Letters to the editors

Historical and clinical review about Asperger Syndrome

Dear Editor,

Subjects with Asperger syndrome (AS)[1] have qualitative impairment in the social interaction and restricted patterns of interest, although generally do not show delay in language acquisition. This set of symptoms results in significant impairment in the social functioning and occupation,[1] as recently presented in an article of RBP.

The intriguing alterations in the sociability that these subjects present have had their bases studied with methods that assess their eye-tracking under social and non-social stimuli.[2] One hypothesis that has been much studied considers that the adequate visual fixation in the interlocutor's eyes allows an inference about the mental state of the other. This capability, added to the other ones, seem to give elements to what has been called Theory of Mind –ToM.[3] This seems to be true as children with congenital cataract who undergo surgery after their first year of life have their performance impaired in the tests which measure ToM when assessed at the end of childhood.[4]

Not perceiving the mental state of the other prevents anticipating actions and reactions that are part of the building of interaction. Subjects with AS end having an impaired social performance due to such deficit in the anticipatory capability.

The social costs determined by this lack of capability are high, as those people have not their potential optimized, and many times end not achieving an independent life. Unable of generating an income, they become part of an unproductive social layer, therefore more costly for society itself. If their special needs are duly met we could have a set of subjects with AS who are capable of performing several productive functions. Currently we already have methodological resources to give to those people an education of quality, capable of meeting their specific needs and demands.

In Brazil, the ABRA (Brazilian Association on Autism) lacks data on what is being performed with these children. Although the AMA (Association of Friends of Autists) informs that the trend be the inclusion for these children, the number of children displayed by this agency is relatively small, totaling 7 children attending the regular teaching system at São Paulo. It only remains to know what is occurring with this huge set of children. Dreadfully, these children might not be identified and diagnosed, preventing the establishment of adequate interventions.

Besides, based on the current knowledge, it is understood that the simple attendance of these children to school does not meet the specific demands of each of them. For example, the lack of social capabilities presented by these children, such as naiveté, can prevent their academic performance in case they are not properly understood and cared. The impairment observed in the executive functions hampers the establishment of strategies, what may also impair their schooling. Nowadays, it is known that these difficulties can be corrected or compensated, whenever early detected.

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References

1. Klin A. Asperger syndrome: an update. Rev Bras de Psiquiatr. 2003;25(2):103-9.

2. Klin A, Jones W, Schultz R, Volkmar F, Cohen D. Defining and Quantifying the Social Phenotype in Autism. Am J Psychiatry. 2002;159:895-908.

3. Siegal M, Varley R. Neural Systems Involved in "Theory of Mind". Nature Reviews/Neurocience. 2002;3:463-71.

4. Le Grand R, Mondloch CJ, Maurer D, Brent HP. Neuroperception early visual experience and face processing. Nature. 2001;410:890.

Panic disorder and pregnancy

Dear Editor,

Some case reports suggest that pregnancy protects against panic disorder (PD) but the worsening or no change of PD during pregnancy are also reported.[1-2] We describe two PD (DSM-IV) women with severe panic attacks during pregnancy efficaciously and safely treated with a tricyclic antidepressant – nortriptyline, in the Laboratory of Panic & Respiration of the Federal University of Rio de Janeiro.

Case A:

Ms. A., Afro-Brazilian, 29 year-old. At the age of 24 year-old she started with spontaneous panic attacks. She was treated with nortriptyline (75 mg/day). After 20 months she was asymptomatic and started to decrease the dosage. She got her first pregnancy following one-year without medication. However during the fourth month of pregnancy she developed intense, almost daily panic attacks. A severe agoraphobic pattern developed and she also presented intense anticipatory anxiety disturbing her quality of life. She was initially treated with nortriptyline, 10 mg daily. After 5 weeks, at the dosage of 75 mg/day, she achieved full remission of her attacks. During the last two weeks of her pregnancy the nortriptyline was taken out. The asymptomatic period persisted after a two-year follow-up without medication.

Case B:

Ms. C., Afro-Brazilian, 29 year-old. She started to have panic attacks when she was 24 years old. She was treated with imipramine, 200 mg daily. After 6 months of treatment she was panic-attack free. During the next 12 months she was asymptomatic but still taking imipramine. During the first month of her first pregnancy she stopped imipramine but the panic attacks returned. She started cognitive behavioral psychotherapy but she had only a mild improvement. The disabling consequences of her high anxiety level and panic attacks frequency worsened her agoraphobic symptoms. Nortriptyline was started on the fourth month of her pregnancy and with 100 mg/day a complete remission was achieved. The drug was maintained during the last month of her pregnancy. She had no panic attacks after one-year follow-up with nortriptyline.

Discussion

Pregnancy may prevent panic by decreasing the reactivity of the sympathetic nervous system, by facilitating GABAergic activity through progesterone's effect on adenosine, or by diminishing arterial CO_2 plasma levels through minute ventilation.[3] Klein[4] hypothesized that the increase in progesterone associated with

pregnancy stimulates breath and lowers pCO_2; therefore pregnancy would protect patients by increasing the distance of their pCO_2 levels from panic threshold. Klein also suggested that lactation protects against PD because oxytocin may be active against anxiety. During pregnancy, nonpharmacologic strategies, such as cognitive behavioral therapy, are preferable to antipanic medications. These strategies, however, may not always suffice, and clinicians may need to use medications for pregnant women who remain severely symptomatic. Our cases suggest that some subgroups of PD women may be particularly vulnerable to persistence of symptoms during pregnancy. Tricyclic antidepressants are a reasonable choice, because the data on their use in pregnancy show they do not seem to be associated with teratogenic effects.[5]

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References

1. Northcott CJ, Stein MB. Panic disorder in pregnancy. J Clin Psychiatry. 1994;55:539-42.
2. Villeponteaux VA, Lydiard RB, Laraia MT, Stuart GW, Ballenger JC. The effects of pregnancy on preexisting panic disorder. J Clin Psychiatry. 1992;53:201-3.
3. Costei AM, Kozer E, Ho T, Ito S, Koren G. Perinatal outcome following third trimester exposure to paroxetine. Arch Pediatr Adolesc Med. 2002;156:1129-32.
4. Klein DF. False suffocation alarms, spontaneous panics, and related conditions: an integrative hypothesis. Arch Gen Psychiatry. 1993;50:306-17.
5. American Academy of Pediatrics. Use of psychoactive medication during pregnancy and possible effects on the fetus and newborn. Committee on Drugs. Pediatrics. 2000;105:880-7.

Epistemology: who needs it?

Epistemology is the discipline that studies how do we construct knowledge, or how do we know what we think we know. Recently CMAJ Editorial[1] stressed the need of using clearer theoretical frames to construct pertinent research questions, that is, how do we construct our knowledge, or what beliefs, or foundations, underlie our research. For instance, the old theory that 'breast cancer begins as a local disease and then metastasizes'[1] prevalent in our thought since the early 1990s, have mastered most of research designs until recent times. A strong consequence of this modeling was the worldwide promotion of breast self-examination as a safe method for prevention. But, all this 'knowledge' is now under challenge. The finding that early stages of breast cancer may occur with simultaneous micrometastases in the bone marrow[1] creates a conflict with the old model of thought, and the necessity of changing. Findings like the above, or other, in very different fields are striking facts for epistemological challenges. In the field of psychotherapy outcomes many authors have directed their research under the theoretical belief that psychotherapy sessions are comparable with drug treatment. Some researchers have been referring to the 'abuse of the drug metaphor'[2] as a strong bias perceived through epistemological analysis.

The use of epistemological analysis directed to the critical approach of our knowledge is a new breath for researchers. In epidemiology, authors scarcely open their time for epistemological analysis. Victora et al[3] stressed that the construction of suitable epidemiological designs require the analysis of the conceptual frameworks. A complex model – using not only statistical premises, but including also social and biological backgrounds – offers more meaningful interpretations of data. Failure to take the need of an epistemological consideration 'is common in the epidemiological literature and leads to underestimation of the effects of distal determinants'.[3]

Epistemology focuses on the degrees of certainty and probability of a certain field of knowledge, searching for validation, and logical foundation to state what we state. Epistemology has a variety of objectives: 1) to clarify the paradigm researchers use to construct observations and theories, 2) to evidence the internal and relational coherence between theories, 3) to determine the levels of assurance of constructs (the problem of certainty and belief), and 4) to design the mental activity (thinking, language, inference, use of reason, use of *a priori* and hidden prejudices) used to construct science. Epistemology may be understood as a science whose aim is the quality of knowledge.

The universal value of epistemology have been first recognized in the human sciences. The philosophical root of epistemology was probably the main factor in this pioneering performance. Nowadays, hard data researchers (such as epidemiologists) through the need of using more complex design models, matching quantitative and qualitative methods, are prone to identify the usefulness of epistemological analysis of their 'hard' data.

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References

1. Editorial. The epistemology of epidemiology. CMAJ 2002;166(2):157.
2. Stiles WB & Shapiro DA. Abuse of the drug metaphor in psychotherapy process-outcome research. Clin Psychol Rev 1989;9:521-43.
3. Victora CG, Huttly SR, Fuchs SC, Olinto MTA. The role of conceptual frameworks in epidemiological analysis: a hierarchical approach. Int J Epidemiology 1997;26:224-7.