

ARTÍCULO DE INVESTIGACIÓN

RELIABILITY AND CONSTRUCT VALIDITY OF AN
INSTRUMENT THAT MEASURES THE WILLINGNESS TO
EMIGRATE

CONSTRUCTION Y VALIDACIÓN DE UN INSTRUMENTO PARA MEDIR LA VOLUNTAD
DE EMIGRAR

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Abstract

Provisions for migration underlie asymmetric relations between sending and receiving countries, such as the cases of Mexico and the United States of America, although studies focus on stigma. The objective of this study was to establish the reliability and construct validity of an instrument that measures the phenomenon. A transversal and exploratory work was carried out with a selection of 300 students, considering their affiliation to a public university in a strategic alliance with multinationals for vocational training. A structure of four factors related to risk, utility, hyperopia and identity was observed, although the design of the research limited the results to the research scenario, suggesting the extension of the work towards negative dispositions such as exclusion, discrimination and the stigma.

Keywords: *Migration, Identity, Hyperopia, Helplessness, Reliability.*

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Resumen

Las disposiciones para la migración subyacen en las relaciones asimétricas entre los países de origen y destino, como los casos de México y los Estados Unidos de América, aunque los estudios se centran en el estigma. El objetivo de este estudio fue establecer la fiabilidad y la validez de constructo de un instrumento que mide el fenómeno. Se realizó un trabajo transversal y exploratorio con una selección de 300 estudiantes, considerando su afiliación a una universidad pública en una alianza estratégica con multinacionales para la formación profesional. Se observó una estructura de cuatro factores relacionados con el riesgo, la utilidad, la hipermetropía y la identidad, aunque el diseño de la investigación limitó los resultados al escenario de la investigación, lo que sugiere la extensión del trabajo hacia disposiciones negativas como la exclusión, la discriminación y el estigma. Palabras clave: migración, identidad, hipermetropía, impotencia, confiabilidad

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Introduction

The structure of the trajectories of the dependency relationships between four factors that the literature emphasizes as preponderant in the explanation of migratory flows in general and of the intention to emigrate in particular is explored, considering that it is a cognitive phenomenon focused on making personal decisions, even when group or collective processes frame that question, being sized by factors in which unilateral choice prevails (Alberti, 2012).

Migratory flows refer to those demographic processes that derive from a late demographic transition in Central America, whose impact in the United States affects Mexico as a transition country. It is a demographic bonus exposed to assimilation, adaptation, selection and identity related to their workforce, quality of life and subjective well-being (Busso, 2016).

Identity, hyperopia, helplessness and reliability are preponderant factors in four migratory theories alluding to selection, adaptation, identity and assimilation (Carreón, Hernández, Morales, Garcia and Bustos, 2014). Identity implies a choice of belonging to a group with which the potential migrant is identified in terms of status, disposition and capacity, but such variable is associated with the perception that there are significant differences between the sending and receiving countries. It is a farsightedness that warns of the economic, social and cultural effects of emigrating to the United States of America (USA) in the community of origin but dismisses the influence of migratory flows on the economy and

culture of the host country (Ferrer, Palacio, Hoyos and Madariaga, 2014).

In this scenario of biased choice, emerges the helplessness or despair that suggest the economic, social and cultural differences between the sending and receiving countries, but is accentuated even more by the prevalence of self-help or self-support of the chosen group in the receiving country (García, 2013).

It is about the reliability towards a chosen group in which the hope of protection and quality of life is placed, which contrasts with the situation of the migrant in his community of origin (García, Carreón, Hernández, Bustos & Aguilar, 2015).

Therefore, identity or election of migratory flow propitiated with the rupture to the place of origin; hyperopia or bias of risks and benefits in the crossing and stay with respect to the community of origin; helplessness or hopelessness in the face of differences between the receiving and expelling countries; as well as the reliability or confidence in the migratory flow explain the intention to migrate (Pardo & Dávila, 2017).

However, the measurement of these four factors has been developed in parallel since the instruments that measure the variables have not been processed with the aim of establishing associative relations and observe the emergence of a common factor that the literature identifies as an intention to emigrate (Paredes, Tovar, Ospina, Tovar, Andrade, 2016).

The scales that measure identity have centered their interest in the probability of carrying out migration based on economic, political, social, cultural or en-

vironmental reasons, but without considering the bias involved in decision-making, if the recipient country is a risk-free scenario, or else, the benefits outweigh the costs (Garcia, 2017a).

In this way the internal consistency of the instruments that measure these variables oscillate between 650 and 800 obtaining a range of 300 to 600 their factorial weight for their construct validity, avoiding collinearity in associations, but reducing the explanatory power of the models that aim to explain and predict identity and hyperopia (Garcia, 2017b).

In the case of helplessness and reliability, these have been associated as two variables that belong to a continuum of affectivity or emotionality, since the decision to emigrate suggests a sentimental state of abandonment to the community of origin and expectation of failure or success with respect to the receiving community (Garcia, 2014).

The instruments have registered an internal consistency of between, 700 and, 850 being the range of, 350 a, 550 for the factorial weights of the construct validity and the correlations between, 400 and, 600 that discard the collinearity between both variables (Valdés, Quintero & García, 2017).

The objective of the present work was to establish the construct validity of an instrument that measures the dispositions to emigrate, considering the reagents extracted from the scales reported in the literature and their psychometric properties.

What is the reliability or internal consistency of the instrument, as well as the convergence of the indicators in factors or subscales and the general scale?

Null hypothesis: There will be significant differences between the psychometric properties of the instruments that make up the scale that measures the dispositions of emigrating with respect to the observed data of the present study

Method

A non-experimental study was conducted with a nonrandom selection of 300 senior high students ($M = 20.3$ $SD = 2.3$ and $M = 4'593$, 23 $SD = 234,35$ monthly household income) of a locality from the center of Mexico with low human development index.

The short version of the Disposition to Migrate Scale (DMS-16) was used, which includes four dimensions related to identity (“I would choose two or three jobs if I will travel to the US”), hyperopia (“I would work in two or three jobs if you will emigrate to the US”), Usefulness (“I would work in two or three jobs, even if the payment is minimal”), Risk (“I would request the financial support of the first job if I can have another job”). All the reagents are met with one of the options ranging from 0 = “not likely” to 5 = “quite likely”.

The surveys were carried out in the facilities of the upper secondary schools, upon notification that the results of the study would not affect their academic status or school situation, which extended a guarantee of confidentiality and anonymity.

The information was processed in the statistical analysis package for social sciences (SPSS by its acronym in English, version 24.0). The parameters of reliability, validity and adjustment were estimated in order to contrast the null hypothesis of significant differences between the trajectories of theoretical relationships with respect to the model of structural equations.

The validity refers to the collection, evaluation and synthesis of evidence to support the use of instruments for measuring constructs (Sireci y Padilla, 2014: p. 100). The validity was made following the terminology of the American Psychological Association in which the social consequences of using the instrument are highlighted (D’Este, 2012: p. 62).

Four fundamentals prevail; a) relationship between definition of the variable to be measured with respect to the use of the measuring instrument; 2) sufficiency and appropriateness of the interpretation of the measurement of the instrument with respect to the evidences that support them; c) evaluation of the effects of the use of the instrument that measures the variables and indicators; d) unified evaluation and interpretation (Padilla, Hidalgo, & Muñiz, 2006: p. 307)

Therefore, the adaptation process of the instrument included: i) the conceptual definitions of the variables; ii) data on the content of the items; ii) parameters of sphericity, adequacy, factor analysis and reliability; iii) relationship with other empirical factor structures (Sireci y Faulkner, 2014: p. 101).

Results

Table 1 shows the descriptive values that indicate the normal distribution, adequacy, sphericity and cons-

Table 1. Instrument descriptions

R	M	S	K	A	F1	F2	F3	F4
<i>r1</i>	4.0	1,2	1.4	,78	,40			
<i>r2</i>	4.1	1,3	1.9	,72	,53			
<i>r3</i>	4.3	1.4	1.0	,79	,62			
<i>r4</i>	4.4	1,8	1.6	,74	,38			
<i>r5</i>	4.7	1.9	1.4	,70		,51		
<i>r6</i>	4.2	1,5	1,3	,71		,67		
<i>r7</i>	4.5	1,2	1,8	,77		,30		
<i>r8</i>	4.0	1,3	1,9	,73		,41		
<i>r9</i>	4.4	1,7	1,7	,79			,63	
<i>r10</i>	4.5	1,9	1,6	,75			,52	
<i>r11</i>	4.6	1,0	1,5	,70			,48	
<i>r12</i>	4.1	1,3	1,8	,72			,52	
<i>r13</i>	4.3	1,6	1,9	,73				,63
<i>r14</i>	4.8	1,8	1,5	,76				,47
<i>r15</i>	4.5	1,6	1,3	,78				,52
<i>r16</i>	4.3	1,5	1,1	,74				,60

R = Reactive, M = Mean, S = Standard Deviation, K = Kurtosis, A = Cronbach's Alpha, removing the value of the item. Adequacy (KMO = ,780), Sphericity [$\chi^2 = 24.3$ (34 gl) $p < ,01$] Method: Main axes, Rotation: promax. F1 = Migratory identity (17% of the total variance explained) , F2 = Economic Hyperopia (11% of the total variance explained) , F3 = Perceived Usefulness (3% of the total variance explained) , F4 = Risk Perception (1% of the total variance explained)

Source: Prepared with the study data

The factorial structure was complemented with the estimation of the matrix of relations between the established factors that explained 32 % of the total variance explained.

The matrix of relations between the factors and the factorial structure allowed the estimation of the model of reflective trajectories of the four factors with respect to 16 indicators, as well as the theoretical emergence of a second-order factor that the literature identifies as migration intention.

tract validity of responses to reagents that converge in four factors: migratory identity, economic hypermetropia, expected hopelessness and labor reliability.

The adjustment and residual parameters suggest the non-rejection of the null hypothesis relative to the significant differences between the reflective theoretical relationships and the structural model.

Discussion

The contribution of the present work to the state of the question lies in the establishment of the reliability and validity of an instrument to demonstrate the factorial structure, the matrix of relations and the reflective

model that explain the intention of migration, but the methodological design limits the findings to the public university scenario, suggesting the extension of the study to migrant communities.

Even the percentage of total variance explained suggests the inclusion of other factors that Sanchez, Juarez, Bustos and Garcia (2018) identify as labor expectations to explain the intention to migrate.

In the present work, it has been shown that identity and hyperopia can be linked to expectations, since both variables refer to selection biases that would be associated with the sensation of waiting for a risk or a benefit.

Garcia (2018) warns that one dimension of the intention to emigrate is the entrepreneurship that characterizes those who seek improvement and tend to choose a favorable scenario for the development of their skills, knowledge and expectations.

In the present work, a relationship between reliability and identity has been established. It is an associative process between trust and the choice of an occupation that would be linked to entrepreneurship in general and expectations.

Delgado, Garcia and Mejia (2018) specified a model in which migratory flows were integrated by entrepreneurship and identity but associated with the selectivity and competitiveness that characterizes migrant intellectual capital.

In the present work it has been established that identity is a fundamental part of the intention to migrate, but the inclusion of expectations, selectivity, competitiveness and entrepreneurship would increase the percentage of total variance explained.

García (2019) established the exploration of the intentional dimensions of migration, estimating a factorial matrix that explained 32% of the total variance and observed a structural model in which four dimensions that reflect 16 indicators prevail, suggesting the extension of work and the inclusion of other factors such as expectations, entrepreneurship, selectivity and competitiveness.

In the present work we have established the four factors reported in the specialized literature and updated on the problem.

Conclusion

The objective of the present work was to establish the reliability and validity of an instrument that measures the dispositions to emigrate. considering four factors related to identity, hyperopia, utility and risk, although the design of the research limited the findings to the research scenario, suggesting the inclusion of factors related to habitus that are identified by the literature as aesthetic (*asthesis*), dimensions, ethics (*ethos*), logic (*hexis*) and expressivity (*eidosis*).

In relation to public policies, the validated instrument will allow the evaluation of the effect of micro financing on local entrepreneurship, the management of financing and the management of seed capital.

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