ISSN-e [2675-5602]

Global Academic Nursing Journal

ABSTRACT

Management of care for children with bipolar affective disorder

Gestión de la atención a niños con trastorno afectivo bipolar

Gestão do cuidado de crianças com transtorno afetivo bipolar

Aline Voltarelli[1*]
ORCID: 0000-0002-3491-616X
Elda Garbo Pinto[2]
ORCID: 0000-0003-0443-7501
Amanda Aparecida Camargo de Oliveira[3]
ORCID: 0000-0002-4838-7561
Daniela de Stefani Marquez[4]
ORCID: 0000-0002-1463-2012
Wagner Rafael da Silva[5]
ORCID: 0000-0002-0952-4877
Crisna Rodrigues Pereira[6]
ORCID: 0000-0001-7948-3890
Jefferson Júnio Santos da Silva[7]
ORCID: 0009-0003-2649-3480
Milena Carla Queiróz[8]
ORCID: 0000-0003-0209-6379
Márcia Andréa da Gama Araujo[9]
ORCID: 0009-0000-5227-1708
Rosângela Sakman[9]
ORCID: 0000-0003-1748-9490

[1]Universidad de Ciencias Empresariales y Sociales. Buenos Aires, Argentina.
[2]Universidade Sagrado Coração. São Paulo, Brazil.
[3]Universidade Municipal de São Caetano do Sul. São Paulo, Brazil.
[4]Faculdade FINOM/TECSOMA. Minas Gerais, Brazil.
[5]Universidade Brasil. São Paulo, Brazil.
[6]Centro Universitário Atenas. Minas Gerais, Brazil.
[7]Universidade de Rio Verde. Goiás, Brazil.
[8]Centro Universitário de Rio Preto. São Paulo, Brazil.
[9]Faculdade Sequencial. São Paulo, Brazil.

How to cite this article:
Voltarelli A, Pinto EG, Oliveira AAC, Marquez DS, Silva WR, Pereira CR, Silva JJS, Queiróz MC, Araujo MAG, Sakman R. Management of care for children with bipolar affective disorder. Glob Acad Nurs. 2025;6(Sup.1):e472. https://dx.doi.org/10.5935/2675-5602.20200472

***Corresponding author:**
alivolter@yahoo.com.br

Submission: 06-03-2025
Approval: 07-01-2025

Introduction: When reflecting on scientific research as a means of professional development for individuals in organizations, bipolar affective disorder (BAD) is classified by Psychiatry as a mental disorder that expresses a serious, chronic, recurrent, and disabling condition and that represents a major health problem. It is characterized by two types of conditions: (a) mania and (b) depression. These symptoms significantly influence the lives of individuals diagnosed with BAD, both in symptomatic presentation and when subjected to treatment strategies. The diagnosis of BAD is made through the Diagnostic and Statistical Manual of Mental Disorders (DSM) and the International Classification of Diseases (ICD). Bipolar disorder is a disorder that affects the patient's nervous system. In this case, the individual becomes very depressed or very agitated, and insomnia is also common. During these episodes, called mania, changes occur in the patient's brain and body. The disease is hereditary and affects 2% of the population. Anyone can get the disease, but it is more common in those who already have a family member with the problem[1,2].

Objective: Describe the management of health care for children with bipolar affective disorder.

Methodology: This study is characterized as an integrative literature review, with a qualitative approach and descriptive character, carried out in November 2022. Data collection was conducted in the databases of the Virtual Health Library (VHL), Google Scholar, and SciELO, using the descriptors "childhood behaviors", "bipolar affective disorder in childhood", and "health care". Scientific articles published between 2012 and 2022, in Portuguese and English, available in full and indexed in academic platforms, were included. Exclusion criteria included duplicate studies, non-systematic reviews, and articles that did not directly address the management of care in children with bipolar affective disorder (BAD). After screening, 10 articles were selected for critical analysis, following the steps of: (1) identification of the research problem, (2) literature search, (3) data evaluation, (4) analysis and interpretation of results, and (5) synthesis of knowledge. Data extraction considered: objectives, methodology, therapeutic interventions (pharmacological and psychosocial), and main findings.

Results and Discussion: The following are examples of psychosocial interventions for ABD found in the literature, namely: (a) Multi-family Psychoeducational Group, (b) Family-focused Treatment for Adolescents, (c) Dialectical Behavioral Therapy for Adolescents, and (d) Cognitive-Behavioral Therapy focused on the Child and Family, the Multi-family Psychoeducational Group (MFPG) is a type of psychoeducational intervention for parents of children with ABD developed by Fristad. This type of intervention consists of eight 90-minute sessions for parents and simultaneous sessions directed at the children. This strategy aims to teach them about disease, treatment, symptom management, improve problem-solving, communication skills, and support among group members and family members. Lithium, the gold standard of pharmacological treatment, interferes with the metabolism of inositol triphosphates, resulting in the release of calcium from its intracellular stores, presumably by inhibiting enzymes in the inositol formation pathway. Other hypotheses justify its use as a mood stabilizer: Due to its similarity with other elements (sodium, potassium, calcium, and magnesium), it increases serotonin levels and decreases norepinephrine levels, in addition to altering the concentrations of

dopamine, g-aminobutyric acid (GABA), and acetylcholine. It inhibits adenylate cyclase and inositol-1-phosphatase, resulting in decreased noradrenergic neurotransmission. Inhibition of adenylate cyclase results in a reduction in cyclic adenosine monophosphate (cAMP) through a variety of mechanisms, including inhibition of calmodulin binding to the catalytic unit of the enzyme and the coupling of receptors to G3 proteins; inhibition of inositol-1-phosphatase leads to a relative depletion of inositol and subsequent changes in the phosphatidylinositol receptor; however, the effects of chronic administration are likely mediated by changes distal to the receptor (e.g., at the G protein level) or by changes in protein kinase-C isozymes that would lead to phosphorylation of nuclear proteins[3,4].

Conclusion: This study demonstrated that the management of bipolar affective disorder (BAD) in children requires a multidisciplinary approach, integrating pharmacological therapy and psychosocial interventions. The most used drugs include mood stabilizers (lithium, valproate), atypical antipsychotics (quetiapine, risperidone), and antidepressants (fluoxetine), which act on the modulation of neurotransmitters such as serotonin, dopamine, and GABA. However, it is observed that prolonged use can lead to neuroadaptive effects, requiring strict monitoring. Psychosocial interventions - such as family psychoeducation, cognitive-behavioral therapy (CBT), and dialectical behavioral therapy (DBT) - have demonstrated efficacy in treatment adherence, reduction of relapses, and improvement of functionality. Psychoeducation stood out as an essential strategy to raise awareness among patients and caregivers about the disease, while CBT helped in the management of residual symptoms and prevention of crises.

References

1. Brito BER, Rocha TS, Barbosa MMM, Vieira RM, Fonseca GCD, Queiroz LS, Couto HC, Melo ACA, Soares JB, Polakiewicz RR. Tentativas reincidentes de autoextermínio em paciente com múltiplos transtornos psiquiátricos: entraves a um bom diagnóstico. Glob Acad Nurs. 2022;3(Spe.2):e273. https://dx.doi.org/10.5935/2675-5602.20200273
2. Gatte CC. O transtorno bipolar na infância e seu desenvolvimento pessoal e educativo. Rev Eletrôn Fac Invest Cienc Tecnol [Internet]. 2021 [cited 2022 Nov 5];4(2):10. Available from: https://revista.institutoinvest.edu.br/index.php/revistainvest/article/view/35
3. Cruz MB. Transtorno específico de aprendizagem em crianças e adolescentes com transtorno bipolar: prevalência e correlatos neuroanatômicos [dissertação]. Porto Alegre: Universidade Federal do Rio Grande do Sul; 2017 [cited 2022 Nov 5]. Available from: http://hdl.handle.net/10183/179006
4. Silva MVR. Intervenção cognitivo-comportamental no estresse infantil. Scientia Generalis [Internet]. 2021 [cited 2022 Nov 5];2(1):23-36. Available from: https://scientiageneralis.com.br/index.php/SG/article/view/145