Chapter 8

Results: Quantitative Study

The purpose of statistics is not to prove, but to improve—the purpose of statistics is not to resolve but to revolve.

Abstract Results of quantitative study obtained across the six European countries suggest that being an unauthorized migrant predict mental health difficulties and PTSD. Pre-migration stress was also found to influence both PTSD and mental health difficulties but this influence was more profound on PTSD. While increase in post-migration stress predicted increase in (poor) mental health, increase in post-migration stress predicted lower PTSD levels. These directions of results were generally obtained in specific European countries patterns except in France and Italy where both migrants' status and pre-migration stress were not predictive of mental health and PTSD, respectively. In coping with stressors, results generally demonstrated that migrants utilize more of behavioral disengagements compared to other coping methods. The least used coping styles were humor, religion, and acceptance. In specific countries such as Germany, Italy, and Netherlands, migrants were found to respectively adopt more of active coping, religion and planning. Finally, it could be shown that discrepancies between migrants' value preferences and the modal value preferences in the receiving countries were a source of poor mental health.

Introduction

Before we start reporting results from the quantitative study, we would like to remind reader not to expect a full account of all data and all possible hypotheses to be tested. As said before: We are setting out to use our quantitative data to tell a story, not to report a field experiment that tests enumerated hypotheses. We also refrain from turning away readers with exuberant descriptive details of the data analyzed for this chapter. After a reasonable embargo period all data will be made open access. It

This is the dedication of the psychological diploma thesis (master thesis equivalent) of the second author, published as a monograph with the same publisher as this monograph in a series on Medical Informatics and Statistics (Boehnke, 1983).

Table 8.1 Average scores on core variables

Variables	Average sum score	SD	Minimum	Maximum
Pre-migration stress	25.78	14.61	0	130
Post-migration stress	53.11	21.18	0	130
PTSD	36.99	11.20	17	85
GHQ (full scale)	55.71	17.13	28	112
Somatic complaints	13.91	5.87	7	28
Anxiety/Insomnia	16.04	6.31	7	28
Social dysfunction	13.60	5.13	7	28
Depression	12.16	3.97	7	28

seems necessary, however, to briefly portrait the sample in general terms by reporting average scores on all variables included in this report of results, namely pre- and post-migration stress, PTSD, GHQ, Brief Cope, and the Schwartz Value Survey.

In purely descriptive terms Table 8.1 informs us that self-reported post-migration stress of our study participants is higher than their pre-migration stress. In absolute terms it is even more than twice as high.

Self-reported general health can be described as ‘middle of the road.’ In relative terms, our study participants report problems with anxiety/insomnia most and problems with depression least.

From a purely descriptive perspective ‘behavioral disengagement’ seems to be the most preferred coping strategy of our sample, with ‘self-blame,’ and ‘planning’ fairly distant second and third. Least preferred strategies are ‘humor,’ ‘religion’ (surprisingly to us), and ‘acceptance’ (Table 8.2).

Centered (ipsatized) means of the ten Schwartz value types suggest that self-direction values are the most preferred values, followed by security and benevolence values with hedonism and stimulation. From an impressionistic perspective it appears that self-direction value preferences are slightly higher than would be expected from a representative European sample. The same is probably true for security and power values, whereas for universalism values lower preferences than among typical Europeans were found (Table 8.3).¹

¹These comparative insights originate from a long-term cooperation of the second author with Shalom Schwartz (e.g., Schwartz & Boehnke, 2004) and continuous insight into Schwartz’s raw data. Impressions can be objectified by a thorough analysis of World Values Survey data, using the same items.

Table 8.2 Average scores on core variables

Variables	Average sum score	SD	Minimum	Maximum
<i>Brief cope^a</i>				
Self-destruction	4.45	1.82	2	8
Active coping	4.65	1.75	2	8
Denial	4.48	1.82	2	8
Substance use	4.57	1.74	2	8
Emotional support	4.52	1.79	2	8
Instrumental support	4.62	1.86	2	8
Behavioral disengagement	5.33	1.61	2	8
Venting	4.51	1.89	2	8
Positive reframing	4.55	1.86	2	8
Planning	4.78	1.87	2	8
Humor	4.37	1.84	2	8
Acceptance	4.42	1.92	2	8
Religion	4.37	1.91	2	8
Self-blame	4.79	1.87	2	8

^aIn accordance with suggestions by the author of the scale, overall scores are not reported

Table 8.3 Average scores on core variables

Variables	Average score	Rank
Universalism	3.52	5
Benevolence	3.60	3
<i>Self-transcendence</i>	3.56	2
Tradition	3.48	6
Conformity	3.56	4
Security	3.65	2
<i>Conservation</i>	3.56	1
Power	3.36	8
Achievement	3.46	7
<i>Self-enhancement</i>	3.41	4
Hedonism	3.27	10
Stimulation	3.28	9
Self-direction	3.83	1
<i>Openness</i>	3.46	3

Migrants' Status, Pre- and Post-migration Stress Impact on Mental Health and PTSD Across All EU Countries

In the subsequent sections of Chapter Eight we report a series of structural equation models that are meant to illustrate the relationship between the legal status of migrants, their pre- and post-migration stress, their mental health status (assessed via the GHQ) and their degree of PTSD. Figure 8.1 documents the standardized estimates of the model for the grand sample of all six European countries. The paths from migrants' status to mental health problems [$\beta = 0.13$] and PTSD [$\beta = 0.14$] were both statistically significant at $p < 0.01$. Specifically, being an unauthorized migrant is significantly associated with mental health difficulties and PTSD.

The paths from pre-migration stress to mental health problems [$\beta = 0.06$] and PTSD [$\beta = 0.24$] were also statistically significant at $p < 0.01$. However, the influence of pre-migration stress was found to be stronger on PTSD than on general mental health problems. This means that pre-migration stress is a 'good' predictor of PTSD, whereas general mental health problems are hardly predicted by it.

Mental health problems [$\beta = 0.66$] and PTSD [$\beta = -0.28$] were significantly predicted by post-migration stress at $p < 0.01$. Post-migration stress was positively associated mental health problems but showed a negative association with PTSD. Also, mental health problems were found to be positively associated with PTSD level ($\beta = 0.32$) at $p < 0.01$. This means that post-migration stress is not a net predictor of PTSD, it 'helps,' so-to-speak, to buffer against PTSD, but at the same time 'fires up' general mental health problems.

Plausibly, unauthorized migrants experienced pre-migration stress less frequently than authorized migrants (granting the authorization process a certain amount of rationality). Post-migration stress is higher among unauthorized migrants (once more

Fig. 8.1 Predicting mental health and PTSD across all EU countries

a plausible finding, as having to struggle with missing authorization, of course, adds to the stress experience after migration. Pre- and postmigration stress are positively, but only moderately strongly related.

In all, pre-migration stress was found to be the strongest risk factor for developing PTSD, whereas post-migration stress was predominantly a risk factor for developing general mental health problems (GHQ). Aside from these two types of stressors, the mere legal status of a migrant (unauthorized) also had a moderate negative impact on both mental health and PTSD. In total, over half of the variation in migrants’ mental health status could be explained by the three predictors included in the model, whereas some 13% of the variation in PTSD levels was explained by them.

Subsequently, we inspect findings per country in the order they were presented in Chapter Seven.

Germany

Figure 8.2 displays the standardized estimates of the model for migrants in Germany. Migrants’ status statistically predicted mental health problems [$\beta = 0.19, p < 0.01$]. Specifically, being an unauthorized migrant was associated with mental health problems. However, migrants’ status did not significantly predict PTSD level [$\beta = 0.07, p = 0.21$]. Pre-migration stress significantly predicted PTSD [$\beta = 0.15, p < 0.01$] but not mental health problems [$\beta = -0.03, p = 0.39$]. In addition, both mental health problems [$\beta = 0.57, p < 0.01$] and PTSD [$\beta = -0.29, p < 0.01$] were significantly predicted by post-migration stress. However, while mental health problems form a positive association with post-migration stress, PTSD was negatively related to post-migration stress.

Fig. 8.2 Predicting mental health and PTSD in Germany

Relationships between migrants' authorization status, pre- and post-migration stress were very similar to the relationships found in the grand sample. In essence, there are no pervasive differences between African migrants in Germany and in the grand sample. Current mental health is predicted predominantly by authorization status and post-migration stress, whereas pre-migration stress is a precursor of PTSD. With less than 10%, the percentage of explained variance in PTSD is on a slightly lower level than in the grand sample. The same applies to general mental health. In Germany, 46% of the variance in the mental health status of migrants is explained by the three predictors.

France

Figure 8.3 shows the standardized estimates of the model for migrants in France. PTSD was statistically predicted by migrants' status [$\beta = -0.15, p < 0.01$]. Specifically, being an authorized migrant was associated with PTSD level. However, migrants' status was not a significant predictor of a migrant's mental health problems [$\beta = 0.05, p = 0.06$]. Also, pre-migration stress was not predictive of mental health problems [$\beta = 0.02, p = 0.42$] and even negatively related to PTSD [$\beta = -0.12, p < 0.01$]. Post-migration stress significantly predicted mental health problems [$\beta = 0.87, p < 0.01$] and PTSD [$\beta = -0.33, p < 0.01$]. Mental health problems and PTSD were positively and negatively associated with post-migration stress, respectively.

In France, post-migration stress was found to be a stronger predictor of mental health problems compared to the grand sample model and models for other EU countries. One should note, however, that self-reported pre- and post-migration stress are much more highly correlated in France. Unlike in Germany and in the grand

Fig. 8.3 Predicting mental health and PTSD in France

sample, it is the authorized migrants who suffer more from PTSD. Pre-migration stress is *negatively* related to PTSD. It seems that in France the development of PTSD predominantly has to do with general mental health problems developed while in the receiving country: More than 80% of the variance in general mental health problems are explained by the three predictors, of them some 75% alone on the grounds of self-reported post-migration stress. On the other hand, for France only six percent of the PTSD level reported by participants can be explained in our model.

Italy

Figure 8.4 shows the standardized estimates of the model for migrants in Italy. Migrants' status significantly predicted mental health problems [$\beta = -0.11$, $p < 0.01$]. Thus, surprisingly, mental health problems were associated with being an authorized migrant. Migrants' status was not associated with PTSD level [$\beta = 0.06$, $p = 0.10$]. Pre-migration stress significantly predicted mental health problems [$\beta = 0.07$, $p = 0.016$], but *not* PTSD [$\beta = 0.02$, $p = 0.67$].

Additionally, post-migration stress significantly predicted both mental health problems [$\beta = 0.78$, $p < 0.01$] and PTSD [$\beta = -0.19$, $p < 0.01$]. As is common in all countries, the latter relationship is negative. Similar to the model obtained for France, post-migration stress was found to be a stronger predictor of mental health problems for migrants in Italy compared to the results found the grand sample.

In total, 63% of the variation in general mental health can be explained our model's three predictors, whereas only two percent of the variations in PTSD are explained.

Fig. 8.4 Predicting mental health and PTSD in Italy

Fig. 8.5 Predicting mental health and PTSD in Spain

Spain

Figure 8.5 shows the standardized estimates of the model for migrants in Spain. Similar to results found for Germany and Netherlands, migrants' status statistically predicted mental health problems [$\beta = 0.13$, $p < 0.01$] but not PTSD [$\beta = 0.09$, $p > 0.05$]. Also similar to outcomes found for Germany and Netherlands, pre-migration stress was significantly associated with PTSD [$\beta = 0.14$, $p = 0.02$] but not mental health problems [$\beta = -0.07$, $p = 0.16$]. While post migration stress was significantly predicting mental health problems [$\beta = 0.66$, $p < 0.01$], PTSD [$\beta = -0.12$, $p = 0.10$] was not significantly predicted by post-migration stress. All in all, 41% of the variation in general mental health scores, but only three percent of the variation in PTSD was predicted in our model.

Netherlands

Figure 8.6 shows the standardized estimates of the model for migrants in Netherlands. Migrants' status significantly predicted mental health problems [$\beta = 0.20$, $p < 0.01$] but not PTSD [$\beta = 0.01$, $p = 0.80$]. In particular, mental health problems were associated with being an unauthorized migrant. Pre-migration stress was significantly associated with PTSD [$\beta = 0.14$, $p < 0.01$] but not mental health problems [$\beta = -0.01$, $p = 0.84$].

In addition, mental health problems [$\beta = 0.47$, $p < 0.01$] and PTSD [$\beta = -0.23$, $p < 0.01$] were significantly predicted by post-migration stress. The lowest impact of post-migration stress on mental health problems was found in the sample of African migrants in the Netherlands. Altogether, a comparatively small proportion of the

Fig. 8.6 Predicting mental health and PTSD in the Netherlands

variability in levels of general mental health problems can be explained by our three predictors: 33%. Seven percent of the variation in the level of PTSD can be explained in our model for the Netherlands.

United Kingdom

Figure 8.7 shows the standardized estimates of the model for migrants in United Kingdom. Migrants' status statistically predicted both mental health problems [$\beta = 0.07, p < 0.05$] and PTSD [$\beta = 0.09, p = 0.03$], although at a weak level. Specifically,

Fig. 8.7 Predicting mental health and PTSD in the UK

being an unauthorized migrant was associated with mental health problems and PTSD level. Contrary to results found in several other countries, pre-migration stress was found to be a non-significant predictor for both mental health problems [$\beta = -0.01, p = 0.84$] and PTSD [$\beta = 0.03, p = 0.46$]. Whereas post-migration stress significantly predicted mental health problems [$\beta = 0.41, p < 0.01$], a significant association was not found between post-migration stress and PTSD [$\beta = -0.09, p = 0.08$]. Also contrary to outcomes in the other European countries, results showed that mental health problem was not a significant predictor of PTSD among migrants in the UK [$\beta = 0.04, p = 0.45$].

All in all, 29% of the variation in general mental health and only one percent of variation in PTSD could be explained for African migrants to the UK.

Table 8.4 presents the summary of results from structural models for the grand model and all European countries. Highest coefficients are set in bold; non-significant coefficients are reported in 'strikethrough' mode.

Table 8.4 Summary of model outcomes across and in specific European countries

	Predictors	Mental health	PTSD
		β	β
All countries	Migrants' status	0.13***/unauthorized	0.14***/unauthorized
	Pre-migration stress	0.06***	0.24***
	Post-migration stress	0.66***	-0.28***
Germany	Migrants' status	0.19**/unauthorized	0.07 ^{ns}
	Pre-migration stress	-0.03 ^{ns}	0.15**
	Post-migration stress	0.57***	-0.29***
France	Migrants' status	0.05 ^{ns}	-0.15**/authorized
	Pre-migration stress	0.02 ^{ns}	-0.12 ^{ns}
	Post-migration stress	0.87***	-0.34**
Italy	Migrants' status	-0.11**/authorized	0.06 ^{ns}
	Pre-migration stress	0.07*	0.02 ^{ns}
	Post-migration stress	0.78***	-0.19**
Netherlands	Migrants' status	0.20***/unauthorized	0.01 ^{ns}
	Pre-migration stress	-0.01 ^{ns}	0.14**
	Post-migration stress	0.47***	-0.23***
Spain	Migrants' status	0.13**/unauthorized	0.09 ^{ns}
	Pre-migration stress	-0.07 ^{ns}	0.14*
	Post-migration stress	0.66***	-0.12*
UK	Migrants' status	0.07*/unauthorized	0.09*/unauthorized
	Pre-migration stress	-0.01 ^{ns}	0.03 ^{ns}
	Post-migration stress	0.53**	-0.09 ^{ns}

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

^{ns}not significant

Fig. 8.8 Coping styles of migrants in Germany

The overall summary of Table 8.4 and Figs. 8.2, 8.3, 8.4, 8.5, 8.6, 8.7 and 8.8 suggests that whether a migrant is unauthorized or authorized has a small non-uniform impact on general mental health and PTSD. Typically, being an unauthorized migrant predicts more mental health problems and more PTSD, but not uniformly so. Concurrent mental health problems of African migrants are almost exclusively—and strongly so—predicted by *post-migration stress*, rarely by pre-migration stress. PTSD is not explained to a major degree by our three predictors. If a variable has a sizable influence on the PTSD level it is the self-reported pre-migration stress.

The rough and ready essence of our quantitative study thus is that the general mental health status of African migrants to Europe is based on how they are treated in the receiving countries, whereas whether they exhibit symptoms of PTSD predominantly has more to do with what they experienced back home and maybe, but this urgently needs further research, what they experienced during the migration sojourn itself.

Coping Styles Used by Migrants

We have already documented in Table 8.2 that in the grand sample behavioral disengagement was the most preferred coping style among African migrants and Europe, whereas humor was the least preferred one. In this section, we shed more light on country-specific results (in the previously used order of presentation). The subsequent figures report the so-called estimated marginal means² of the 14 coping styles.

²The term ‘estimated marginal means’ is used by the utilized statistics software (SPSS) in output provided for analysis of variance (ANOVA) procedures. Such means are identical with regular

Fig. 8.9 Coping styles of migrants in France

Germany. Figure 8.8 shows the coping strategies reported by African migrants in Germany. Migrants seem to use a combination of coping methods in Germany. Although *active coping* has a distinctive peak, it is also observed that migrants can use a combination of planning, positive reframing, instrumental support and behavioral disengagement. At the same time migrants are less likely to adopt denial, substance use and humor as coping strategies.

France. Figure 8.9 displays the coping strategies used by migrants in France. The coping patterns in France appears to be similar to that generally obtained in all European countries.

Migrants use more of behavioral disengagement compared to other types of coping strategies. This is followed by the use of self-blame. The least used coping methods are acceptance and humor.

Italy. Figure 8.10 documents the coping strategies used by migrants in Italy. The adoption of self-blame as coping strategy is dominant among migrants in Italy. However, migrants also make use of planning followed by the combination of behavioral disengagement, acceptance, and venting. The least used coping method is religion followed by self-distraction.

Spain. Figure 8.11 documents the coping strategies used by migrants in Spain. Compared to migrants in other countries, migrants in Spain seem not to have a dominant method of coping. Instead, they adopt a combination of coping strategies which include emotional support, substance use, behavioral disengagement,

descriptive means when—as in our case—ANOVA procedures have only one tested (independent) variable. We obtained the graphs by performing a one-way repeated-measures ANOVA with the 14 coping styles as dependent variables.

Fig. 8.10 Coping styles of migrants in Italy

Fig. 8.11 Coping styles of migrants in Spain

and denial. Similar to migrants in Italy, they least make use of religion as a coping method. Self-blame is also rare.

Netherlands. Figure 8.12 displays the coping strategies used by migrants in the Netherlands. Planning is distinct among all coping strategies utilized by migrants in the Netherlands. This is followed by the use of active coping.

Migrants may also use a combination of emotional support, instrumental support, religion and self-blame. In addition, they are less likely to turn to substance use and humor coping.

Fig. 8.12 Coping styles of migrants in The Netherlands

United Kingdom. Figure 8.13 indicate the coping mechanisms used by migrants in the UK. Similar to migrants in France, UK migrants predominantly utilize behavioral disengagement coping. This is reflected in the sharpness of the peak for this coping method compared to others. Migrants may also make use of a combination of substance use, denial and active coping. The least utilized coping method is acceptance.

The above illustrations show that behavioral disengagement appears among the most preferred coping strategy in five of the six countries (the only exception: The

Fig. 8.13 Coping styles of migrants in the UK

Table 8.5 Summary of coping styles

Country	Three most dominant coping methods and least preferred	
Grand sample	Behavioral disengagement, self-blame, planning	Humor
Germany	Active coping, planning, behavioral disengagement	Substance use
France	Behavioral disengagement, self-blame, substance use	Acceptance
Italy	Self-blame, planning, behavioral disengagement	Religion
Spain	Emotional support, substance use, behavioral disengagement	Religion
Netherlands	Planning, active coping, emotional support	Humor
United Kingdom	Behavioral disengagement, substance use, denial	Acceptance

Netherlands). This coping strategy, in everyday language, ‘moving on,’ ‘doing something else instead,’ and the like, probably is not helpful when trying ‘to arrive’ at a new destination. Two other prominent coping strategies, ‘self-blame’ and ‘substance use,’ certainly also cannot be seen as productive strategies, but they appear in the upper ranks in France, Italy, Spain, and the UK. The same is true for denial, which is in the upper ranks in the UK.

Only very few productive coping strategies appear in the upper ranks. Planning appears several times. Whether it really is a productive strategy can be discussed. Of course, planning offers the chance to ‘make it better next time,’ but it at the same time avoids solving existing problems in the given situation. It is future-oriented and does not really attend to the present stressor. Remain ‘active coping’ and seeking ‘emotional support.’ They appear in the upper ranks only in Germany and the Netherlands. Difficult to say whether this is a result of sampling peculiarities or something that reflects the cultural context (Table 8.5).

Among the least preferred coping strategies humor, acceptance, and religion play a prominent role. Not employing acceptance and religion as coping strategies clearly speaks for a certain realism among African migrants: Acceptance clearly is usually non-productive; religion may also be counterproductive in a secular context like Europe. In summary, one has to concede that non-productive coping styles largely prevail among African migrants in Europe. One can speculate that this adds to the high level of experienced post-migration stress and its strong repercussions in migrants’ mental health status. An inspection of correlations between preferred coping strategies and GHQ scores (not reported here in detail) suggests that self-blame is most strongly correlated with mental health problems, whereas seeking emotional support serves as a safeguard.

Schwartz Values

Value preferences of African migrants to Europe deserve a separate section in the overview of study results in their own right. Value preferences are often seen as

Table 8.6 Value preferences and ranks

Value type	Ipsatized mean	Standard deviation	Rank	Global rank (Schwartz & Bardi, 2001)	Continental rank for Africa (WVS)
Universalism	3.52	0.91	5	3	5
Benevolence	3.60	0.75	3	1	4
Tradition	3.48	0.90	6	9	3
Conformity	3.56	0.81	4	5	2
Security	3.65	0.76	2	4	1
Power	3.36	0.96	8	10	9
Achievement	3.46	0.88	7	6	7
Hedonism	3.27	0.96	10	7	8
Stimulation	3.28	0.83	9	8	10
Self-direction	3.83	0.91	1	2	6

being at the core of attitudes and behavior. However, in the framework of person-environment-fit theory, going back as far as Holland and Cook (1983), having value preferences that closely resemble those held by most people in one's place of residence, is also a question of mental health: People who have value preferences vastly different from the modal value preferences of people they live with, are likely to suffer from mental health disturbances in the long run.

Table 8.6 once again reports ipsatized mean scores for each of the ten Schwartz values (see already Table 8.3). As Table 8.3, the table also offers ranks of the ten values for the current sample, and—to allow a comparison—a global ranking taken from evidence published by Schwartz and Bardi (2001) as well as ranks calculated for African samples of the sixth wave of the World Values Survey.

If one utilizes rank differences of three and more as an indication that the current sample differs from reference populations, it becomes obvious that the current sample strongly differs in tradition value preferences both from what is globally common and what is common in Africa. African migrants to Europe are much more prone to exhibit high preferences of tradition values than is common around the globe. At the same time, they exhibit much lower preferences for tradition values than African stay-puts do, i.e., African migrants to Europe have much lower preferences for tradition values than Africans who are staying behind in their African home countries.

Two other discrepancies between African migrants and comparison populations become evident when looking at Table 8.6: Preferences for hedonism values (having fun in life) are much lower among African migrants to Europe than they commonly are around the globe. And—most strikingly—African migrants to Europe exhibit much higher preferences for self-direction values (thinking-up new ideas and being creative) than fellow Africans do, who stay in their home countries.

In summary, culture clashes, or low person-environment fit must predominantly be expected for the sphere of tradition values (item: “Tradition is important to this person; to follow the customs handed down by one’s religion or family.”). The likelihood is high that African migrants to Europe experience two types of stark discrepancies. Their priorities for religious values are much higher than the priorities of tradition values among the locals, but at the same time much lower than what they were used to in their countries of origin. Secondly, most likely not as problematic from a mental health standpoint, African migrants to Europe have much higher priorities of self-direction values than do compatriots in their heritage countries. Regarding self-direction, African migrants are already much closer to Europeans in their value preferences, when they reach Europe than average Africans seem to be. Lastly, African clearly do not look for fun in life when they migrate to Europe. Their preferences for hedonism values are substantially below preferences common in Europe. It is unlikely, however, that this discrepancy will create mental health problems. Discrepancies in the importance of tradition values among African migrants to Europe both in comparison to what is common in their countries of upbringing and to modal value climate in countries of destination are likely to emerge as crucial sources of mental health problems.

We proceed by taking a closer look at the importance of moderators of value preferences: Do value preferences of African migrants vary by gender, current country of residence, and age? In order to find out, we performed multivariate analyses of variance. Our dependent variables here were not the ten single values but the four higher order values (Self-Transcendence, Conservation of the Status Quo, Self-Enhancement, and Openness for Change) already addressed earlier (and in Table 8.3). MANOVA results suggested that there was no significant gender main effect, nor was there a significant age effect.³ There were, however, moderately sized differences by country of destination ($\eta^2 = 6.2\%$) and very small but significant gender X country interaction effects ($\eta^2 = 0.4\%$). Reporting more detailed results for the interaction effect seems unnecessary, because a significant univariate country x gender effect was found for Self-transcendence values only. Here women reported higher preferences in Germany, the Netherlands and the UK, whereas in Spain, Italy, and France, scores of men were higher. Variance explained by the country x gender interaction were, however, below one percent, so that reporting can concentrate on the country main effect.

One can summarize that value preferences among African migrants to Europe are different from preferences in generally held by people of the host countries and of the average African. This is in our view likely to often lead to feelings of alienation and marginalization. With regard to value preferences, African migrants are neither like their hosts nor are they like their folks at home. To what extent this leads to the experience of post-migration stress and to a bad status of their mental health. Table 8.7 offers a first inspection of our data from the grand sample. All reported

³Age was treated as a covariate.

Table 8.7 Value preferences and mental health

Value type	Correlation with post-migration stress	Correlation with GHQ
Universalism	−0.09	−0.11
Benevolence	−0.14	−0.06
Tradition	−0.10	−0.13
Conformity	−0.08	−0.09
Security	−0.15	−0.03
Power	0.23	0.24
Achievement	0.11	0.04
Hedonism	0.09	0.10
Stimulation	0.11	0.05
Self-direction	−0.04	−0.05

correlation coefficients are significant on the 5% level (except the correlation between security values and the GHQ score).

The table suggests that self enhancement values as well as hedonism and stimulation value preferences add to post-migration stress and subsequently mental health problems. More complex analyses have to be reserved for further analyses of our data that are to still be undertaken. What is clear already now is that Africans who cherish what Schwartz has recently called Personal Focus values (Power, Achievement, Stimulation, Hedonism) are prone to experience more post-migration stress and a poor mental health status than their fellow migrants who cherish other values, particularly value that are compatible with European value preferences.

Looking back at the results of the quantitative study suggests that the mental health status of African migrants in Europe is largely affected by what they experience in Europe after their arrival and not what they have experienced in their homelands. Experiencing culture shock (value discrepancies) and simultaneously using unproductive coping strategies must be seen as major sources of mental health problems among African migrants in Europe.

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