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Objective: Population studies have shown that Black individuals are at higher risk for MCI and dementia than White individuals but are more likely to be underdiagnosed or misdiagnosed. Although multiple contributory factors have been identified in relation to neurocognitive diagnostic disparities among persons of color, few studies have investigated race-associated differences in MCI and dementia classification across diagnostic methods. The current study examined the agreement of cognitive classification made via semi-structured interview and neuropsychological assessment.

Participants and Methods: Only participants assigned normal cognitive status or cognitive impairment with presumed Alzheimer's etiology were included in the study. Baseline visit data in the National Alzheimer's Coordinating Center (NACC) dataset was collected to compare correspondence of cognitive classification (normal cognition, MCI, dementia) via semi-structured interview (Clinical Dementia Rating; CDR) with formal NACC diagnostic determination. NACC diagnostic determination was further separated by single clinician and consensus diagnostic methods. Inter-rater agreement was evaluated using chi-squared tests, and respective analyses were stratified for race (Black vs White), ethnicity (Hispanic vs Non-Hispanic), and education (≤ 12 years vs. > 12 years).

Results: The sample size included 4,739 Black and 26,393 White participants across 43 Alzheimer's Disease Research Centers (ADRCs). Inter-rater analyses between CDR (semi-structured interview) versus single-clinician and formal consensus NACC diagnostic methods showed strong (all $\phi > .70$) consistency in cognitive diagnoses overall, irrespective of race, ethnicity, and education. The percentage of agreement between diagnostic methods was nearly 100% for those categorized as cognitively normal or with dementia. However, the agreement for MCI was considerably lower (ranging from 28-74%) and revealed a disparity in diagnostic method between Black and White individuals. White individuals diagnosed with MCI via CDR (CDR total = 0.5) were more likely to be labeled as having dementia regardless of NACC diagnostic method. However, Black individuals diagnosed with MCI via CDR were equally likely to be diagnosed as cognitively

normal or with dementia via the formal consensus method.

Conclusions: Irrespective of race and other demographic variables, diagnostic methods had high agreement for groups labeled with normal cognition and dementia. Agreement was consistently lower for the group labeled with MCI, with Black individuals having greater variability in diagnostic differentials when diagnosed via formal consensus method. The results of the study suggest that neuropsychological assessment continues to be an integral component of diagnosing individuals with MCI, reducing possible sources of bias.

Categories: Dementia (Alzheimer's Disease)

Keyword 1: demographic effects on test performance

Keyword 2: dementia - Alzheimer's disease

Keyword 3: diversity

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36 Impact of Neuropsychological Performance and Anxiety on Meditation in Drug Resistant Epilepsy (DRE) Patients Implanted with a Responsive Neurostimulation (RNS) Device

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Objective: Responsive neurostimulation (RNS) is a surgical intervention to reduce the frequency of seizures as an adjunctive therapy for patients with drug-resistant epilepsy (DRE). Presurgical neuropsychological evaluations capture symptoms of anxiety and depression, which occur in higher rates within the epilepsy population than in the general population; however, the effects of mood are commonly overlooked or underappreciated in the conceptualization of cognitive functioning and overall quality of life. Previous studies have shown the effects of attentional control and executive functioning on engagement in meditative states. The present study examines pre and post-meditation self-reported anxiety symptoms and the electrophysiological changes captured intracranially during meditation sessions in patients implanted with an RNS

device. This study seeks to utilize presurgical neuropsychological evaluations to explore relationships between cognitive profiles and meditative state changes, and reductions in anxiety.

Participants and Methods: This study presents a series of 10 patients who underwent RNS device implantation for the treatment of DRE at Mount Sinai Hospital. All patients had at least one contact in the basolateral amygdala. Prior to surgical implantation of the RNS device, all patients completed a comprehensive neuropsychological evaluation based on the NIH Common Data Elements Battery for Epilepsy Patients. Patients in this study completed a 17- and 22-minute meditation protocol based on loving-kindness and Focal Awareness (FA) meditation. Control points and mind-wandering phases were utilized to distinguish the meditative portion of the study during intracranial recordings. All patients completed a pre- and post-meditation questionnaire adapted from the PROMIS Anxiety Short Form as well as self-ratings on meditation depth and satisfaction.

Results: Presurgical neuropsychological evaluation of patients showed elevated levels of anxiety on the BAI ($M = 18.14$, $SD = 12.03$) and depression on the BDI-II ($M = 15.57$, $SD = 6.92$). Neuropsychological findings localized to frontal or frontotemporal deficits in 80% of the patients were captured in this study. Regarding lateralization, 50% of patients presented with bilateral weakness on neuropsychological evaluation, with the rest showing unilateral profiles. A negative correlation was observed between patient responses on pre-meditation anxiety measures and self-reported depth of engagement in meditation, $r = -0.65$, $p = .043$. When all meditation sessions were evaluated, patients displayed a reduction in anxiety levels pre- and post- meditation, $t = 2.3$, $p = .03$.

Conclusions: Present findings suggest a reduction in anxiety symptoms following completion of a meditation paradigm. Additionally, a relationship between anxiety and depth of engagement in meditation was identified. During each meditation session, electrocorticography data was collected and analyzed. Given the high comorbidities of anxiety and depression as well as cognitive symptoms common for individuals with epilepsy, a systems-based approach may enhance conceptualization of neuropsychological and neuropsychiatric evaluations, which may have a significant clinical impact. Evaluation of neuropsychological profiles, meditation effects,

and anxiety in this population may support cross-discipline understanding of cognitive and psychiatric profiles to better inform treatment recommendations.

Categories: Epilepsy/Seizures

Keyword 1: epilepsy / seizure disorders

Keyword 2: neuromodulation

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37 'A Rollercoaster of Emotions': Adults' Reflections on Epilepsy in Childhood

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Objective: Epilepsy is one of the most common neurological disorders affecting young people globally. While up to 60% of seizures experienced during childhood will resolve, childhood epilepsy can give rise to long-lasting neuropsychological effects which extend far beyond those attributed to seizure activity. While these effects have been explored extensively using quantitative methodologies, little research has examined the lived experience of epilepsy in childhood. The aim of the present study was to capture adults' retrospective insights into the impact of epilepsy throughout their schooling years.

Participants and Methods: Participants consisted of Irish adults between 18 and 35 years, who had their first seizure on or before the age of 16 years. Participants were recruited from epilepsy support agencies and social media, and self-referred to the study. A bespoke semi-structured interview protocol was developed in collaboration with a patient expert which explored learning experiences, relations with peers, and participants' understanding and support of epilepsy during childhood. The methodology adopted a fully qualitative approach to reflexive thematic analysis. Therefore, patterns across the data were examined whilst taking into consideration the wider social context in which the data were generated. Latent assumptions that may have underpinned participants' experiences were prioritised and data was interpreted using pre-