Sigma's VIRTUAL 31st International Nursing Research Congress (Wednesday, 22 July - Friday, 24 July)

Resilience in Latin American Adolescents: A Different Construct?

Karen Dominguez-Cancino, MPH, BSN, RN¹ Edith Choque-Medrano, BSN, RN² Hernan Hugo Matta-Solis, EdD, MD, MSc³

Patrick A. Palmieri, DHSc, EdS, PGDip(Oxon), MBA, MSN, RN, CPHQ, CPHRM, FAAN¹

- (1)Office of the Vice Chancellor for Research, Universidad Norbert Wiener, Lima, Peru (2)School of Nursing, Universidad Norbert Wiener, Lima, Peru
- (3) School of Nursing, Universidad de Ciencias y Humanidades, Lima, Peru

Purpose: The Connor–Davidson Resilience Scale (CD-RISC)© is commonly used to measure resilience. Although the scale has been used in Spanish populations, the studies generally focused on Spain and Mexico. This study analyzed the psychometric performance of the Spanish version of the CD-RISC for South America, or the Connor-Davidson Escala de Resiliencia-25SA (CD-RISC-25SA)©, in a population of adolescents in Peru. The purpose of this presentation is to discuss the practical importance of incorporating cross-cultural translation and adaptation techniques into studies using Spanish versions of English language instruments in different Spanish speaking countries.

Methods: This was a cross-sectional study with a non-probability convenience sample to evaluate the psychometric properties of the CD-RISC-25SA©. The CD-RISC-25SA© is 25-items with 5 dimensions: D1 - personal competence, high standards and tenacity; D2 - trust in one s instincts, tolerance of negative affect, and strengthening effects of stress, D3 - positive acceptance of change and secure relationships, D4 - control, and D5 - spiritual influences (Connor & Davidson, 2003). The evaluation began with face validity and concluded with confirmatory factor analysis. In addition, the English and Spanish versions of the scale were compared. The data were organized in an Excel database for analysis with the statistical program R. This study was approved by the ethics committee at the participating university.

Results: The CD-RISC-25SA© was completed by 452 adolescents. The psychometric analysis resulted in a 21-item scale with three dimensions, D1, D2, D4. Two dimensions (D3 & D5) disappeared from the instrument. In the case of D3, most items shifted to D1. Seeking to explain the observed phenomenon, items and dimensions from the new Peruvian scale were critically evaluated and compared to the original English and Spanish scales. In this regard, we observed the positive acceptance of change and the ability to construct secure relationships is specific to the personal resource necessary to live. The elimination of D5, or spirituality, was striking as Latinos usually cope through spirituality as they manage difficult situations. Latinos generally believe a superior force gives then the strength and direction to continue forward. The review of the individual dimension items; however, provided insight into the misuse of key words in Spanish to explain concepts from English. For example, the word "fate" in English was mistranslated into the word "luck" in Spanish (the incorrect word "suerte" instead of the

correct word "destino"). For Latinos, the word "destino" is associated with spirituality whereas the word "suerte" is often associated with superstition.

Conclusion: This study reports a psychometric analysis of the CD-RISC-25SA© in Peru. Although the instrument exhibited good face-validity and adequate reliability, the construct validity was inadequate. The instrument handbook indicated the CD-RISC-25SA© is valid and reliable for countries in South America; however, this might not be the case for Peru. As each Spanish speaking country has their own culturally specific adaptation of the Spanish language, adequate cross-cultural translation and adaptation techniques need to be incorporated into instrument studies to prevent errors in translation. In addition, researchers need to demonstrate acceptable instrument reliability and validity for each Spanish speaking country where the instrument is used.

Title:

Resilience in Latin American Adolescents: A Different Construct?

Keywords:

Connor-Davidson Resilience Scale, Cross cultural research and Instrument validation and reliability

Abstract Summary:

This presentation highlights the problems discovered when using the South American Spanish version of the Connor–Davidson Resilience Scale for research in Peru. The discussion focuses on incorporating the appropriate cross-cultural translation and adaptation techniques into research studies using Spanish versions of English language instruments for different Spanish speaking countries.

References:

- Bustos-Vargas M. (2013). Factores de resiliencia en adolescentes residentes en un centro de protección de Valparaíso. [Resilience factors in adolescents residing in a protection center at Valparaiso]. Revista de Psicología, 2(4), 85-108. Retrieved from http://sitios.uvm.cl/revistapsicologia/revista/04.04.resiliencia.pdf
- Cabello, H. C., Rodríguez, T. C., León, J. V., Barboza, M. P., & Valles, M. C. (2015). Análisis factorial confirmatorio de la gestión de la percepción del funcionamiento familiar de Smilkstein en adolescentes peruanos. [Confirmatory factorial analysis of the scale of perception of Smilkstein's familiar functioning in Peruvian teenagers]. Salud & Sociedad, 6(2), 140-153. https://doi.org/10.22199/S07187475.2015.0002.00003
- Connor, K. M., & Davidson, J. R. T. (2003). Development of a new resilience scale: The Connor-Davidson Resilience Scale (CD-RISC). Depression and Anxiety, 18(2), 76–82. https://doi.org/10.1002/da.10113
- García-León, M. A., González-Gómez, A., Robles-Ortega, H., Padilla, J. L., & Peralta-Ramírez, I. (2019). Psychometric properties of the Connor-Davidson Resilience Scale (CD-RISC) in the Spanish population. Anales de Psicología, 35(1), 33-40. https://doi.org/10.6018/analesps.35.1.314111

- Ponce-Cisternas, F. P. (2015). Análisis exploratorio de modelos de ecuaciones estructurales sobre la escala Connor-Davidson (CD-RISC) en Chile y España [Structural equation modeling exploratory analysis of the CD-RISC (Conner-Davidson Resilience Scale) in Chile and Spain]. Salud y Sociedad, 6(3), 238-247. https://doi.org/10.22199/S07187475.2015.0003.00004
- Rodríguez-Fernández, A., Ramos-Díaz, E., Ros, I., & Fernández-Zabala, A. (2015). Relaciones de la resiliencia con el autoconcepto y el Apoyo Social Percibido en una muestra de adolescentes [Relations of Resilience to self-concept and perceived social support in a simple of adolescents]. Acción Psicológica, 12(2), 1. https://doi.org/10.5944/ap.12.2.14903
- Waltz, C. F., Strickland, O. L., & Lenz, E. R. (2017). Measurement in nursing and health research (5th ed). New York, NY: Springer Publishing Company.

First Secondary Presenting Author

Corresponding Secondary Presenting Author

Karen Dominguez-Cancino, MPH, BSN, RN Universidad Norbert Wiener Office of the Vice Chancellor for Research Researcher and Methodolgist Lima

Author Summary: Prof. Karen Domínguez is a researcher at the Universidad Norbert Wiener and the deputy director at Evidence-Based Health Care South America: A Joanna Briggs Institute Affiliated Group. She has developed a successful line of research focused on interprofessional collaboration. With a strong background in statistics, Prof. Dominguez works as a methodological expert on multi-center research projects in South America. Prof. Dominguez has numerous publications and

Second Author

Peru

Edith Choque-Medrano, BSN, RN Universidad Norbert Wiener School of Nursing Research Assistant Lima Peru

international conference presentations.

Author Summary: Lic. Edith Choque Medrano is a research assistant and graduate student at the School of Nursing, Universidad Norbert Wiener. She is interested in community-based research to promote resilience, improve adolescent health, and integrate cultural approaches into clinical practice and policy development. Lic. Choque is developing the collaborative networks to engage in nursing research focused on impacting vulnerable populations with community-based organizations, municipal agencies, and community stakeholders.

Third Author

Hernan Hugo Matta-Solis, EdD, MD, MSc Universidad de Ciencias y Humanidades School of Nursing Professor of Nursing Research Lima Peru

Author Summary: Dr. Hernán Hugo Matta-Solis is a research professor at the Universidad de Ciencias y Humanidades and the Universidad Norbert Wiener. In addition, he teaches in the graduate program in nursing and serves as a thesis adviser. Dr. Matta is an expert in developing family programs and community health strategies to improve the health and wellness of vulnerable populations. He has extensive experience in university leadership, including schools of nursing and medicine.

Fourth Primary Presenting Author

Primary Presenting Author

Corresponding Primary Presenting Author

Patrick A. Palmieri, DHSc, EdS, PGDip(Oxon), MBA, MSN, RN, CPHQ, CPHRM, FAAN Universidad Norbert Wiener

Office of the Vice Chancellor for Research

Vice Chancellor and Margaret Jean Watson Distinguished Professor

Lima

Peru

Author Summary: Dr. Palmieri is a widely recognized health leader and nurse researcher in South America. He is the Vice Chancellor for Research at the Universidad Norbert Wiener. Also, he is a Sigma Theta Tau Fellow. Notably, he achieved the first health care facility accreditation in Peruvian history with a nursing-led quality improvement project. He works throughout South American, and lives in Bolivia and Peru with his wife and daughter.