

results, and results of cytokine-estimations in the CSF will be presented.

- [1] Müller N et al: Immunological Effects of Treatment in Schizophrenia. *Advances Biol Psychiatry* (in press).
- [2] Licinio J et al (1993) Elevated levels of Interleukin-2 in neuroleptic-free schizophrenics. *Am J Psychiatry* 150: 1408.
- [3] McAllister CG et al (1995) Increases in CSF levels of interleukin-2 in schizophrenia: effects of recurrence of psychosis and medication status. *Am J Psychiatry* 152: 1291.

### PHENOMENOLOGICAL RESEARCH IN SCHIZOPHRENIA: A RESEARCH PATHWAY FOR INTEGRATIVE CONNEXIONS INTO THE BIO-PSYCHO-SOCIAL MODEL

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Current interest for cognitive sciences can be partially explained by the multiple unknowns remaining in the study of superior cerebral functions as thought, memory, language, or consciousness. Researchers today try to find from the cognitive perspective new connections between old concepts such as imagination, perception, language or reality. Although a consensus seems clearly admitted as to the neurobiological bases of such functions no evidence may be considered as definite, while entering the XXI<sup>th</sup> century, for understanding the nature of relations between mental processes and cerebral structure. At the same time, psychiatrists, particularly in schizophrenia research, have to reconcile heterogeneous data whether neurobiological, neuropsychological, psychoanalytical or sociological. In fact, in front of the mysterious puzzle of schizophrenia they actually fail, always stumbling on an epistemologic *salto mortale*, to introduce the subject's history, including schizophrenic facticity and coping with schizophrenia, as involving the person as a whole. We aim in this paper to suggest that phenomenological research brings, even today, rigorous and pragmatical non-theoretical patterns for understanding the schizophrenic experience as an integrated totality. Firstly, we have to answer some questions about phenomenological research in schizophrenia such as: -1- Although a few pioneers such as Binswanger, Blankenburg, Jaspers, Minkovski or Wyrsh followed this line of study for 80 years, why is the impact of phenomenological research still so modest? -2- Is phenomenological criticism actually relevant to the new approaches of mental illness such as cognitivism or unlinear models of causality? -3- Does phenomenology constitute a good method for conducting empirical research and does this method today promise some new pathway for tomorrow's research? We suggest that phenomenology would still not bring an anthropological philosophy to romantic psychiatrists studying single cases, but turn to a basic narrative conception of intentionality that is today lacking in psychopathology and may allow for the integration of multiple heterogeneous factors. Following this line, the analysis of what we take for granted and usually call "stories" or "connections" seems to be the major challenge for phenomenological research tomorrow.

### THE RELATIONSHIP BETWEEN IMMUNOLOGICAL FUNCTION AND STRESS AMONG SCHIZOPHRENIC PATIENTS

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**Objectives:** We examined the immunological function in schizophrenic subjects and their relation with stress levels.

**Methods:** A cohort of 30 schizophrenics (8 women; ages 29.37 ± 3.29) suffering from an acute exacerbation of their disease were assessed by immunological parameters and level of stress. These level was measured by the Stress and Social Support Scale (California De-

partment of Mental Health) and the Wilcox Support Social Scale. Levels of ACTH and cortisol were also measured. Immunological values of schizophrenics were compared with the average of the population of Granada (t test). Association between stress levels and immunological function was examined by the Spearman Test.

**Results:** A decrease of the subpopulation of T helper cells (CD 45 R+) was found among schizophrenics. In addition, we found an increase in the proportion of IL 2 receptors and an increase in the linfocitic expression of HLA-DR. However, no significant correlation was found between stress levels and immunological function. Higher levels of social support were found among women (rs: 0.4504; p < 0.05), younger patients (rs: 0.4465; p < 0.05) and was associated with lower levels of cortisol (rs: -0.6153; p < 0.001).

**Conclusion:** In spite of a depressed immunological function found among schizophrenics in this study, results do not allow to conclude that this fact is mediated by stress levels.

### THE EFFICACY AND SAFETY PROFILE OF A NEW ANTIPSYCHOTIC, ZIPRASIDONE

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Ziprasidone is a unique molecule with a neuropharmacological profile distinct from those of standard as well as newer antipsychotics. The high 5HT<sub>2A</sub>/D<sub>2</sub> receptor affinity ratio of ziprasidone is now regarded as a strong indicator of antipsychotic efficacy with a marked reduction of extrapyramidal side-effects (EPS). In addition to efficacy in positive symptoms of schizophrenia, the receptor profile also suggests efficacy in negative symptoms and a therapeutic impact on mood and anxiety.

Ziprasidone efficacy and safety have been evaluated in Phase II studies in a range of doses in comparison with haloperidol and placebo. Results of these trials support the conclusion that ziprasidone is an effective antipsychotic drug, when tested in patients experiencing an acute exacerbation of schizophrenia or schizoaffective disorder. It is also well tolerated, with a low incidence of EPS and no significant adverse effects on laboratory safety tests or electrocardiogram parameters. These results offer hope that this new agent will prove to be a further advance in the management of schizophrenia. Further work is required to confirm these findings and to identify the optimal dose.

### CEREBRAL BLOOD FLOW VELOCITY AND PSYCHOPATHOLOGY IN SCHIZOPHRENIA: A TRANSCRANIAL DOPPLER SONOGRAPHY STUDY

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Both increases and decreases have been described in the literature for cerebral blood flow (CBF) disturbances in schizophrenia. This study intends to test the relationship between mean blood flow velocity (V<sub>mean</sub>) and psychopathology by using Transcranial Doppler Sonography (TCD) for the first time. 23 consecutive patients (11m, 12f, age 33 ± 12 y) with the diagnosis of schizophrenia (DSM-III-R, ICD-10) were assessed with PANSS (Positive and Negative Scale for Schizophrenia) and TCD first on admission after being diagnosed, and for a second time after clinical improvement. Mean blood flow velocity (V<sub>mean</sub>) and pulsatility index (PI) in medial, anterior and posterior cerebral arteries (MCA, ACA, PCA) were measured. Changes lying