Medicines in Child and Adolescent Mental Health

Caroline Hynes
Advanced Specialist Pharmacist | St John of God University Hospital
Honorary Clinical Lecturer | RCSI University of Medicine and Health Sciences
Adjunct Lecturer/Associate Professor | University College Dublin

YOUTH Med • Info

St John of God University Hospital

Learning Outcomes

Background on prescribing for children and adolescents in Ireland

Medicines for depression, anxiety, bipolar disorder, psychosis, eating disorders and ADHD

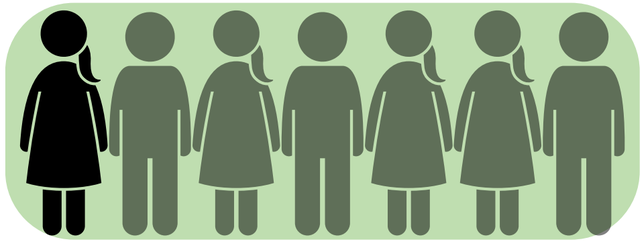
Side-effects and physical health monitoring

Resources for further information and support

Child and Adolescent Mental Health

Mental health conditions are among of the leading causes of illness and disability in adolescents and young adults

Their prevalence and diagnosis have been increasing over recent years - **1 in 7 10–19 year-olds** experience mental health difficulties



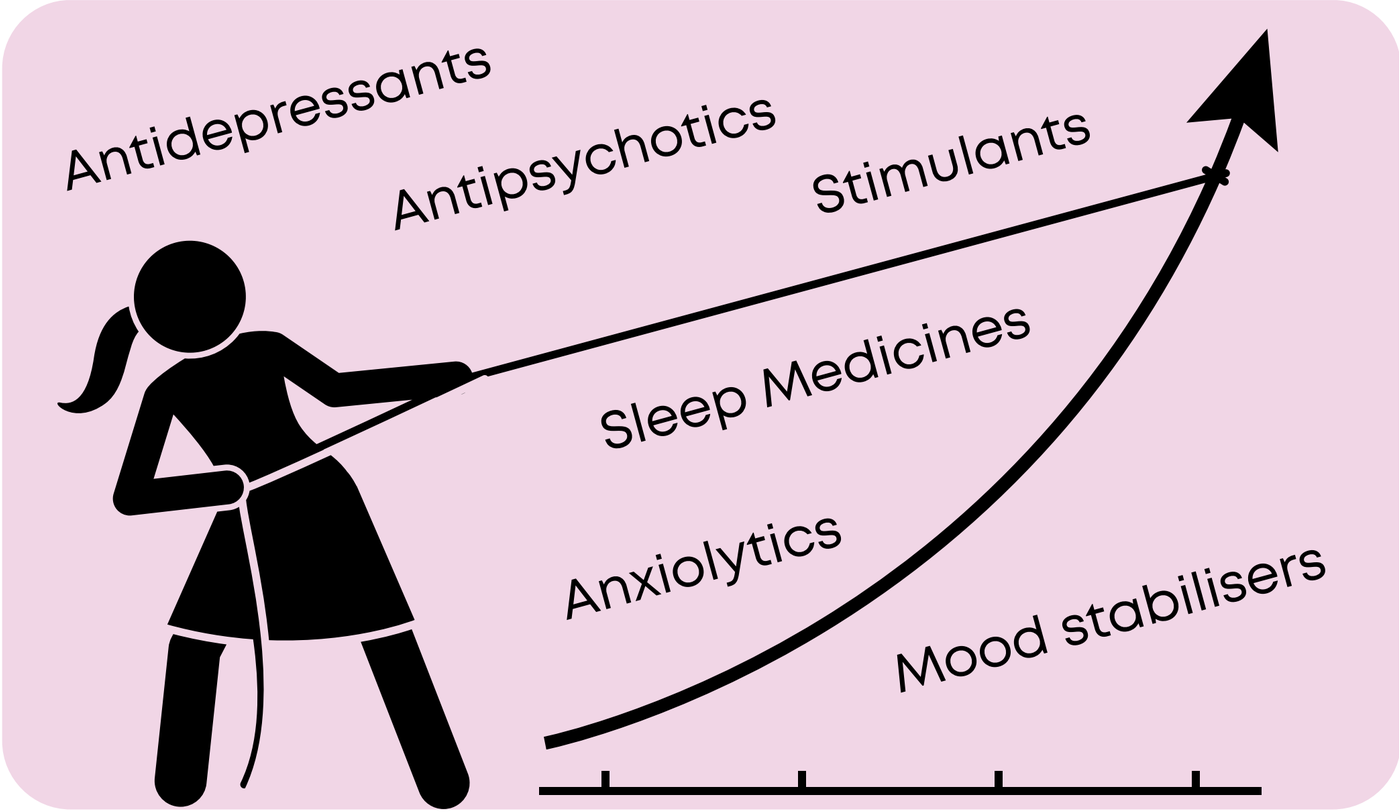
Impact of Mental Health Conditions

Three of the top 10 causes of disability adjusted life years for adolescents (10-24 years) are mental health-related

Suicide was the fourth leading cause of death in 15 to 29-year-olds

Increase in Mental Health Medicines

There has been a **global increase** in the prescription for children and young people of mental health medicines



CAMHS in the News

YOUTH Med • Info

St John of God University Hospital

Irish Independent News Opinion Business Sport Life Style Entertainment Travel Video

Home / Irish News

Staffing shortage in CAMHS deteriorated last year as demand increased

THE IRISH TIMES 16°

Health

Findings of south Kerry Camhs review 'shocking, very serious and unacceptable', Taoiseach says

HSE report finds hundreds of children received 'risky' treatment from doctor

Expand

LATEST STORIES >

Meath living the dream after Dublin win as Tipperary's nightmare start proves costly against Cork

Supreme Court sits in Letterkenny for first time in northwest

Yemen's Houthi rebels say 68 dead in US air strike that hit jail holding migrants

Kim Kardashian robbery suspects to appear in Paris court as trial begins

Man due in court following carjacking and robberies in Dublin and Wicklow

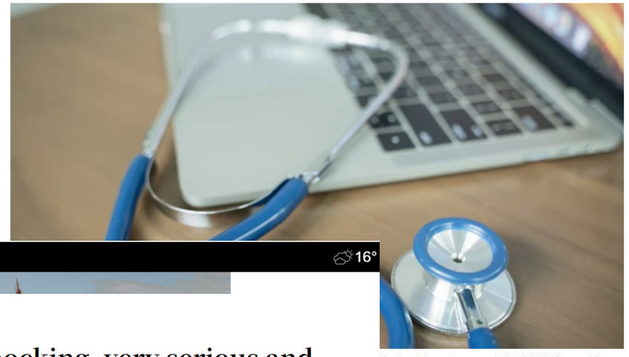
ADVERTISEMENT

RTÉ NEWS SPORT ENTERTAINMENT BUSINESS LIFESTYLE CULTURE PLAYER TV RADIO WEA

NEWS ▸ HEALTH ▸ Politics Regional Ireland Middle East Climate Nuacht World RTÉ Investigates Pro

Experts call for 'radical' overhaul of CAMHS governance

Updated / Tuesday, 25 Mar 2025 07:31



IS should receive specialist CAMHS-specific

Breaking CPI

College of Psychiatrists calls for new CAMHS structures

By Reporter - 25th Mar 2025

THE IRISH TIMES 11°

Health

'We can't recruit': Psychiatrists propose Camhs reforms to improve patient care

College of Psychiatrists of Ireland launches model of governance and management structures for Camhs

Expand

Dr Patricia Byrne said a report by the Mental Health Commission identified 'national deficits' in Camhs team staffing, resources and a failure to

LATEST STORIES >

Mater hospital's emergency department extension delayed by a year due to nursing shortages

Spain's left celebrates rapport with Pope Francis

Tactical analysis: Cork's red mist gave Clare chance to make the numbers count

Bishops 'have got to be fired': The Maga Catholics trying to take back control of the church

How the violence of the Dublin riots can be traced back to the Blueshirts

ADVERTISEMENT

L'ORÉAL ANNUAL REPORT

Maskey Report

A review of a regional CAMHS Ireland centre (South Kerry, Ireland) was carried out between July 2016 and April 2021

The **Maskey Report** determined that care received by 240 patients failed to meet required standards

Unreliable diagnoses

Inappropriate prescribing

Poor monitoring of adverse effects

46 children experienced **significant harm**

HSE Post-Maskey Audit

Key Findings

21,018 Children in CAMHS

3,528 Audited

56% ♂ 43% ♀

2 years Median Duration in CAMHS

3,193 prescribed medication on 31st December 2021

347 (10.9%) Prescribed an antipsychotic

1,337 (41.9%) Prescribed an Anti-depressant

1,726 (54%) Prescribed ADHD medication

Documentation standards

Polypharmacy

70 % of children prescribed only 1 medication

23 % of children prescribed 2 medication

Small number of children (4.6%) prescribed 3 and 0.7% prescribed 4 medications

*'**Pharmacists** should be integrated into all CAMHS teams'*

Prescribing in Ireland

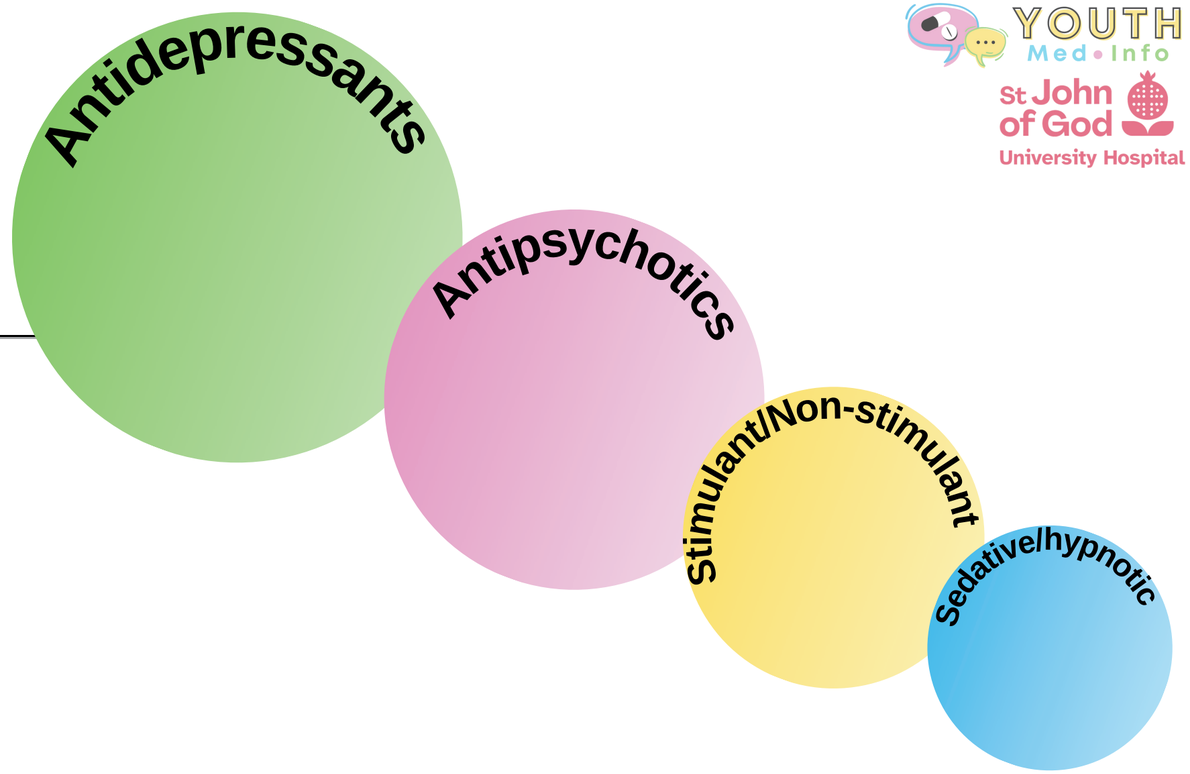
European Child & Adolescent Psychiatry (2025) 34:997–1009
https://doi.org/10.1007/s00787-024-02530-7

ORIGINAL CONTRIBUTION

Recent trends in psychotropic medication use in children and adolescents in Ireland

Rebecca Parkin[1] · Kathleen Bennett[2] · Fiona Mc Nicholas[3,4,5] · John C. Hayden[1]

Received: 12 October 2023 / Accepted: 11 July 2024 / Published online: 8 August 2024



Increasing trend in prevalence of prescribing all mental health medicines: 2017 to 2021

Rates were found to be **lower than international comparators**

Prescribing in Ireland

Irish Journal of Psychological Medicine (2025), **42**, 28–33
doi:10.1017/ipm.2024.11

CAMBRIDGE UNIVERSITY PRESS

Original Research

Impact of a national audit on child and adolescent psychiatrists' prescribing practices

L. Bond[1,2], J. Z. Ong[1] and F. McNicholas[1,2,3]

[1]School of Medicine & Medical Science, University College Dublin, Dublin, Ireland, [2]Department of Paediatric Liaison Psychiatry, Children's Hospital Ireland, Crumlin, Ireland and [3]CAMHS, Lucena Clinic, Rathgar, Ireland

Improvement in prescribing practices - increased vigilance in monitoring and reference to existing guidelines

Hesitant and **cautious** approach to medicines use

Prescribing in a child vs. adult

Child is **still developing** – behavioural differences must be seen in this context

Child is **less likely to spontaneously report** changes in how they are feeling – must wait for an adult to notice and seek help

Child **does not have the verbal skills** to put their problems into words

Principles of Prescribing

- Target symptoms, not diagnoses
- Technical aspects of prescribing for children
- Start low, go slow
- Multiple medicines are often required
- Allow time for adequate trial
- Where possible, change one medicine at a time
- Monitor outcome in more than one setting
- Patient/family education about medicine essential

Child and Adolescent Mental Health

50% of all lifetime mental health conditions begins by **age 14**

75% by **age 24**

Depression

Eating disorders

Anxiety

Bipolar disorder

Psychosis

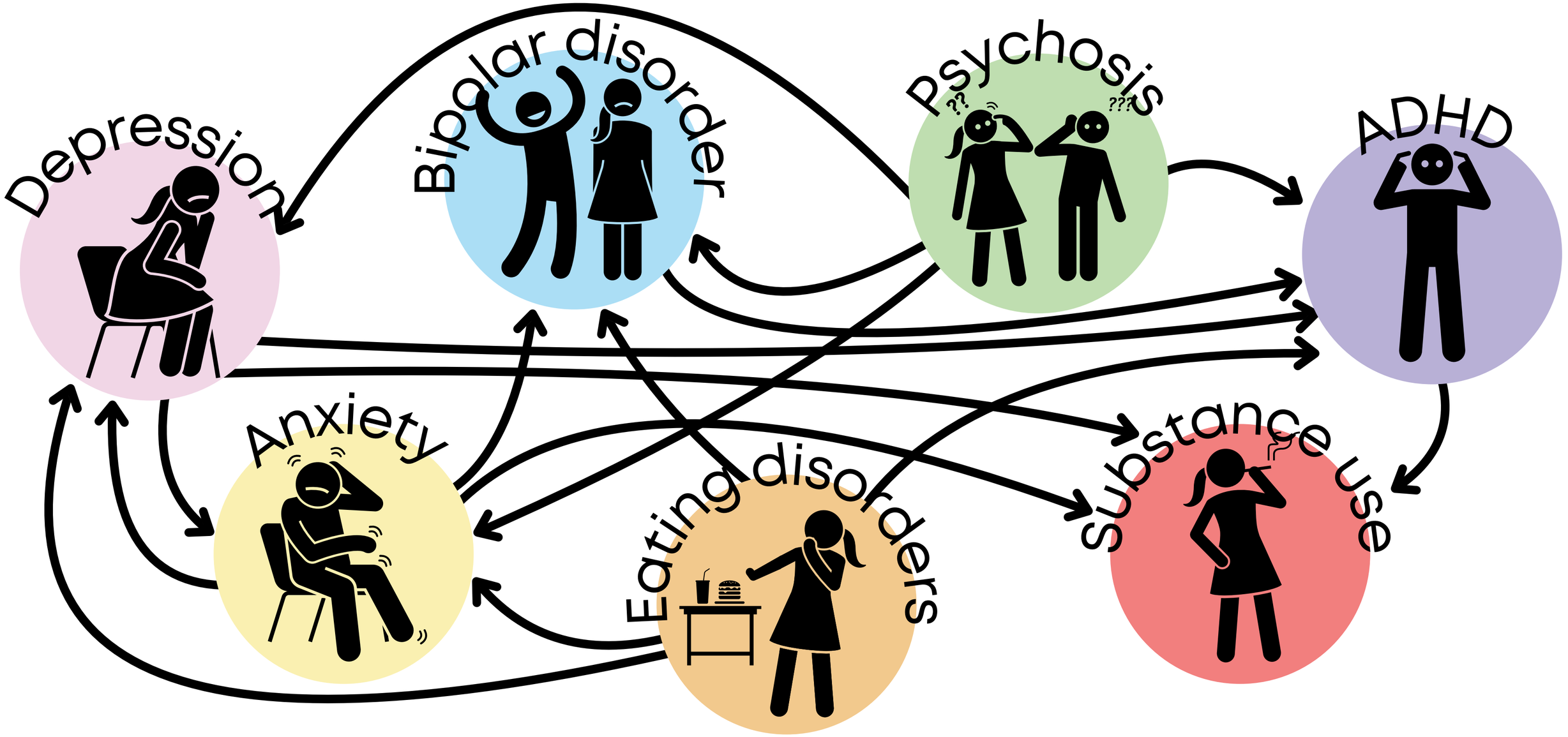
ADHD before **age 12**

ADHD

YOUTH Med • Info

St John of God University Hospital

Comorbidities



Depression

Among the **more common** mental health conditions in children and adolescents

Nearly **3% of youth** worldwide are reported to have a depressive disorder

Nearly **30% of youth with MDD** reported some form of suicidality in the past year, and more than **10% reported a suicide attempt**

Rates of depression in younger children are lower than in adolescents

Medicines in Depression

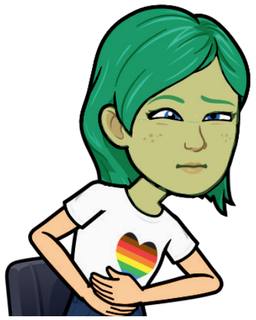
Fluoxetine - Moderate-severe depression only in combination with a concurrent psychological therapy

Sertraline **OR**

Citalopram - (UK) If treatment with fluoxetine is unsuccessful or is not tolerated

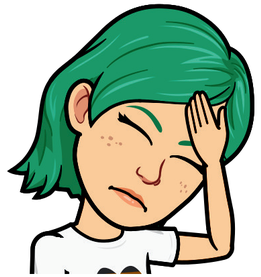
Escitalopram - (US)

Side-effects - SSRIs

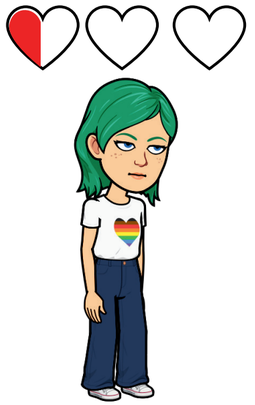


Feeling or getting sick

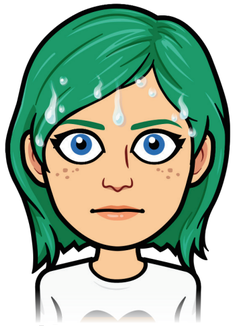
Diarrhoea



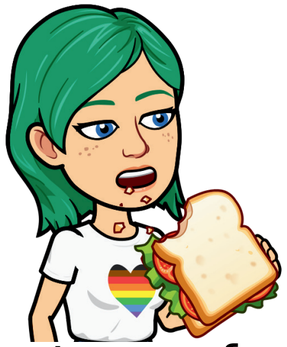
Headache



Less interest in intimate relationships



Feeling more anxious



Loss of appetite

Trouble sleeping

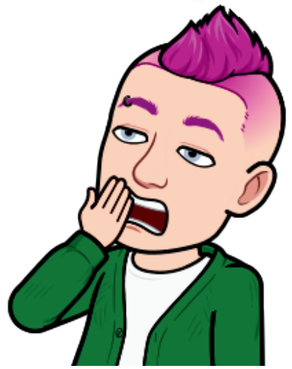
Medicines in Depression - Off-label

Mirtazapine

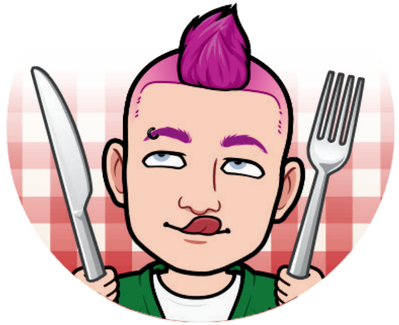
OR

Venlafaxine - use with caution due to possible associated increased suicidal ideation

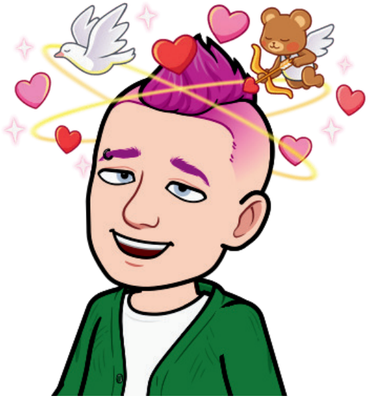
Side-effects - Mirtazapine



Drowsiness



Increased appetite

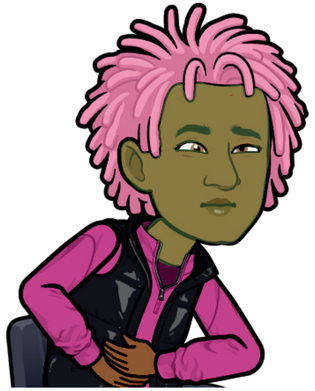


Dizziness

Dry mouth

Headache

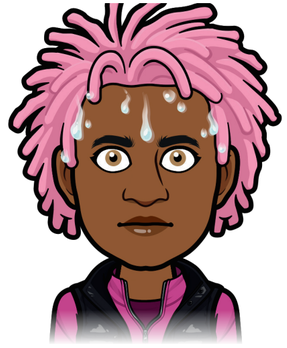
Side-effects - Venlafaxine



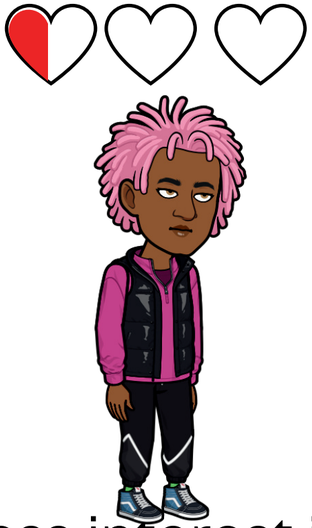
Feeling or getting sick

Headache

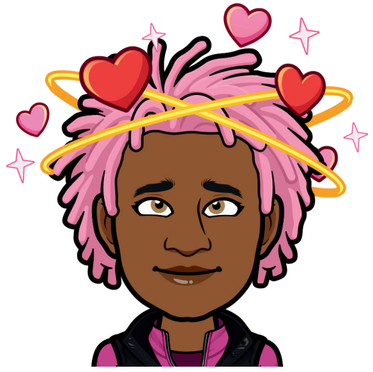
Dry mouth



Increased sweating

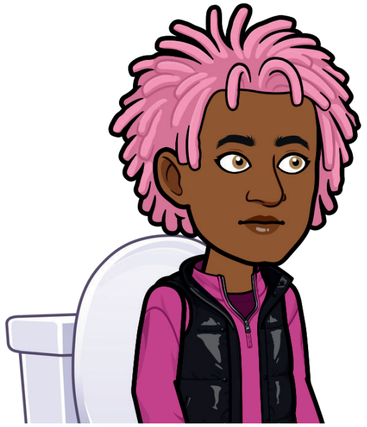


Less interest in intimate relationships



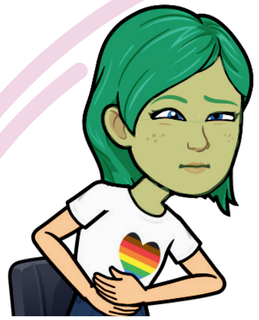
Dizziness

Trouble sleeping



Constipation

Side-effect Support



Feeling or getting sick

Happens to **1 in 5** young people

Take the medicine with a **small amount food** like crackers or toast

Eat **smaller meals** more often during the day

Drinking **plenty of cool water** can be helpful and **sucking on sugar-free hard sweets**

Duration of Treatment in Depression

Continue for at least **6-12 months** after remission

Assess:
- **Level of treatment response**
- **Clinical status**
- **Comorbidities**
- **Course/duration of treatment**
- **Concurrent therapies**
- **Change in family/school/environment**

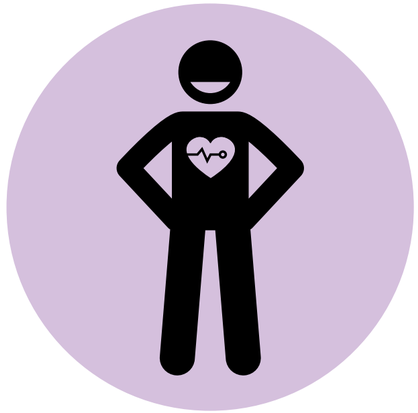
Discontinuation during a relatively stress-free period

Monitoring - SSRIs

No specific monitoring recommendations

Citalopram and

Escitalopram are contraindicated with other medicines known to prolong QTc interval



Anxiety

Anxiety disorders are **among the most common** psychiatric disorders in children and adolescents

Nearly **7% of youths** worldwide have an anxiety disorder

Median age of onset is **11 years**

Medicines in Anxiety

SSRIs - for moderate-to-severe illness

Sertraline - for obsessive compulsive disorder (6-17 years)

Duration of Treatment in Anxiety

Continue for approximately **12 months** after remission

Monitor for re-emergence of symptoms for several months after discontinuation

Severe and chronic anxiety may require **longer treatment duration**

Discontinuation during a relatively stress-free period

Psychosis

About **12%** of **psychotic disorders** and **8%** of **schizophrenia** cases have **onset in childhood**

Schizophrenia spectrum disorders often first present during **adolescence - rarely in childhood**

Medicines in Psychosis

Second generation antipsychotics - choice determined by values and preferences of the individual with regard to side-effects

Aripiprazole - lowest risk of hyperprolactinaemia and cardiometabolic side-effects

OR

Asenapine - low risk of hyperprolactinaemia and medium risk cardiometabolic side-effects

OR

Ziprasidone - medium risk of hyperprolactinaemia and low risk cardiometabolic side-effects

Medicines in Psychosis

Risperidone - high risk of hyperprolactinaemia and medium risk of cardiometabolic side-effects

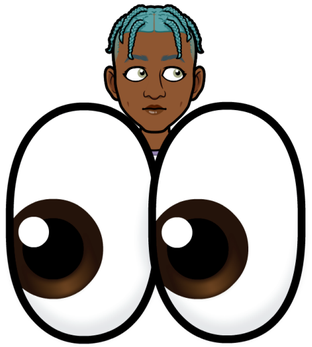
Olanzapine medium risk of hyperprolactinaemia and high risk of cardiometabolic side-effects

Side-effects - Aripiprazole

Feeling restless

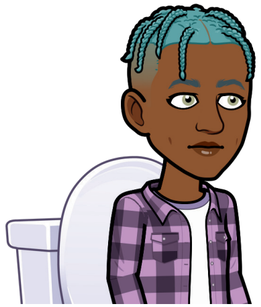
Shaky hands

Trouble sleeping

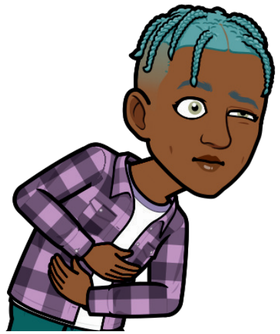


Blurred vision

Headache

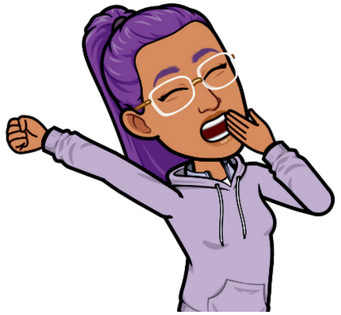


Constipation

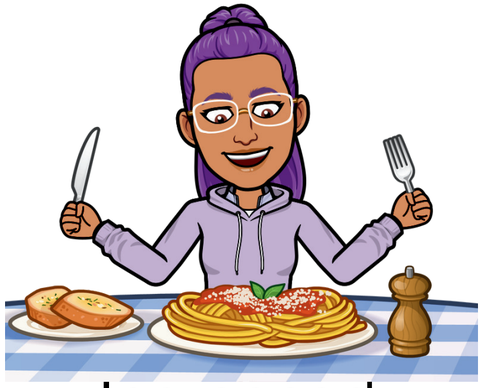


Stomach ache

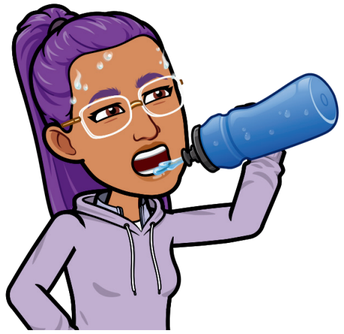
Side-effects - Olanzapine



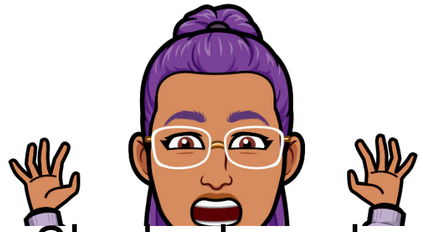
Drowsiness



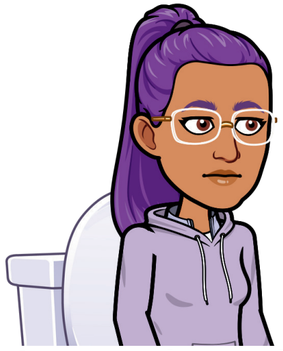
Increased Appetite



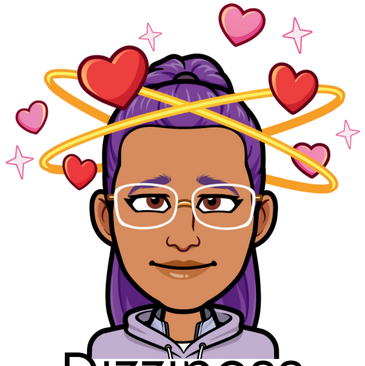
Dry mouth



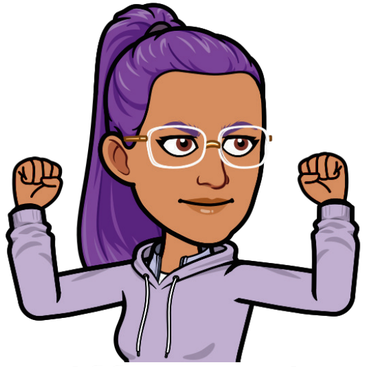
Shaky hands



Constipation



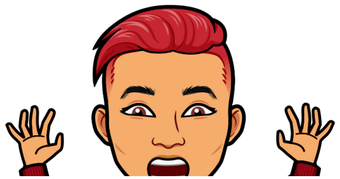
Dizziness



Stiff muscles

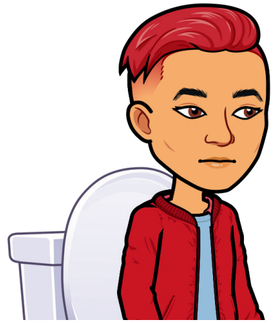
Side-effects - Risperidone

Stiff muscles



Shaky hands

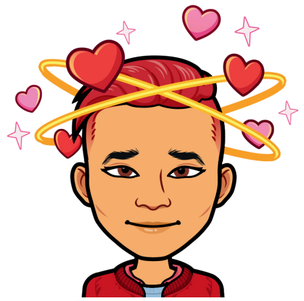
Feeling restless



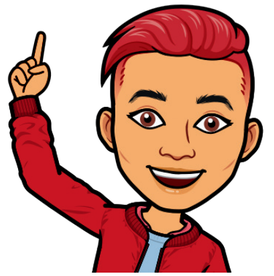
Constipation

Drowsiness

Increased Appetite

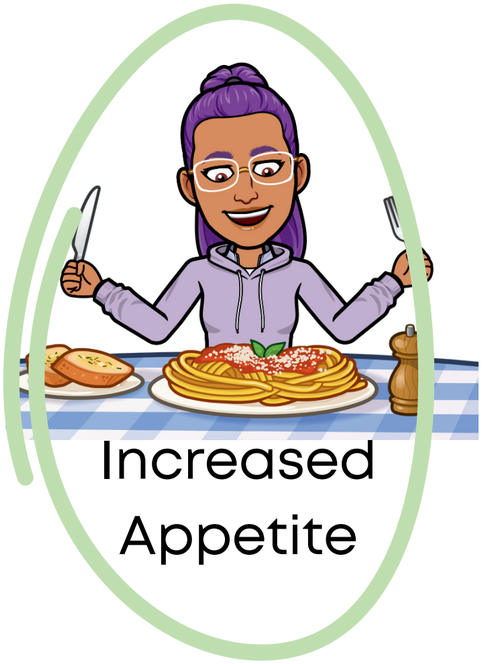


Dizziness



Increased prolactin (hormone)

Side-effect Support



1 in 7 young people gains **7% or more** body weight during the first 6 weeks

Checking weight weekly for **6-8 weeks** will help spot this early

Try and eat a healthy and varied diet that includes lots of **vegetables and protein**

Avoid sugary or processed foods and **fizzy or fruit drinks** or eating late at night

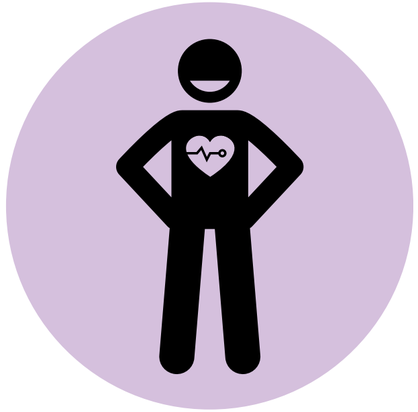
Moderate exercise like strength/resistance training for **30 minutes** at least **5 times a week**

Duration of Treatment in Psychosis

Antipsychotic treatment should be continued for 1-2 years after remission of symptoms

Monitoring - Antipsychotics

Monitoring	Weight BMI	BP Pulse	ECG	FBC/ CBC	U+Es LFTs	HbA1c/ Glucose	Plasma Lipids	Prolactin	Side-effects
At Baseline	✓	✓	✓	✓	✓	✓	✓	✓	Use GASS/BARS at 2 weeks
At 1 Month	Weekly x 6-8								
At 3 Months	✓	✓				✓	✓	✓	✓
6 Monthly	And 3-monthly thereafter	✓				✓	✓	✓	And 3-monthly thereafter
Annually			✓	✓	✓				



Bipolar Disorder

Bipolar disorder usually starts between **age 15-25 years** - extremely rare in young children

Prevalence is estimated at **2.9%**

Prevalence is **higher for females** (3.3%) than for males (2.6%)

Medicines in Bipolar Disorder

Aripiprazole - Moderate to severe manic episodes in adolescents with bipolar I

Fluoxetine + **Olanzapine** - Moderate to severe bipolar depression

THEN

Quetiapine

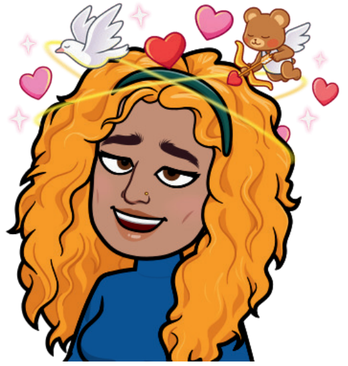
THEN

Lamotrigine

Side-effects - Quetiapine

Drowsiness

Headache



Dizziness

Unusual dreams

Dry mouth

Increased Appetite

Feeling restless

Duration of Treatment in Bipolar

Antipsychotic treatment should not be routinely continued for longer than **12 weeks**

Medicine may be needed longer term for maintenance therapy given the chronic nature of the illness

ADHD

One of the **most common** childhood neurobehavioral conditions

Approximately **8-10%** of children aged 4-17 have ADHD

Thought to be under-recognised in **girls and women**

Medicines in ADHD

Methylphenidate - First line for children >5 years and young people with ADHD

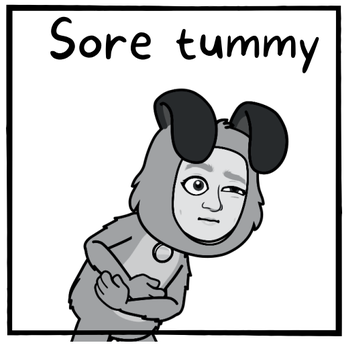
Lisdexamfetamine - Second line for children >5 years and young people following a 6-week trial of methylphenidate at an adequate dose

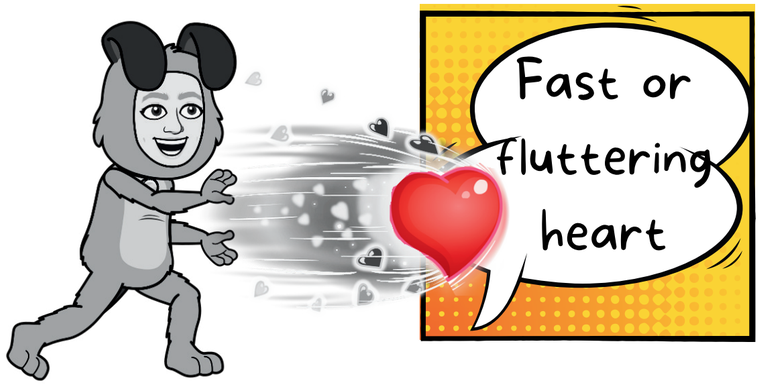
Atomoxetine **OR**

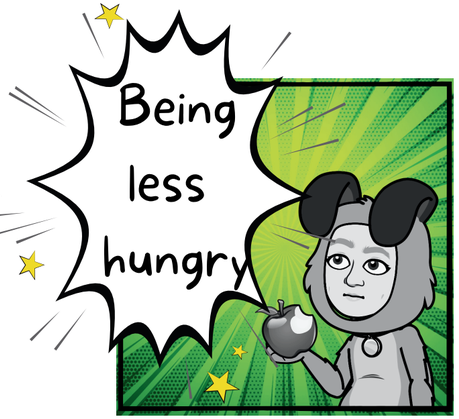
Guanfacine - aged >5 years and young people if:

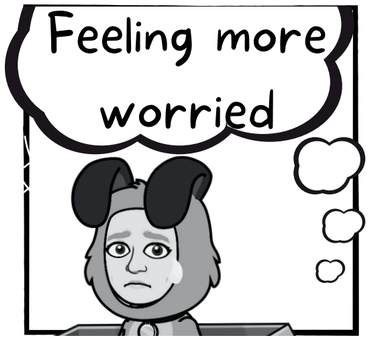
- They can't tolerate a stimulant
- Symptoms have not responded to separate 6-week trials of both stimulants

Side-effects - Methylphenidate

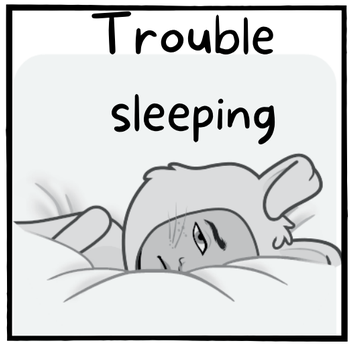


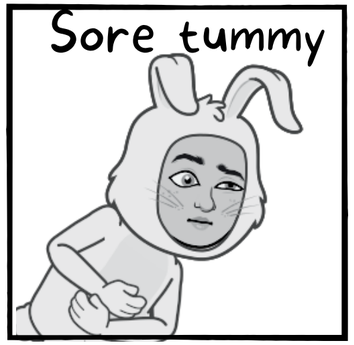


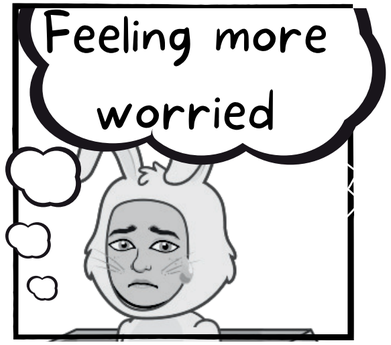


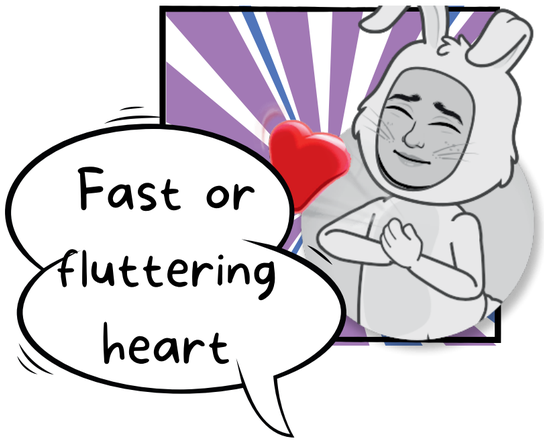


Side-effects - Lisdexamfetamine

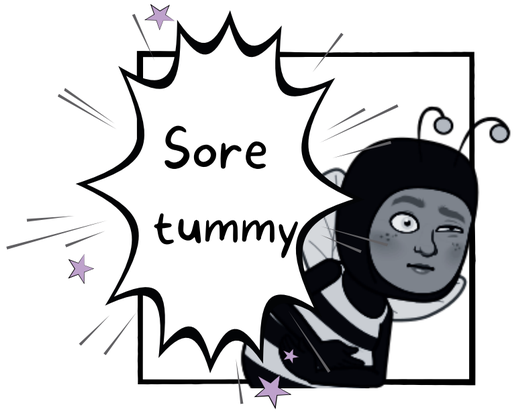


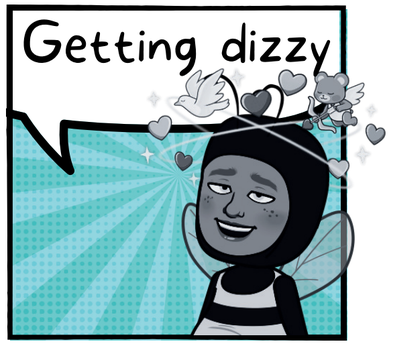


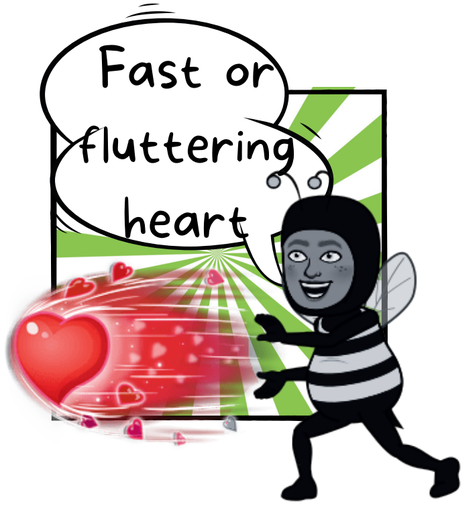




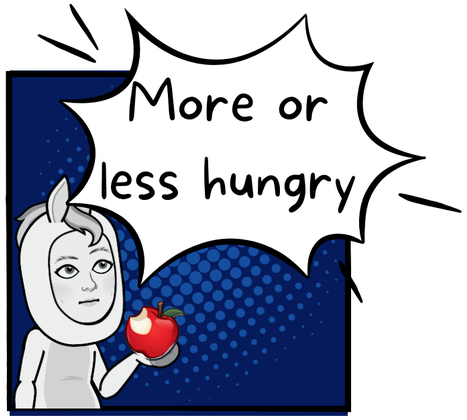
Side-effects - Atomoxetine

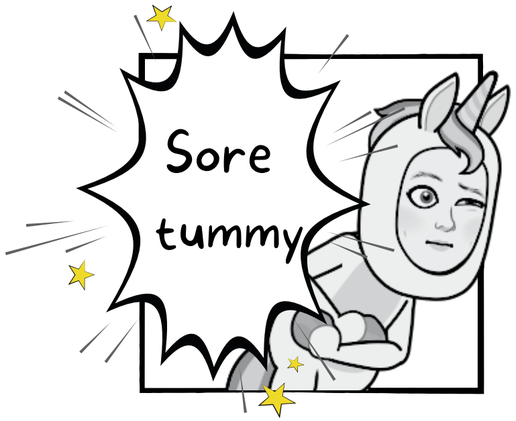


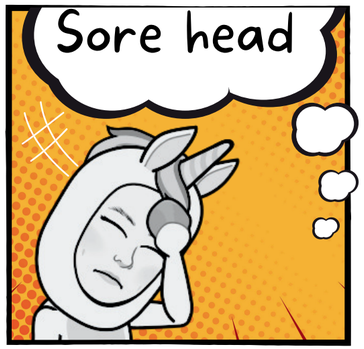




Side-effects - Guanfacine







Side-effect Support

Happens to **1 in 5** young people

Checking weight and height regularly will make sure growth is tracked

Eat a big breakfast with or before you take the medicine including foods with protein

Set **reminders** to eat and choose foods that have **more calories**

Plan meals and snacks for the evening time

Duration of Treatment in ADHD

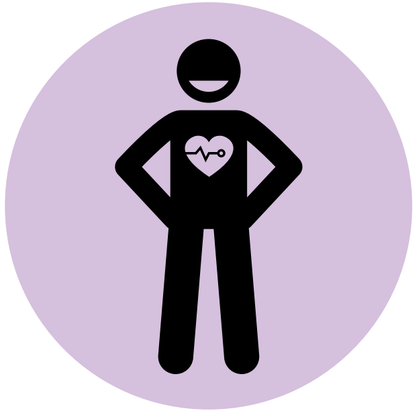
Annual review of medicine

‘Drug Holidays’ may be indicated for those who experience loss of appetite

Consider trial periods of stopping medicine or reducing the dose when assessment of the overall balance of benefits and harms suggests this may be appropriate

Monitoring - Stimulants

Monitoring	Weight	Height	BP Pulse	ECG	Side-effects
At Baseline	✓	✓	✓	Only if clinically indicated	✓ Use rating scale
At 1 Month			After every dose change		
At 3 Months	✓ And 3-monthly thereafter				✓ Regularly thereafter
6 Monthly		✓	✓		
Annually					



Eating Disorders

Anorexia nervosa (**AN**), bulimia nervosa (**BN**), binge eating disorder (**BED**), eating disorder NOS

Eating disorders are among the **most life-threatening** of all mental health conditions

Prevalence in children and adolescents **(11-19 years)** between **1.2% (boys)** and **5.7% (girls)**, with increasing incidence over recent decades

Medicines in Eating Disorders

Olanzapine - growing evidence for the possible benefit from olanzapine in the treatment of **AN**

Aripiprazole - less evidence but may help with over-valued ideas and food rituals in **AN**

Fluoxetine - high dose (60mg/day) for **BN**

Topiramate - shown to be effective well tolerated in **BN**

Lisdexamfetamine - Some evidence for acute treatment and relapse prevention in **BED**

SSRIs - good indications of efficacy in **BED**

Physical Health Monitoring - ED

As per medicine

Due to **cardiac risks** secondary to malnutrition and electrolyte abnormalities secondary to malnutrition or purging

Hypokalaemia can further prolong **QTc interval** as well as causing arrythmia in its own right

ECG

✓

Duration of Treatment - Eating Disorder

Unclear duration of antipsychotic for **AN** - 6 months?

Treatment for 2-years with fluoxetine has been recommended for **BN**

Unclear duration of treatment for **BED**

Information resources

www.youthmed.info

www.medicinesforchildren.org.uk

www.bap.org.uk

Youth Med.Info

YOUTH Med • Info

Medicines | For Clinicians | About Us | Testimonials

Accessible information on mental health medicines for young people

Search

Youth Med.Info is a source of reliable information on the most commonly used mental health medicines for young people.

Youth Med.info JUNIOR is targeted at children and their parents/guardians.

Take a look at our explainer video or click on any of the icons below to find out more about each medicine.

YOUTH Med • Info
St John of God University Hospital

References (1)

- World Health Organization. Mental health of adolescents - Factsheet [Internet]. 2021 Nov [cited 2024 Nov 21]. Available from: https://www.who.int/news-room/fact-sheets/detail/adolescent-mental-health
- Dalsgaard S, Thorsteinsson E, Trabjerg BB et al. Incidence Rates and Cumulative Incidences of the Full Spectrum of Diagnosed Mental Disorders in Childhood and Adolescence. JAMA Psychiatry. 2020 Feb 1;77(2):155-164. doi: 10.1001/jamapsychiatry.2019.3523. PMID: 31746968; PMCID: PMC6902162.
- Faraone SV, Banaschewski T, Coghill D et al. The World Federation of ADHD International Consensus Statement: 208 Evidence-based conclusions about the disorder. Neurosci Biobehav Rev. 2021 Sep;128:789-818. doi: 10.1016/j.neubiorev.2021.01.022. Epub 2021 Feb 4. PMID: 33549739; PMCID: PMC8328933
- Kessler RC, Berglund P, Demler O, Jin R, Merikangas KR, Walters EE. Lifetime prevalence and age-of-onset distributions of DSM-IV disorders in the National Comorbidity Survey Replication. Arch Gen Psychiatry. 2005 Jun;62(6):593-602
- GBD 2019 Diseases and Injuries Collaborators. Global burden of 369 diseases and injuries in 204 countries and territories, 1990–2019: a systematic analysis for the Global Burden of Disease Study 2019. Lancet. 2020;369(10258):1204–1222 (https://doi.org/10.1016/S0140-6736(20)30925-9)
- Ahn-Horst RY, Bourgeois FT. Mental Health-Related Outpatient Visits Among Adolescents and Young Adults, 2006-2019. JAMA Netw Open. 2024 Mar 4;7(3):e241468. doi: 10.1001/jamanetworkopen.2024.1468. Erratum in: JAMA Netw Open. 2024 Apr 1;7(4):e2410104. doi: 10.1001/jamanetworkopen.2024.10104. PMID: 38451523; PMCID: PMC10921253.
- Valtuille Z, Acquaviva E, Trebossen V et al. Psychotropic Medication Prescribing for Children and Adolescents After the Onset of the COVID-19 Pandemic. JAMA Netw Open. 2024 Apr 1;7(4):e247965. doi: 10.1001/jamanetworkopen.2024.7965. PMID: 38652474; PMCID: PMC11040414
- Solmi M, Radua J, Olivola M, Croce E, Soardo L, Salazar de Pablo G, Il Shin J, Kirkbride JB, Jones P, Kim JH, Kim JY, Carvalho AF, Seeman MV, Correll CU, Fusar-Poli P. Age at onset of mental disorders worldwide: large-scale meta-analysis of 192 epidemiological studies. Mol Psychiatry. 2022 Jan;27(1):281-295
- Maskey DS (2022) Report on the Look-back Review into Child and Adolescent Mental Health Services County MHS Area A
- Health Service Executive. Prescribing in Child and Adolescent Mental Health Services (CAMHS): Results from July–December 2021 National Audit. Dublin: HSE; 2023 [cited 2025 Apr 28]. Available from: https://www.hse.ie/eng/services/list/4/mental-health-services/camhs/publications/prescribing-in-child-and-adolescent-mental-health-services-audit-2023.pdf
- Bond L, Ong JZ, McNicholas F. Impact of a national audit on child and adolescent psychiatrists' prescribing practices. Ir J Psychol Med. 2024 May 13:1-6

References (2)

- Raballo A, Poletti M, Preti A. Editorial Perspective: Psychosis risk in adolescence - outcomes, comorbidity, and antipsychotics. J Child Psychol Psychiatry. 2022 Feb;63(2):241-244
- NICE Depression in children and young people: identification and management. NG 134. Updated June 2019. Available at: https://www.nice.org.uk/guidance/ng134/resources/depression-in-children-and-young-people-identification-and-management-pdf-66141719350981 <accessed on 29/01/2024>
- Walter HJ, Abright AR, Bukstein OG, Diamond J, Keable H, Ripperger-Suhler J, Rockhill C. Clinical Practice Guideline for the Assessment and Treatment of Children and Adolescents With Major and Persistent Depressive Disorders. J Am Acad Child Adolesc Psychiatry. 2023 May;62(5):479-502
- Birmaher B, Brent D. Depressive and disruptive mood dysregulation disorders. In: Dulcan MK, ed. Dulcan's Textbook of Child and Adolescent Psychiatry, 3rd ed. American Psychiatric Association Publishing; 2022:245-278
- Walter HJ, Bukstein OG, Abright AR, Keable H, Ramtekkar U, Ripperger-Suhler J, Rockhill C. Clinical Practice Guideline for the Assessment and Treatment of Children and Adolescents With Anxiety Disorders. J Am Acad Child Adolesc Psychiatry. 2020 Oct;59(10):1107-1124
- Stimpfl JN, Walkup JT, Robb AS, Alford AE, Stahl SM, McCracken JT, Stancil SL, Ramsey LB, Emslie GJ, Strawn JR. Deprescribing Antidepressants in Children and Adolescents: A Systematic Review of Discontinuation Approaches, Cross-Titration, and Withdrawal Symptoms. J Child Adolesc Psychopharmacol. 2025 Feb;35(1):3-22
- Cortese S, Besag FM, Clark B, Hollis C, Kilgariff J, Moreno C, Nicholls D, Wilkinson P, Woodbury-Smith M, Sharma A. Common practical questions - and answers - at the British Association for Psychopharmacology child and adolescent psychopharmacology course. J Psychopharmacol. 2023 Feb;37(2):119-134
- National Institute for Health and Care Excellence (NICE). Bipolar disorder: assessment and management. NICE Clinical Guideline CG185. London: NICE; 2014 Sep 24 [updated 2023 Dec 21; cited 2025 May 12]. Available from: https://www.nice.org.uk/guidance/cg185/resources/bipolar-disorder-assessment-and-management-pdf-35109814379461
- McClellan J, Kowatch R, Findling RL; Work Group on Quality Issues. Practice parameter for the assessment and treatment of children and adolescents with bipolar disorder. J Am Acad Child Adolesc Psychiatry. 2007 Jan;46(1):107-125. doi: 10.1097/01.chi.0000242240.69678.c4. Erratum in: J Am Acad Child Adolesc Psychiatry. 2007 Jun;46(6):786

References (3)

- Baldessarini RJ, Tondo L, Vazquez GH, Undurraga J, Bolzani L, Yildiz A, Khalsa HM, Lai M, Lepri B, Lolich M, Maffei PM, Salvatore P, Faedda GL, Vieta E, Tohen M. Age at onset versus family history and clinical outcomes in 1,665 international bipolar-I disorder patients. World Psychiatry. 2012 Feb;11(1):40-6
- Merikangas KR, He JP, Burstein M, Swanson SA, Avenevoli S, Cui L, Benjet C, Georgiades K, Swendsen J. Lifetime prevalence of mental disorders in U.S. adolescents: results from the National Comorbidity Survey Replication--Adolescent Supplement (NCS-A). J Am Acad Child Adolesc Psychiatry. 2010 Oct;49(10):980-9
- McClellan J, Stock S; American Academy of Child and Adolescent Psychiatry (AACAP) Committee on Quality Issues (CQI). Practice parameter for the assessment and treatment of children and adolescents with schizophrenia. J Am Acad Child Adolesc Psychiatry. 2013 Sep;52(9):976-90
- Solmi M, Radua J, Olivola M, Croce E, Soardo L, Salazar de Pablo G, Il Shin J, Kirkbride JB, Jones P, Kim JH, Kim JY, Carvalho AF, Seeman MV, Correll CU, Fusar-Poli P. Age at onset of mental disorders worldwide: large-scale meta-analysis of 192 epidemiological studies. Mol Psychiatry. 2022 Jan;27(1):281-295
- World Health Organization. Duration of antipsychotic treatment in individuals with a first psychotic episode [Internet]. Geneva: World Health Organization; 2023 [cited 2025 May 11]. Available from: https://www.who.int/teams/mental-health-and-substance-use/treatment-care/mental-health-gap-action-programme/evidence-centre/psychosis-and-bipolar-disorders/duration-of-antipsychotic-treatment-in-individuals-with-a-first-psychotic-episode
- Correll CU, Rubio JM, Kane JM. What is the risk-benefit ratio of long-term antipsychotic treatment in people with schizophrenia? World Psychiatry. 2018 Jun;17(2):149-160
- López-Gil JF, García-Hermoso A, Smith L, Firth J, Trott M, Mesas AE, Jiménez-López E, Gutiérrez-Espinoza H, Tárraga-López PJ, Victoria-Montesinos D. Global Proportion of Disordered Eating in Children and Adolescents: A Systematic Review and Meta-analysis. JAMA Pediatr. 2023 Apr 1;177(4):363-372
- National Institute for Health and Care Excellence (NICE). Eating disorders: recognition and treatment [NICE guideline NG69]. London (UK): National Institute for Health and Care Excellence; 2017 May 23 [updated 2020 Dec 16; cited 2025 May 12]. Available from: https://www.nice.org.uk/guidance/ng69/resources/eating-disorders-recognition-and-treatment-pdf-1837582159813
- Himmerich H, Kan C, Au K, Treasure J. Pharmacological treatment of eating disorders, comorbid mental health problems, malnutrition and physical health consequences. Pharmacol Ther. 2021 Jan;217:107667

References (4)

- National Institute for Health and Care Excellence (NICE). Attention deficit hyperactivity disorder: diagnosis and management [Internet]. London: NICE; 2018 [cited 2025 May 8]. (NICE guideline NG87). Available from: https://www.nice.org.uk/guidance/ng87/resources/attention-deficit-hyperactivity-disorder-diagnosis-and-management-pdf-1837699732933
- Rocco I, Corso B, Bonati M, Minicuci N. Time of onset and/or diagnosis of ADHD in European children: a systematic review. BMC Psychiatry. 2021 Nov 16;21(1):575. doi: 10.1186/s12888-021-03547-x. Erratum in: BMC Psychiatry. 2022 Jan 21;22(1):51
- Chan E. Symptoms and diagnosis of attention deficit hyperactivity disorder in children: Beyond the basics. In: UpToDate, Connor RF (Ed), Wolters Kluwer. [Accessed 2025 May 8]. Available from: https://www.uptodate.com/contents/symptoms-and-diagnosis-of-attention-deficit-hyperactivity-disorder-in-children-beyond-the-basics/print
- Bolea-Alamañac B, Nutt DJ, Adamou M, Asherson P, Bazire S, Coghill D, et al. Evidence-based guidelines for the pharmacological management of attention deficit hyperactivity disorder: update on recommendations from the British Association for Psychopharmacology. J Psychopharmacol. 2014;28(3):179–203