compared to their U.S.-born Latinx counterparts and those that migrated earlier or later in life. A possible explanation for this study's unexpected findings is that the IHP is outdated due to the current sociopolitical climate immigrants experience compared to the 1980s when the theory was developed. Future studies, with larger samples, longitudinal designs, and greater sociocultural characterization (e.g., immigration reason/s, country of origin, discrimination), are needed to better understand the role of IHP in cognition.

Categories: Cross Cultural Neuropsychology/

Clinical Cultural Neuroscience

Keyword 1: HIV/AIDS

**Keyword 2:** cross-cultural issues

**Keyword 3:** neuropsychological assessment Correspondence: Denise S. Oleas, Fordham University & Icahn School of Medicine at Mount Sinai, Department of Neurology,

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## 13 Considerations for the **Neuropsychological Assessment of Verbal Abilities in Japanese Speakers**

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**Objective:** Although the majority of Japanese speakers live in Japan, there are also large populations of Japanese speakers in the United States of America and Brazil, with more than a million Japanese speakers across the two countries. Only 53% of foreign-born Japanese individuals in the United States report proficiency in English. Although there has been increasing attention to the neuropsychological assessment of linguistically diverse patients broadly in recent years, there are specific considerations unique to Japanese that clinicians and researchers should be aware of when working with Japanese speakers outside

of Japan. The aim of the present study is to present considerations and appropriately normed assessments of verbal abilities for Japanese patients.

Participants and Methods: A systematic review of cognitive screeners and assessments of verbal fluency, verbal memory, and verbal academic skills that have been translated and normed for use with Japanese speaking populations was conducted. Studies published in both English and Japanese were reviewed. Test content modifications, administration modifications, and relevant cultural and linguistic considerations were synthesized and summarized.

Results: One consideration in translation is the use of words that are linguistically and culturally comparable across the two languages. Multiple cognitive screeners and verbal learning/memory tasks have been translated with cultural equivalency considerations (e.g., for the Montreal Cognitive Assessment, velvet, church, and daisy were changed to silk, shrine, and lily). In Japanese, there is a one-to-one correspondence between sound (syllable) and graphemes (kana script), compared to one-tomany associations in alphabet-based languages like English. This impacts normative expectations on letter fluency tasks. The hiragana letters, A, Ka, and Shi (あ, か, し) are recommended because there are relatively large number of words that start with these letters and the number of words generated with these letters showed close to normal distributions in previous research. Unlike letter fluency, semantic fluency is believed to be relatively culture-free and independent of language systems. The Japanese writing system utilizes both phonographic systems where written symbols map onto sounds, and logographic systems, where written symbols map onto concepts. This is in contrast to English, which has a solely phonographic written system. These two separate writing systems complicate the assessment of reading among Japanesespeaking individuals, as there may be a dissociation between abilities in reading in the phonographic versus logographic systems. Acculturation has been shown to impact performance on certain verbal task performances, along with demographic variables such as immigration generation status and bilingualism.

Conclusions: Neuropsychologists should be familiar with linguistic differences between English and Japanese such as the one-to-one correspondence between sound and grapheme in Japanese and the use of both phonographic and logographic systems in written Japanese. Neuropsychologists should also be careful to use tests that are translated for cultural equivalence rather than direct translations, and that have been normed for use with Japanese speakers. Finally, general cross-cultural considerations in assessment such as the evaluation of bilingualism, familiarity with the testing environment, and other factors remain essential.

Categories: Cross Cultural Neuropsychology/

Clinical Cultural Neuroscience **Keyword 1:** cross-cultural issues **Keyword 2:** language: second/foreign

Keyword 3: verbal abilities

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14 A Culturally and Linguistically Informed Approach to the Development of a Cognitive Screener for Deaf Adults using American Sign Language

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Objective: When assessing individuals from diverse backgrounds, APA ethical principles emphasize the consideration of language and culture when selecting appropriate measures. Research among hearing, English-speaking individuals has shown the effects in identifying cognitive deficits when language, culture, and educational background are not considered in the selection and administration of measures (Ardilla, 2007). Among the Deaf community in the US, a minority group with a unique culture and language (American Sign Language: ASL), there have been few attempts to adapt existing English cognitive measures. Factors complicating this include research resources given the limited number of neuropsychologists and researchers who understand both the complexities of the measures as well as the linguistic and cultural factors within the Deaf population. The goal of the current project is to develop a culturally informed interpretation of a cognitive screening tool for appropriate use with older Deaf adults.

Participants and Methods: Item selection was informed by MMSE data from Dean et al. (2009) and methods utilized by Atkinson et al. (2015). Items selection occurred through consultation with three neuropsychologists and graduate peers with either native signing abilities or demonstrated ASL fluency, as well as Deaf identities, cultural affiliation and or community engagement. Selection considered the potential for translation errors, particularly related to equivalence of translation from a spoken modality to a signed. Items were categorized into the following domains: Orientation, Attention, Memory, Language, Executive Functioning, Visuospatial, and Performance Validity. Two native signers (Deaf interpreters) provided formal translation of the items. The measure was piloted with 20 deaf and hard of hearing (DHH) adult signers (ages M=41.10, SD=5.50, Range=31-48). Items were prerecorded to standardize the administration, which was shown to participants through the screenshare function of Zoom software.

**Results:** The average performance was 100.80 (SD=3.91)/ 105 possible points. Within the memory domain, some errors, especially for word selection on delayed recall, were noted which may be related to sign choice and dialect. Additionally, with culture-specific episodic memory items, participants 35% of participants were unable to provide a correct answer with qualitative responses indicating this information may be more familiar to a subset of the Deaf community that had attended Gallaudet University in Washington, D.C. There was a significant positive relationship between ASL fluency, determined by the ASL-Comprehension Test, and performance on the cognitive screener (r(18)=.54, p=.01) while age of onset of deafness (r(18)=-.16, p=.51) and age of ASL acquisition (r(18)=.21, p=.37), were not significant.

Conclusions: Results of this preliminary project yielded a measure that benefited from inclusion of content experts in the field during the process of interpretation and translation. It appears appropriate for Deaf signers who are proficient in ASL. The pattern of correlations suggests the measure may be appropriate for use with fluent signers with experience in ASL acquisition. Further development of the measure should focus on appropriate items that address the diversity of the Deaf experience as well as