the patients on age and parental level of education. Our results showed NP deficits only in the state hospitalized patients. Within-trial inhibitory processes were intact in both groups. Because the groups differed in length of illness and age of onset (p < .03), the findings suggest that severity of illness may contribute to the absence of NP effects over and above medication. Although neuroleptic medication may have a normalizing effect on sequential attentional processing in less chronic schizophrenia patients, the cognitive benefit may be limited in the more severely ill state hospital patients.

75. A PILOT TEST OF INTENSIVE COMPUTER-BASED COGNITIVE TRAINING IN SCHIZOPHRENIA

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Ten medicated subjects with schizophrenia, mean age of 36 years (range 18–64), illness severity ranging from mild to severe, and symptoms ranging from mainly positive to mainly negative or disorganized, were administered a detailed baseline clinical and neurocognitive assessment. Subjects then participated in an intensive computer-based cognitive training program (FastForward, Scientific Learning) originally designed for children with language-based learning disabilities. This program trains the spectro-temporal processing of sounds and phonemes as well as whole language sequencing and comprehension. The program continuously and incrementally adjusts the parameters requiring improved performance, while keeping tasks easy enough for patients to do well. As such this training experience requires sustained attention, auditory and verbal working memory and verbal short-term memory. Subjects trained for 100 minutes per day, 5 days per week, until training was completed (mean days of training = 50, range of 33–60). All subjects, including the most clinically impaired, were able to participate in the training program. Performance on the training exercises revealed consistent progress for all except two, who showed difficulty with the sound-based exercises. Analysis of data for the first 8 subjects shows statistically significant improvement in positive symptoms (p = .020), excited-agitated symptoms (p = .045), depressed-anxious symptoms (p = .033), and GAF (.024), as well as in neurocognitive tasks related to verbal/symbolic working memory and short-term verbal memory.

76. REACTION TIME SLOWING IN SCHIZOPHRENIA: DOMAIN-SPECIFIC FEATURES

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This study examines the relationship of lexical choice reaction time (CRT) to neurocognitive domains and symptom profiles, to address the issue of generalized cognitive inefficiency vs. domain-specific deficits. Sixty-five schizophrenic outpatients performed a lexical decision task and were assessed with a brief neuropsychological battery and an extended Positive and Negative Symptom Scale (PANSS-E). The schizophrenic group had a 25% slower CRT than a group of 20 normal controls (p < .001), and CRT was unrelated to age, illness duration or chlorpromazine equivalents, though correlated with verbal IQ and performance IQ (r = 0.29 and 0.50, respectively; p < .05 for both). CRT was correlated with positive symptoms (r = 0.38, p < .006), disorganized symptoms (r = 0.35, p = .004) and total symptoms (r = 0.27, p = .03). Among cognitive measures, CRT correlated with performance on Trails B (r = 0.41, p = .001) and visual memory span-backwards (VMS-B; r = 0.25, p = .05), but not with WCST, Stroop or sentence verification errors. To assess the contribution of non-lexical deficits, the above relationships were re-examined with partial correlations. Controlling for full-scale IQ preserved the CRT correlation with symptom scores; correlations with Trails B were reduced (r = 0.25, p = .06) and with VMS-B abolished. Controlling for fingertapping speed preserved all prior CRT correlations. Controlling for nonverbal (Ruff figural) fluency preserved the correlations with symptoms and Trails B but not with VMS-B. These findings suggest that slowing in this lexical task is related to impairments in the particular domain of attentional/working memory functions and not to a more generalized deficit. In addition, impaired semantic memory processing appears uniquely related to positive and disorganized symptoms.

77. NEUROCOGNITIVE FINDINGS IN SCHIZOPHRENIC SUBJECTS WITH ABOVE AVERAGE IQ

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Schizophrenia has been characterized as a disorder producing generalized deficits across multiple cognitive domains. We hypothesized that schizophrenic subjects with high IQ, while impaired in some domains, would show areas of preserved function. Using each WAIS-R subset and the full-scale test as sort criteria (VIQ, PIQ or FSIQ > 110) comparisons were performed between high-IQ (n = 10–18 depending on criterion) and average-IQ patients (n = 72–80), and high-IQ (n = 10–11), and average-IQ (n = 15–16) controls. Mean IQs for the groups created by these criteria were 118–120 (high) and 91–95 (low) for patients, and 120–123 and 97–101 for controls. Matching for IQ, comparison of patients to controls revealed different patterns of impairments in the high-IQ and average-IQ groups. Average-IQ patients were impaired on all tasks except Rey Copy and Recall (all criteria) and Stroop Color Naming (except PIQ). For high-IQ patients, Finger-Tapping (Dominant and Non-Dominant) and Stroop Color Naming were preserved regardless of sort criteria. However, in comparing the high-IQ groups, additional preserved functions were identified when the more specific scales were used. High- and average-IQ schizophrenic subjects performed differently from each other on Speed of Comprehension and Trails B regardless of sort method, on Rey Copy and Recall (sorted by PIQ), and on Stroop Color Naming (sorted by VIQ). These findings indicate that individuals with schizophrenia do not demonstrate generalized impairments in all cognitive domains, and that additional areas of preserved function are observed in “higher-functioning patients.”