis endorsed mainly somatic symptoms, and Russians reported the lowest levels in these symptoms.¹⁴

Measurement models

The measurement models of seven latent constructs with the loadings of their manifest variables are presented in Table 2 separately for each ethnic group. The multigroup measurement model had an acceptable fit to the whole data (CFI = .90, TLI = .90, RMSEA = .027 (90% CI .026–.027)), although the (χ^2) statistic indicated misfit (χ^2 (992) = 3927.51, $p < .0001$; $\chi/df = 3.96$) due to the

Table 1

Demographic, acculturation, and trauma characteristics of the Russian, Somali, and Kurdish immigrant groups

	Russian (N= 545)		Somali (N= 351)		Kurdish (N= 508)		χ^2
	%	n	%	n	%	n	
Gender							38.23*****
Men	35.8	195	44.2	155	54.7	278	
Women	64.2	350	55.8	196	45.3	230	
Age							55.14*****
18–29	26.6	145	41.0	144	32.5	165	
30–44	33.4	182	35.9	126	44.5	226	
45–64	40.0	218	23.1	81	23.0	117	
Education							377.76*****
No education	0	0	31.9	109	12.6	64	
Primary/secondary school	20.6	111	46.2	158	45.8	232	
High school	79.4	427	21.9	75	41.6	211	
Length of residence							24.81***
1–5 years	21.7	117	28.3	98	20.7	105	
6–14 years	41.9	226	38.4	133	52.7	267	
15 years or more	36.4	196	33.2	115	26.6	135	
National status							20.74***
Finnish nationality	44.4	242	36.5	128	44.9	228	
Refugee or asylum seeker	1.0	5	56.4	212	54.1	279	
Work permit	53.6	297	6.1	6	2.0	9	
Finnish language proficiency							21.75***
Good and sufficient	98.1	528	93.6	322	98.6	499	
Poor or non-existing	1.9	10	6.4	22	1.4	7	
Traumatic events (number)							365.89*****
None	75.2	410	51.9	182	22.6	115	
1–5	24.0	131	46.2	162	56.3	286	
6–10	0.7	4	2.0	7	21.1	107	

Note. The available data vary due to missing information

large sample size.⁵¹ The groups differed in the significances of the loadings of manifest variables on the latent constructs (standardized regression weights), except on mental health. The measurement model of mental health was complete in all ethnic groups (i.e., the manifest variables of depression and anxiety, somatization, and life satisfaction showed significant loadings on the latent construct of mental health).

The measurement model of the social network was complete in the Somali group, but the manifest variable of loneliness did not load significantly in Russian and Kurdish groups. The five manifest variables of the latent acculturation construct loaded significantly in the Russian and Kurdish groups, but the variable of Finnish friends did not load on that construct in the Somali group. While the latent construct of seeking mental health services was relatively complete in all three groups (except seeking help abroad in the Kurdish group), the latent construct of seeking somatic healthcare services was

Table 2

Loading estimates of manifest variables for latent constructs of the SEM help-seeking models of psychosocial factors in Russian, Somali, and Kurdish groups

	Russian				Somali				Kurdish							
	Unstd	β	StdE	β^b	t tests	Unstd	β	StdE	β^b	t tests	Unstd	β	StdE	β^b	t tests	
Help-seeking of mental health services																
Doctor visits	1.00		.66		1.00		.41		1.00		.73					
Psychiatric services	.34	.04	.85	9.12***	.98	.19	.45	5.18***	.43	.04	.53	10.02***				
Seeking help abroad	.01	.01	.11	2.27*	.01	.01	.29	7.18***	.01	.01	.08	1.49				
Need for psychiatric help	.13	.01	.47	9.10***	.10	.01	.49	10.00***	.13	.01	.77	9.39***				
Help-seeking of somatic health services																
Health care center, GP	1.21	.42	.15	2.91**	.02	.01	.23	2.64**	1.14	1.64	.13	2.04*				
Private doctor visits	.39	.21	.09	1.88+	.56	.43	.10	1.29	.06	.04	.08	1.68+				
Hospital open clinics	.38	.37	.30	1.03	.99	.71	.16	1.39	.45	0.07	.38	6.20***				
Services elsewhere	1.00		.64		1.00		.63		1.00		.64					
Acculturation indices																
Length of residence	1.00		.60		1.00		.22		1.00		.52					
Nationality status	.07	.01	.54	13.71***	.03	.02	.25	1.75+	.07	.01	.40	10.93***				
Language proficiency	.15	.01	.79	12.99***	.35	.10	.67	3.64***	.20	.02	.78	10.80***				
Finnish friends	.62	.13	.69	4.77***	.08	.18	.08	0.45	.32	.14	.71	2.28*				
Social contacts with Finns	.18	.01	.82	13.01***	.70	.19	.83	3.64***	.27	.03	.87	10.61***				
Social network																
Number of friends	1.00		.22		1.00		.20		1.00		.16					
Feeling of loneliness	-.06	.95	-.06	-1.01	.12	.05	.22	2.58**	.16	.11	.10	1.37				
Contacts with relatives	.56	.19	.33	2.92**	.23	.07	.31	3.12**	.48	.21	.22	2.27*				
Contacts with own ethnic group	.34	.12	.30	2.85**	.70	.19	.86	3.71***	.99	.41	.52	2.65**				
Contacts with people abroad	.51	.16	.47	3.11**	.22	.07	.80	3.35***	.25	.13	.16	1.97*				
Trust in services																
Trust in health care	1.00		.88		1.00		.93		1.00		.88					
Trust in social work	.59	.11	.55	5.41***	.67	.15	.62	6.67***	.81	.28	.66	2.88**				

Table 2
(continued)

	Russian			Somali			Kurdish								
	Unstd	β	StdE	Unstd	β	StdE	Unstd	β	StdE	Unstd	β	StdE	t	t	t
Trust in people	.17		.09	1.86+	.13	.13	.08	1.10	.13	.16	.13	.16	2.41*		
Mental health															
Depressive and anxiety symptoms	1.00		.87	1.00		.10				1.00		.94			
Somatization symptoms	.98		.07	15.08***	.83	.27	.57	3.06**	.06	.81	.06	.81	16.13***		
Life satisfaction	1.15		.09	13.59***	.40	.16	.23	2.57**	.07	.58	.07	.58	12.61***		

+ $p < .10$

* $p < .05$

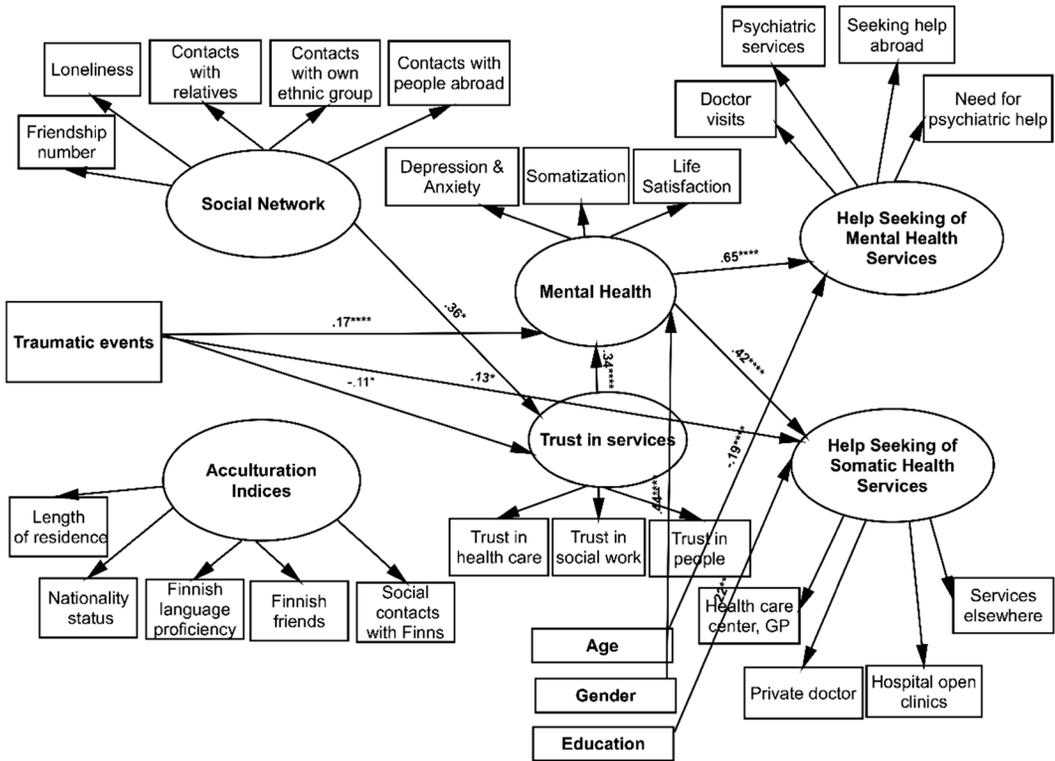
** $p < .01$

*** $p < .001$

^aAbsence of unstandardized β , StdE (standard error), and t values refer to parameters fixed to 1 in the measurement model

Figure 2

Results of the help-seeking model of psychosocial factors in the Russian immigrant group (structural equation model). Notes. Non-significant paths, error terms, and correlated errors are not shown for clarity reasons. Path coefficients represent standardized β values. For a description of manifest variables and fixed estimates, see Table 2. * $p > .05$; ** $p < .01$, *** $p < .001$, **** $p < .0001$; $N = 545$



problematic in Russian and Somali groups. However, the construct was kept in the SEM analyses because the use of mental health services did not suffice alone as an outcome construct.

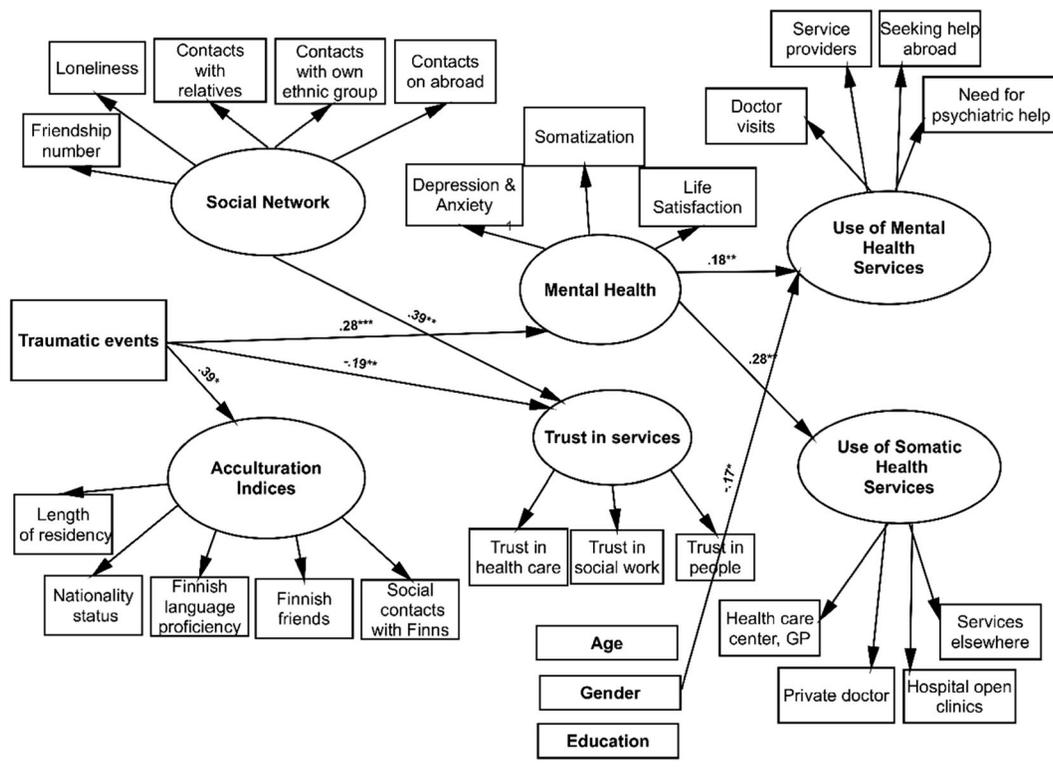
Factors related to help-seeking in three ethnic groups

The multigroup SEM analysis testing the model similarity of Russian, Somali, and Kurdish immigrants did not reach sufficient fit indices (CFI = .79, TLI = .73), although RMSEA was adequate in the three ethnic groups (.040, 95% CI (.038–.041)). This means that the model of psychosocial factors on help-seeking differs between groups, and thus, the separate models are reported accordingly.

Figure 2 presents the SEM model among Russian immigrants. It explained 23% of help-seeking for mental health services and 66% for somatic healthcare services. The model showed good fit ($\chi^2/df = 1.99$; CFI = .90, TLI = .90, RMSEA = .045 (90% CI .040–.049)), although significant χ^2 indicated misfit (data ($\chi^2 (335) = 698.11, p < .0001$)). Results showed, first, that traumatic events were directly associated with help-seeking, as Russian immigrants with high exposure to traumatic events were seeking more help from somatic healthcare ($\beta = .13, CR = 1.89, p < .05$) than those that were less exposed. Second, traumatic events were associated with seeking both mental health and somatic healthcare services (a) through mental health problems and (b) through a link between trust

Figure 3

Results of the help-seeking model of psychosocial factors in the Somali immigrant group (structural equation model). Notes. Non-significant paths, error terms, and correlated errors are not shown for clarity reasons. Path coefficients represent standardized β values. For a description of manifest variables and fixed estimates, see Table 2. * $p > .05$; ** $p < .01$, *** $p < .001$, **** $p < .0001$; $N = 351$

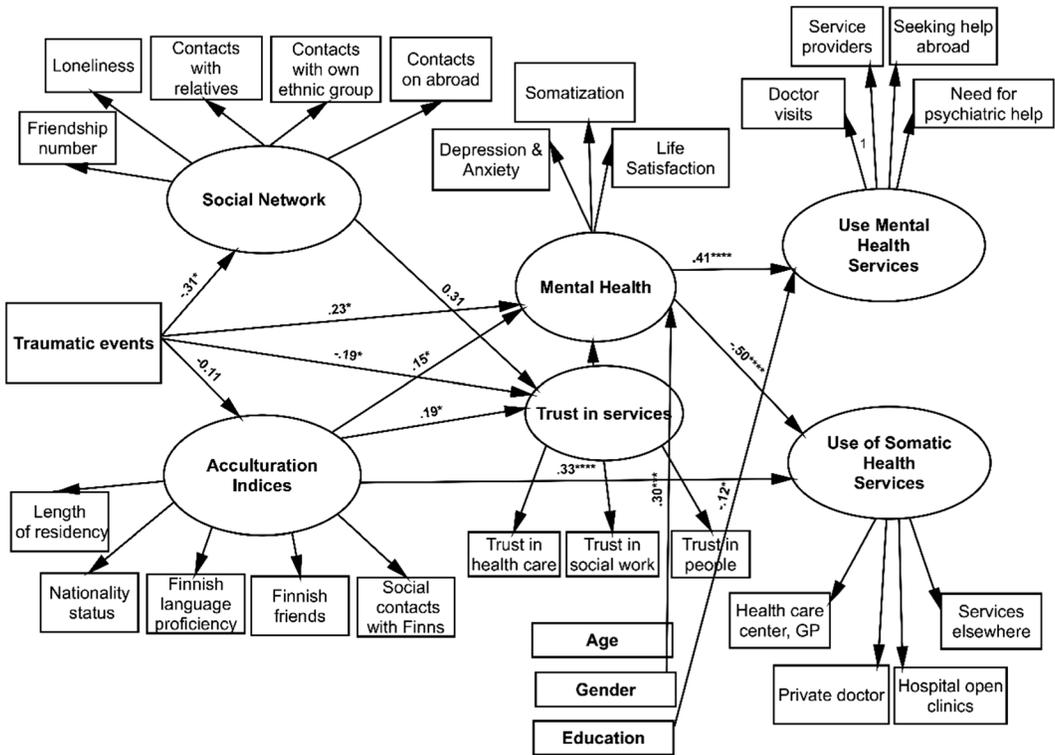


in services and mental health problems. Traumatic events were associated with a high level of mental health problems ($\beta = .17$, $CR = 3.77$, $p < .0001$) that, in turn, was associated with a high level of seeking mental health ($\beta = .42$, $CR = 6.53$, $p < .0001$) and somatic health ($\beta = .65$, $CR = 6.41$, $p < .0001$) services. Also, traumatic events were associated with low trust in services ($\beta = -.11$, $CR = -2.22$, $p < .03$) that further associated with a high level of mental health problems ($\beta = .34$, $CR = 6.39$, $p < .0001$). A larger social network was associated with higher trust in services ($\beta = .36$, $CR = 3.39$, $p < .02$) and then through mental health to help-seeking behavior. Of the various background variables, women showed a higher level of mental health problems ($\beta = .44$, $CR = 5.72$, $p < .0001$); younger age was associated with a higher level of seeking mental health services ($\beta = -.19$, $CR = -4.24$, $p < .0001$); and lower education was linked to a higher level of seeking somatic healthcare services ($\beta = .22$, $CR = -3.04$, $p < .01$) among Russian immigrants.

Figure 3 presents the SEM model among Somali immigrants. It explained 6% of help-seeking for mental health services and 29% for somatic healthcare services. The model showed insufficient fit indices ($\chi^2(331) = 782.17$, $p < .0001$; $\chi^2/df = 2.36$; CFI = .89, TLI = .89, except RMSEA = .062 (90% CI .057-.068)). Therefore, results must be interpreted with caution. Exposure to traumatic events was associated with both seeking mental and somatic healthcare services only indirectly,

Figure 4

Results of the help-seeking model of psychosocial factors in the Kurdish immigrant group (structural equation model). Notes. Non-significant paths, error terms, and correlated errors are not shown for clarity reasons. Path coefficients represent standardized β values. For a description of manifest variables and fixed estimates, see Table 2. * $p > .05$; ** $p < .01$, *** $p < .001$, **** $p < .0001$; $N = 508$



mediated through increased mental health problems ($\beta = .28$, $CR = 4.90$, $p < .001$). High level of traumatic events was associated with higher acculturation ($\beta = .39$, $CR = 2.31$, $p < .02$), but that was not further associated with seeking help either in mental or somatic healthcare services. Low levels of traumatic events ($\beta = -.19$, $CR = 2.70$, $p < .01$) and high levels of social networks ($\beta = .39$, $CR = 2.46$, $p < .01$) were associated with higher trust in healthcare ($\beta = .39$, $CR = 2.46$, $p < .01$), but it did not further contribute to help-seeking behavior. Among the background variables, gender was found to be most significant, as Somali men used more mental health services than women ($-.17$, $CR = -3.68$, $p < .05$).

Figure 4 presents the help-seeking SEM model among Kurdish immigrants, explaining 19% of seeking mental health services and 55% of seeking somatic healthcare. The model showed good fit indices ($\chi^2(326) = 653.21$, $p < .0001$; $\chi^2/df = 2.00$; $CFI = .91$, $TLI = .91$, $RMSEA = .047$ (90% CI .043–.052)), although χ^2 was again significant ($p < .0001$). Results show multiple mediating paths between traumatic events and help-seeking behavior. First, high level of exposure to traumatic events was associated with a smaller social network ($\beta = -.31$, $CR = -2.24$, $p < .02$) that, in turn, was associated with low trust in provided services ($\beta = .31$, $CR = 2.24$, $p < .02$). It further contributed to increased mental health problems ($\beta = .28$, $CR = 4.58$, $p < .0001$) and was associated

with a high level of seeking mental health services ($\beta = .41$, $CR = 5.91$, $p < .0001$), but lower level of seeking somatic healthcare services ($\beta = -.50$, $CR = -4.43$, $p < .0001$). Moreover, high level of traumatic events was associated with low level of acculturation ($\beta = -.11$, $CR = -2.44$, $p < .02$), which was directly associated with high level of seeking somatic healthcare services ($\beta = .33$, $CR = 3.38$, $p < .0001$). Low acculturation was also associated with high level of mental health problems ($\beta = .15$, $CR = 2.75$, $p < .006$). Interestingly, high exposure to traumatic events, a small social network, and low acculturation were all associated with mistrust in health services that resulted in further associations with help-seeking through increased mental health symptoms. Age and gender were two of the background variables that were also associated with help-seeking: younger Kurdish immigrants were seeking more mental health services ($\beta = -.12$, $CR = -2.34$, $p < .03$), and women suffered more mental health problems ($\beta = .30$, $CR = 3.23$, $p < .001$).

Discussion

The study modeled the roles of trauma, social network, acculturation, trust, and mental distress in health help-seeking in three culturally different immigrant groups settled in Finland. Results showed first that the model could explain help-seeking of both mental and somatic healthcare services, but percentages of explained variances differed between groups. The model explained a greater share of seeking mental healthcare services in Russian and Kurdish immigrants, while it better explained seeking somatic healthcare services among Somalis. It is noteworthy that Russian, Somali, and Kurdish groups showed both similarities and profound variations in psychosocial factors contributing to their help-seeking behavior. The differences were especially evident in the role of social networks and acculturation in modeling their help-seeking behavior.

Limitations

The study has limitations despite its strengths related to the large and representative immigrant sample and face-to-face interview settings. These limitations relate to the one-source reporting, use of a cross-sectional design for SEM modeling, and the failure to conceptualize help-seeking as a process model. The self-report nature of the data may have caused biases concerning mental health symptoms and traumatic events. It would have been optimal to use clinical psychiatric interviews to measure the severity of depressive, anxiety, and somatization symptoms. The retrospective nature of recounting traumatic experiences related to war and violence is open to criticism. In particular, the finding concerning the Somali help-seeking model should be interpreted cautiously for two reasons: their use of mental health services was very low, and thus, the variation in the outcome variable was narrow. Also, the model fit of help-seeking behavior was not as good in the Somali group as in the Russian and Kurdish groups. The applied model of past trauma and psychosocial factors associating with help-seeking behavior is a process model. A prospective study to follow immigrants from arrival to later residency would be ideal to replicate the findings of the present study.

Cultural similarities in help-seeking

In all ethnic groups, severe past traumatic events increased mental health problems, which, in turn, were associated with higher use of mental health services. This finding concurs with research on mental health and service use among refugees and torture survivors, indicating that past losses, trauma, and insecurity form a severe risk for anxiety and depression.⁵²⁻⁵³ Yet, this study's findings do not support the idea of low use of mental healthcare services despite severe mental health problems among refugees and migrants, which is called the service usage gap.¹⁰⁻¹³

Trust in services was important for all ethnic groups, as a high level of past traumatic events and a low level of social networks were associated with mistrust in Finnish social and medical care providers. Among Russians and Kurds, this mistrust was further associated with poor mental health, which resulted in an increased need to seek mental health services. The finding of trauma-related mistrust accords with observations among torture survivors who can find it difficult to trust in others' benevolence and feel easily threatened, ignored, and betrayed.⁵³ Long asylum-seeking procedures with repeated interrogations can also reinforce mistrust in professionals in the new host country. Among Russian immigrants, the crucial role of trust versus mistrust in services may have its roots in the practices of the Soviet Union, where mental health services were used as a tool of political oppression.⁵⁴ Researchers argue that the Soviet history of misuse of mental health institutes still fuels avoidance and distrust of services.⁵⁵

Further, the results emphasize the complex influence of social bonds on an individuals' help-seeking. In Russian and Kurdish immigrants, the models confirmed the benefits of an active social network on mental health, but only through increased trust in service providers. Research among immigrants from interdependent cultures reinforces the positive influence of engagement with friends and relatives of one's own ethnic background. However, in some cultural groups, an active network may hinder or replace the use of host country's mental health services.³³ According to the findings of the present study, the intensity of social network was not directly associated with help-seeking, but in all cultural groups, there was a positive association between wide social networks and trust in the host country's service providers. Interestingly, the measurement models revealed that the social network concept significantly involved relatives and members of one's own ethnic group, while Finnish contacts conceptually indicated acculturation. Thus, it is possible that keeping close ties with one's ethnic group may not necessarily oppose adaptation and familiarization to the majority culture.

The present findings emphasize that interdependent cultures do not constitute a homogeneous entity, but show notable and unique dynamics in relation to help-seeking behavior. Further, different culturally salient dynamics may underlie the similar associations found in the Russian, Somali, and Kurdish models (e.g., reasons and motivations for trust or mistrust in health providers).

Unique cultural contributions to help-seeking

The results suggest distinctive paths of help-seeking among Russian, Somali, and Kurdish immigrants. There are no studies testing a similar multilevel help-seeking model among Finns, and therefore, possible differences between the present findings concerning immigrants and the native Finnish population are not known. The proposed model of direct and mediated influences on help-seeking was most accurately realized in the Kurdish group: all hypothesized psychosocial factors contributed significantly to help-seeking for both mental and somatic healthcare services.

Research among immigrants has generally suggested that acculturation and adaptation to a new culture increases trust in services and subsequent use of them.²⁵ The findings of this study would specify that this does not necessarily hold true in all groups. Interestingly, trust was only facilitated among Kurds reporting high acculturation, such as those having Finnish friends and a good command of Finnish language, and this trust was associated with good mental health. In contrast, acculturation played no significant role in the help-seeking of Russians and Somalis. Among Somalis, this result may derive from the fact that the extended family traditionally constitutes the primary helper in times of trouble and need, which makes acculturation indices (especially in personal matters) less relevant.²² Russians, on the other hand, are the least distant from Finns in regard to culture, as they originate from a border country and share a history with Finland. As a result, this may reduce the significance of acculturation for help-seeking among Russian immigrants.

Severe exposure to trauma was linked to level of acculturation among Kurds and Somalis. In the Kurdish group, traumatic events were associated with lower acculturation and a smaller social network, apparently indicating alienation and isolation in the new host country. The result may shed light on the difficulties in sharing traumatic experiences with others, as well as unresolved conflicts both in personal and political levels, which may hinder an acculturation process. In Somalis, the association between traumatic events and higher acculturation apparently reflects longer actual residency and motivation to stay in Finland due to the unresolved military conflict in Somalia.

In Russian immigrants, past trauma led directly to somatic help-seeking, and the direct association between trauma and seeking somatic health services may derive from actual somatic problems or a stronger belief in general medicine, which is culturally more familiar. However, symptoms of distress led immigrants to seek both mental and somatic health services. Importantly, in both Russian and Kurdish groups, extensive social networks were associated with more trust in healthcare services, which was consequently associated with good mental health.

Also in the model of Somali help-seeking, a large social network was related to a high level of trust in Finnish services. However, the social network did not influence seeking professional healthcare services among Somali immigrants, and in opposition to Kurds and Russians, the level of trust in services was not significantly associated with good mental health. This distinct result seems to pinpoint particulars of Somali traditional culture: help-seeking behavior is influenced by traditional illness attributions, and help is asked first from religious healers, while seeking help at a formal health facility is rare and often a last resort.^{22,55} The use of mental health services is very low, similar to other studies, and may be initiated only on recommendation by social or general healthcare services.²¹

The role of age, gender, and education differed across groups. Kurdish women suffered more from mental health problems, and younger immigrants, who adapt faster to a new culture, used more mental health services. Higher education only led to higher use of mental health services among Russians, concurring with earlier studies.⁴⁰ Somalis and Kurds are both considered patriarchal interdependent cultures, but gender influenced help-seeking differently for both groups. Somali men sought more mental health services, in accordance with earlier research, while no gender differences were found in the Kurdish or Russian groups.²⁴ The different dynamics of health help-seeking behavior in the three cultural groups are striking and should be noticed in the development of services.

Implications for Behavioral Health

The present study contributes to a more nuanced understanding of the health help-seeking behavior of immigrants. The findings emphasize the role of cultural differences in factors explaining the use of healthcare services, which have several implications for behavioral health. The results highlight the major role of trust as a facilitator in immigrant's help-seeking from professional health service providers, and should be given due consideration in service design and development. Exposure to traumatizing events, which in fact remain often non-narrated in healthcare appointments, was associated with difficulties in the building of trust in service providers. Research has also identified insufficient time in the patient-healthcare provider interaction as a major hindrance for immigrants accessing professional mental health services, which impairs the building of trust.⁵⁶ Particularly for the current trend in developing telehealth and telemental health services, the results of this study can act as a useful reminder of the necessity to emphasize trust-building in service structures.

If health service barriers persist, immigrants suffering from medical or mental health conditions may use inappropriate methods to deal with the painful situation. Alcohol and drug abuse are known ways of self-medication but produce greater, more significant health problems over time.

While culture influences patterns of alcohol and drug abuse among immigrants, traumatic stress experiences increase the risk of intake, especially in men.⁵⁷

The current research further identifies the importance social bonds and their complexity. One's own ethnic community can ease help-seeking from professional health services in the host country, but in some cultures, they make it more difficult. Therefore, it is necessary to focus on the need for more individualized care in the implementation of behavioral health services for immigrants.

Compliance with Ethical Standards

Conflict of Interest The authors declare that they have no conflict of interest.

References

1. Ngui EM, Khasakhala L, Ndeti D, et al. Mental disorders, health inequalities, and ethics: a global perspective. *International Review of Psychiatry*. 2010;22(3):235–244.
2. Andersen RM. Revisiting the behavioral model and access to medical care: does it matter? *Journal of Health and Social Behavior*. 1995;36(1):1–10.
3. Cramer K. Psychological antecedents to help-seeking behavior: a reanalysis using path modeling structures. *Journal of Counseling Psychology*. 1999;46(3):381–387.
4. Choi S, Davis C, Cummings S, et al. Understanding service needs and service utilization among older Kurdish refugees and immigrants in the USA. *International Social Work*. 2015;58(1):63–74.
5. Liao HY, Rounds J, Klein A. A test of Cramer's (1999) help-seeking model and acculturation effects with Asian/Asian American college students. *Journal of Counseling Psychology*. 2005;52(3):400–411.
6. Bhui K, Abdi A, Abdi M, et al. Traumatic events, migration characteristics, and psychiatric symptoms among Somali refugees—preliminary communication. *Social Psychiatry and Psychiatric Epidemiology*. 2003;38(1):35–43.
7. Lindert J, Ehrenstein OS, Priebe S, et al. Depression and anxiety in labor migrants and refugees—a systematic review and meta-analysis. *Social Science and Medicine*. 2009;69(2):246–257.
8. Aragona M, Pucci D, Mazzetti M, et al. Post-migration living difficulties as a significant risk factor for PTSD in immigrants: a primary care study. *Italian Journal of Public Health*. 2012;9(3):7525-1-7525-8.
9. Matheson K, Jordan S, Anisman H. Relations between trauma experiences and psychological, physical, and neuroendocrine functioning among Somali refugees: mediating role of coping with acculturation stressors. *Journal of Immigration and Minority Health*. 2008;10(4):291–304.
10. Slewa-Younan S, Mond JM, Bussion E, et al. Psychological trauma and help-seeking behavior amongst resettled Iraqi refugees attending English tuition classes in Australia. *International Journal of Mental Health Systems*. 2015;9:5.
11. Elsouhag D, Armetz B, Jamil H, et al. Factors associated with healthcare utilization among Arab immigrants and Iraqi refugees. *Journal of Immigrant and Minority Health*. 2015;17(5):1305–1312.
12. Weine SM, Razzano L, Brkic N, et al. Profiling the trauma-related symptoms of Bosnian refugees who have not sought mental health services. *Journal of Nervous and Mental Diseases*. 2000;188(7):416–421.
13. McCrone P, Bhui K, Craig T, et al. Mental health needs, service use, and costs among Somali refugees in the UK. *Acta Psychiatrica Scandinavica* 2005;111(5):351–357.
14. Rask S, Suvisaari J, Koskinen S, et al. The ethnic gap in mental health: a population-based study of Russian, Somali, and Kurdish origin migrants in Finland. *Scandinavian Journal of Public Health*. 2015;44(3):281–290.
15. Orjiako O, So D. The role of acculturative stress factors on mental health and help-seeking behavior of Sub-Saharan African immigrants. *International Journal of Culture and Mental Health*. 2013;7(3):315–325.
16. Mirsky J. Mental health implications of migration: a review of mental health community studies on Russian-speaking immigrants in Israel. *Social Psychiatry and Psychiatric Epidemiology*. 2009;44(3):179–187.
17. Blomstedt Y, Johansson SE, Sundquist J. Mental health of immigrants from the former Soviet bloc: a future problem for primary healthcare in the enlarged European Union? A cross-sectional study. *BMC Public Health*. 2007;7:27.
18. Aroian KJ, Vander Wal JS. Health service use in russian immigrant and nonimmigrant older persons. *Family and Community Health*. 2007;30(3):213–223.
19. Close C, Kouvonon A, Bosqui T, et al. The mental health and wellbeing of first generation migrants: a systematic-narrative review of reviews. *Globalization and Health*. 2016;12(1):47.
20. WonPat-Borja AJ, Yang LH, Link BG, et al. Eugenics, genetics, and mental illness stigma in Chinese Americans. *Social Psychiatry and Psychiatric Epidemiology*. 2012; 47(1):145–156.
21. Guerin B, Guerin P, Diiriye RO, et al. Somali conceptions and expectations concerning mental health: some guidelines for mental health professionals. *New Zealand Journal of Psychology*. 2004;33(2):59–67.

22. Koehn P, Tiilikainen M. Migration and transnational healthcare: connecting Finland and Somaliland. *Siirtolaisuus-Migration*. 2007;1:2–9.
23. Ma-Kellams C. Cross-cultural differences in Somatic awareness and interoceptive accuracy: a review of the literature and directions for future research. *Frontiers in Psychology*. 2014;5:1379.
24. Mölsä ME, Hjelde K, Tiilikainen M. Changing conceptions of mental distress among Somalis in Finland. *Transcultural Psychiatry*. 2010;47(2):276–300.
25. Moreno O, Cardemil E. Religiosity and mental health services: an exploratory study of help-seeking among Latinos. *Journal of Latino Psychology*. 2013;1(1):53–67.
26. Pawlish CL, Noor S, Brandt J. Somali immigrant women and the American health care system: discordant beliefs, divergent expectations, and silent worries. *Social Science & Medicine*. 2010;7(2):353–361.
27. Dastjerdi M, Olson K, Ogilvy L. A study of Iranian immigrants' experiences of accessing Canadian healthcare services: a grounded theory. *International Journal for Equity in Health*. 2012;11:55.
28. Miller AM, Sorokin O, Wang E, et al. Acculturation, social alienation, and depressed mood in midlife women from the former Soviet Union. *Research Nurse Health*. 2006;29(2):134–146.
29. Fassaert T, Hesselink AE, Verhoeff AP. Acculturation and use of healthcare services by Turkish and Moroccan migrants: a cross-sectional, population-based study. *BMC Public Health*. 2009;9:332.
30. Cheung BE, Chudek M, Heine SJ. Evidence for a sensitive period for acculturation: younger immigrants report acculturating at a faster rate. *Psychological Sciences*. 2011;22(2):147–152.
31. Abraido-Lanza AF, Armbrister AN, Florez KR, et al. Toward a theory-driven model of acculturation in public health research. *American Journal Public Health*. 2006;96(8):1342–1346.
32. Testa N, Nelson TH. Russia. In: S Loue, M Sajatovic (Eds). *Encyclopedia of immigrant health*. New York: Springer, 2012, pp. 1307–1311.
33. Abe-Kim J, Takeuchi D, Hwang WC. Predictors of help-seeking for emotional distress among Chinese Americans: family matters. *Journal of Consulting and Clinical Psychology*. 2002;70(5):1186–1190.
34. Kuo BCH, Roldan-Bau A, Lowinger R. Psychological help-seeking among Latin-American immigrants in Canada: testing a culturally-expanded model of the theory of reasoned action using path analysis. *International Journal for the Advancement of Counselling*. 2015;37(2):179–197.
35. Shpilko I. Russian–American healthcare: bridging the communication gap between physicians and patients. *Patient Education & Counseling*. 2006;64(1–3):331–341.
36. Piwoarczyk L, Bishop H, Yusuf A, et al. Congo and Somali beliefs about mental health services. *Journal of Nervous and Mental Diseases*. 2014;202(3):209–216.
37. Taloyan M, Saleh-Stattin N, Johansson LM, et al. Acculturation strategies in migration stress among Kurdish men in Sweden: a narrative approach. *American Journal of Men's Health*. 2011;5(3):198–207.
38. Bergmark R, Barr D, Garcia R. Mexican immigrants in the U.S. living far from the border may return to Mexico for health services. *Journal of Immigrant and Minority Health*. 2010;12(4):610–614.
39. Tudiver F, Talbot Y. Why don't men seek help? Family physicians' perspectives on help-seeking behavior in men. *Journal of Family Practice*. 1999;48(1):47–52.
40. Masuda A, Suzumura K, Beauchamp KL, et al. United States and Japanese college students' attitudes toward seeking professional psychological help. *International Journal of Psychology*. 2005;40(5):303–313.
41. European Commission: Directorate-General for Employment, Social Affairs, and Equal Opportunities. *Access to healthcare and long-term care: equal for women and men? Final synthesis report*. Luxembourg: Publications Office of the European Union, 2009.
42. Berchet C, Jusot F. Immigrants' health status and use of healthcare services: a review of French research. *Issues in Health Economics*. 2012;172.
43. Knipscheer JW, Drogendijk AN, Gülsen CH, et al. Differences and similarities in posttraumatic stress between economic migrants and forced migrants: acculturation and mental health within a Turkish and a Kurdish sample. *International Journal of Clinical and Health Psychology*. 2009;9(3):373–391.
44. Varnum MEW, Grossman I, Kitayama S, et al. The origin of cultural differences in cognition: evidence for the social orientation hypothesis. *Current Directions in Psychological Science*. 2010;19(1):9–13.
45. Castaneda AE, Rask S, Koponen P, et al. Migrant health and wellbeing. A study on persons of Russian, Somali, and Kurdish origin in Finland. Helsinki, FI: National Institute for Health and Welfare, 2012.
46. Robins JM, Rotnizky A, Zhao LP. Estimation of regression coefficients when some regressors are not always observed. *Journal of the American Statistical Association*. 1994;89(427):846–866.
47. Derogatis LR, Lipman RS, Rickels K, et al. The Hopkins Symptom Checklist (HSCL): a self-report symptom inventory. *Behavioral Sciences*. 1974;19(1):1–15.
48. Tinghög P, Carstensen J. Cross-Cultural Equivalence of HSCL-25 and WHO (ten) Wellbeing Index: findings from a population-based survey of immigrants and non-immigrants in Sweden. *Community Mental Health Journal*. 2010;46(1):65–76.
49. Derogatis LR, Lipman RS, Covi L. SCL-90: an outpatient psychiatric rating scale—preliminary report. *Psychopharmacology Bulletin*. 1973;9(1):13–28.
50. Hu L, Bentler PM. Cutoff criteria for fit indices in covariance structure analysis: conventional criteria versus new alternatives. *Structural Equation Modeling*. 1999;6(1):1–55.
51. Yuan KH, Hayashi K, Bentler PM. Normal theory likelihood ratio statistic for mean and covariance structure analysis under alternative hypotheses. *Journal of Multivariate Analysis*. 2007;98(6):1262–1282.
52. Lamkaddem M, Stronks K, Devillé WD, et al. Course of post-traumatic stress disorder and healthcare utilisation among resettled refugees in the Netherlands. *BMC Psychiatry*. 2014;14:90.
53. Schubert CC, Punamäki RL. Torture and PTSD: prevalence, sequelae, protective factors, and therapy. In: CR Martin, VR Preedy, VB Patel (Eds). *Comprehensive guide to post-traumatic stress disorder*. New York: Springer, 2015, pp. 1–26.
54. Jenkins R, Lancashire S, McDavid D, et al. Mental health reform in the Russian Federation: an integrated approach to achieve social inclusion and recovery. *Bulletin of the World Health Organization*. 2007;85(11):858–866.

55. Kuitinen S, Punamäki RL, Mölsä M, et al. Depressive symptoms and their psychosocial correlates among older Somali refugees and native Finns. *Journal of Cross-Cultural Psychology*. 2014;45(9):1434–1452.
56. Pahwa P, Karunanayake CP, McCrosky J, et al. Longitudinal trends in mental health among ethnic groups in Canada. *Chronic Diseases and Injuries in Canada*. 2012;32(3):164–176.
57. Szafarski M, Cubbins LA, Ying J. Epidemiology of alcohol abuse among US immigrant populations. *Journal of Immigrant and Minority Health*. 2011;13(4):647–658.