

Intellectual Disability and Multiple Co Morbid Psychiatric Disorders in a Child: A Case Report

PRIYANKA GAUTAM¹, M.S.BHATIA², ANUBHAV RATHI³

ABSTRACT

Comorbid psychiatric Disorders are seen commonly in people with intellectual disability and in fact they are at greater risk for developing other health disorders. Most prevalent chronic health conditions in children with intellectual disability are epilepsy, cerebral palsy, anxiety disorders, sleep disorders and autism spectrum disorders. Co morbidities multiply the problem of people with intellectual impairment to a great extent and hence an accurate psychological assessment of multiple diagnoses is useful in detecting the specific underlying processes differentiating the co morbid syndrome and in planning an appropriate management and rehabilitation program. This case report is presented to emphasize the fact that though. It is common for intellectually disabled children to have other co-morbid psychiatric disorders, it is important to have accurate, suitable assessment and recording of every co-morbid disorder as it has its own implication in course and outcome of the disability in the child. A comprehensive management approach involving people from various spheres would be required to improve the quality of life and for reduction of burden of care giver. We describe a child of intellectual disability with multiple co morbidities.

CASE REPORT

A 12-year-old child, student, belonging to lower socio-economic status was brought by the mother to psychiatric outpatient department with the following 'story': History of normal vaginal delivery at home. There is antenatal history of febrile illness in mother at two months of gestation and history of adverse drug reaction in three and half months of gestation. Mother suffered from an unspecified psychotic illness from a period of three and half months of gestation till two months postpartum. At 20 d of age child was operated for trachea esophageal fistula and he had speech developmental delay. According to mother he was a difficult child to manage during infancy as he had erratic feeding, elimination, sleeping cycle. He used to cry excessively and was difficult to calm down. He was disobedient at home. He was sent to school at around five years of age and since then there were complaints that he does not sit at one place, keep disturbing other children in the classroom, hit them, steal their belongings and tease them. He would run away from school, steal money from home and keep lying, when enquired. He would frequently loose his own pencil and eraser, blurts out answers before question completes, does not wait for his turn. There is history of frequent school change because of behavioural problems. He is not able to grasp whatever is taught to him in classroom even if repeatedly taught at home and tuitions. He would not complete his homework and would often show disinterest in studies. Meanwhile mother noticed that he eats paper and often complaints of pain abdomen and bites his nails to the extent that his nail bed would often found bleeding. He would also chew tobacco occasionally. There was no history of other medical illness like seizure or any other family history of psychiatric illness.

Examination revealed a thin stature boy, normal vitals and presence of anaemia. Neurological and other system examination were normal. Mental status examination revealed an easily distractible, fidgety, hyperactive child, biting his nails and not making eye contact. He was very restless and disruptive in conversation with mother. All laboratory investigations were within normal limits except low Hemoglobin, 8.1 gm% (normal range 12-16 gm%) and low IQ, 45 (normal 70 or more). According to multi axial International Classification of Diseases [1], the patient was diagnosed as suffering from moderate mental retardation (Axis I – F 71), Iron deficiency anaemia (Axis II, D 50), Hyperkinetic conduct disorder (Axis III-

Keywords: ADHD, Intellectual disability, Nail biting, Pica

F90.1), pica (F98.3) and nail biting (F98.8). On Axis IV disability score by WHO DAS was 13 for last year and Axis V had various abnormal psychosocial situation- Z 55.3 (underachievement in school), Z81.8 (Family history of other mental and behavior mental disorders), Z 59.6 (low income) and Z72.0 (tobacco use).

Patient was given tablet Albendazole 400 mg once and started on capsule Fluoxetine 20 mg once daily along with iron supplements. School teachers and parents were involved in the management of hyperactivity with behavioral modification techniques and special education was planned. His pica behavior and nail biting started to improve gradually on subsequent follow ups. Child would appear less hyperactive and restless. Family members were involved in continuing behavioral measures in all settings and giving additional efforts and time to the child.

DISCUSSION

Comorbid psychiatric Disorders and other health conditions are seen commonly in people with intellectual disability and in fact they are at greater risk for developing other health disorders. Disruptive behaviour disorder especially attention deficit hyperactivity disorder (ADHD) appears to be the most prevalent psychiatric disorder in patients with intellectual disability [2]. A systemic review has shown that most prevalent chronic health conditions in children with intellectual disability were epilepsy (22%), cerebral palsy (19.8%) and anxiety disorders (10.1%) [3]. Significant positive associations have been noticed between sleep disorders, anxiety and challenging behaviors with intellectual disability and autism spectrum disorders [4].

ADHD as a separate diagnosis in these patients has been debated but validated now by applying Robins and Guze's criteria [5]. ADHD when present, strongly increased the impairment of social skills in people with intellectual disability and they may experience a longer and more persistent course of the disorder [6]. ADHD symptoms in such patients may be less responsive to medical treatment and experience more side effects than in patients without intellectual disability [7]. In our case, we used behaviour techniques to control ADHD.

Pica, the ingestion of non-food substances, is a dangerous behaviour as it carries risk of choking, injury, infection. Most common biological explanation of pica expresses it as occurring due to

iron and other nutritional deficiency [8]. It has also been seen that addition of vitamin and mineral supplements may affect the potency of behavioural intervention in patients with intellectual disability [9]. In the present case, the patient has low Hemoglobin, which was corrected with iron supplement.

In mild form nail biting has been compared to nervous habit as fidgeting [10] but now in fifth Diagnostic and Statistical Manual of Mental Disorders (DSM5), it is included in other specified and unspecified obsessive compulsive and related disorders [11]. Psychiatric disorders that are seen to be commonly associated with nail biting are ADHD (74.6%), Oppositional defiant disorder (36%), Separation Anxiety disorder (20.6%), Enuresis (15.6%), Tics (11.1%) [12]. The present case improved with behaviour modification along with Fluoxetine.

The history of febrile illness and adverse drug reaction in mother at two months gestation, history of unspecified psychotic illness till two months postpartum indicate some brain damage in early stages of fetal life and maternal deprivation in early neonatal period. In this case it may be the reason for co existence of varied disorders and wide psychopathology in the same individual.

Co-morbidities multiply the problem of people with intellectual impairment to a great extent and hence, an accurate psychological assessment of multiple diagnoses is useful in detecting the specific underlying processes differentiating the co morbid syndrome and in planning an appropriate management and rehabilitation program [13].

REFERENCES

- [1] World Health Organization. Division of mental health and prevalence of substance use. ICD 10 Guide for Mental Retardation: Geneva WHO. 1996.
- [2] Neece CL, Baker BL, Crnic KA, Blacher J. Examining the validity of ADHD as a diagnosis for adolescence with Intellectual disability: Clinical presentation. *J Abnorm Child Psychol*. 2013;41(4): 597-612.
- [3] Oeseburg B, Dijkstra GJ, Groothoff JW, et al. Prevalance of chronic health condition in children with intellectual disability: a systematic literature review. *Intellect Dev Disabil*. 2011;49(2):59-85.
- [4] Rzepecka H, McKenzie K, McClure I, Murphy S. Sleep, anxiety and challenging behavior in children with intellectual disability and/or autism spectrum disorder. *Res Dev Disabil*. 2011;32(6):2758-66.
- [5] Robins E, Guze SB. Establishment of diagnostic validity of a psychiatric disorder. *Am J Psychiatry*. 1970;126:983-87.
- [6] Neece CL, Baker BL, Blacher J, Crnic KA. Attention-deficit/ hyperactivity disorder among children with and without intellectual disability: an examination across time. *J Intellect Disabil Res*. 2011; 55(7):623-35.
- [7] Hassler F, Thome J. Mental Retardation and ADHD. *Z Kinder Jugend Psychiatr Psychother*. 2012; 40(2):83-93.
- [8] Moore DF, Sears DA. Pica, iron deficiency and medical history. *Am J Med*. 1994;97:390-93.
- [9] Gary M Pace, Edward A Toyer. The effects of a vitamin supplement on the pica of a child with severe mental retardation. *J Appl Behav Analysis*. 2000;33(4):619-22.
- [10] Joubert CE. Incidence of some oral based habits among college students and their correlation with use of oral stimulants. *Psychol Rep*. 1993;72:735-38.
- [11] Diagnostic and statistical manual of mental disorder. 5th ed. Washington, DC: American Psychiatric Association; 2013.
- [12] Ghanizadeh A. Association of nail biting and psychiatric disorder in children and their parents in a psychiatrically referred sample of children. *Child Adolesc Psychiatr Ment Health*. 2008;2:13.
- [13] Di Nuovo SF, Buono S. Psychiatric syndrome comorbid with mental retardation: difference in cognitive and adaptive skills. *J Psychiatr Res*. 2007;41(9):795-800.

PARTICULARS OF CONTRIBUTORS:

1. Senior Resident, Department of Psychiatry, U.C.M.S. & Guru Teg Bahadur Hospital, Dilshad Garden, Delhi, India.
2. Professor & HOD, Department of Psychiatry, U.C.M.S. & Guru Teg Bahadur Hospital, Dilshad Garden, Delhi, India.
3. Senior Resident, Department of Psychiatry, U.C.M.S. & Guru Teg Bahadur Hospital, Dilshad Garden, Delhi, India.

NAME, ADDRESS, E-MAIL ID OF THE CORRESPONDING AUTHOR:

Dr. M.S.Bhatia,
D-1, Naraina Vihar, New Delhi-110028, India.
Phone : 09868399582, E-mail : manbhatia1@rediffmail.com

FINANCIAL OR OTHER COMPETING INTERESTS: None.

Date of Submission: **Mar 20, 2014**
Date of Peer Review: **Jul 18, 2014**
Date of Acceptance: **Jul 29, 2014**
Date of Publishing: **Nov 20, 2014**