



Untangling Mental Health Comorbidities for a clearer path to Treatment

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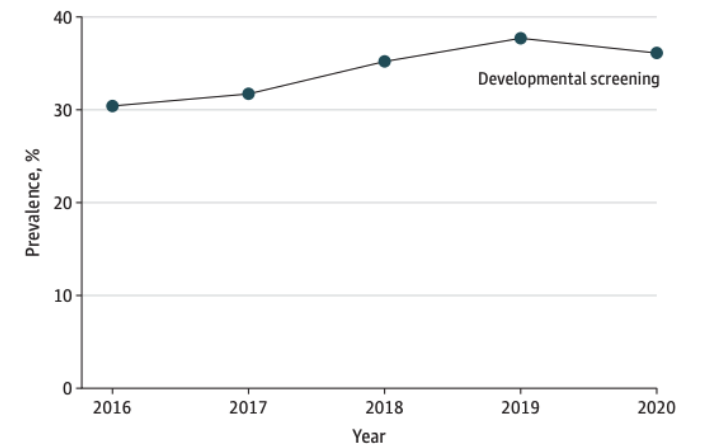
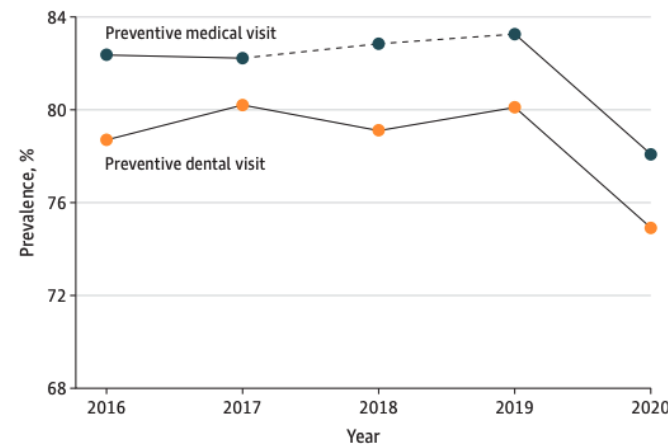
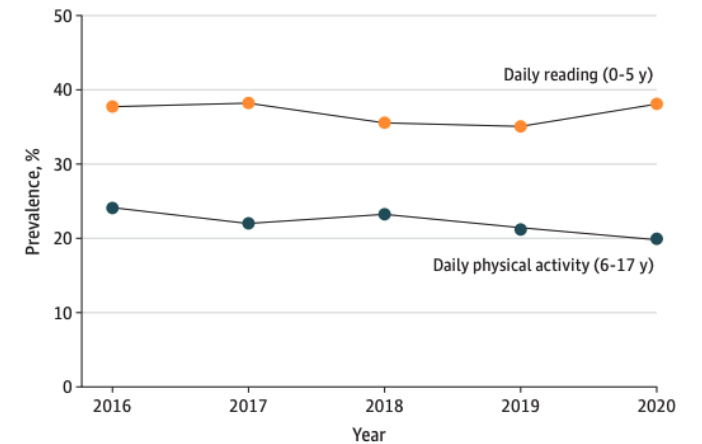
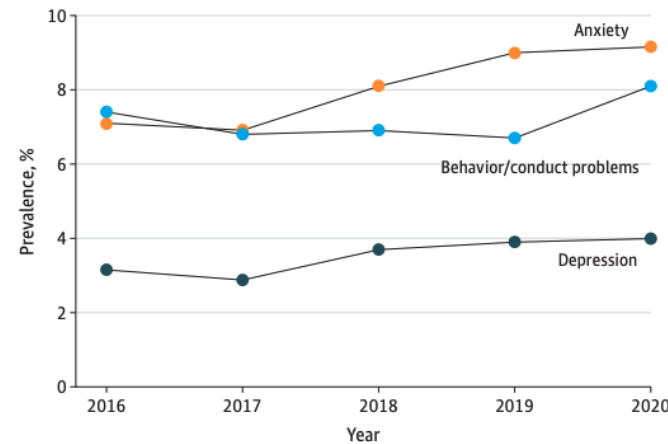
Pediatric Mental Health Disorders

Anxiety, ADHD, Behavioral Problems, and Depression are the most common mental health disorders diagnosed in children:

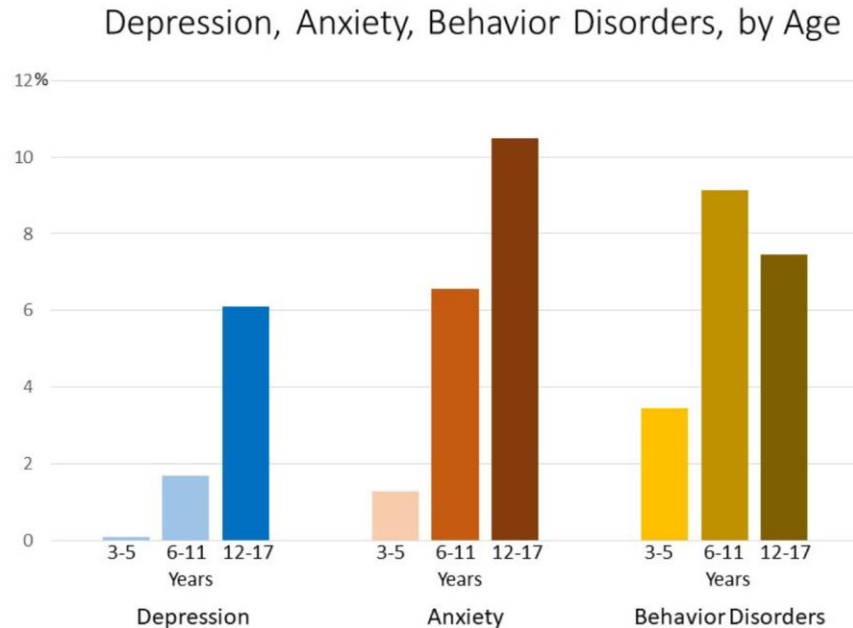
- ADHD 9.8%
- Anxiety 9.4%
- Behavioral problems 8.9%
- Depression 4.4%

A recent study published in *Jama Pediatrics* showed the rates of these commonly diagnosed disorders have been increasing over the past 5 years.

Figure 1. Trends in Selected Measures of Children's Health Conditions, Positive Health Behaviors, and Health Care Utilization, 2016-2020



Common Pediatric Comorbidities



Among children aged 3-17 in 2016:

- 3 in 4 children with depression also had anxiety (73.8%)
- 1 in 2 children with depression also had behavioral problems (47.2%)
- 1 in 3 children with anxiety also had behavioral problems (37.9%)
- 1 in 3 children with anxiety also had depression (32.3%)
- 1 in 5 children with behavioral problems also had depression (20.3%)

What is Anxiety?

Anxiety: The brain's response to danger/stimuli that an individual will actively try to avoid

Anxiety disorders: A group of disorders, described in the DSM-IV, with clinical features **including extensive anxiety, physiological anxiety symptoms, behavioral disturbances** such as extreme avoidance of feared objects, **and associated distress or impairment**

How does it present in pediatric patients?

Separation Anxiety Disorder	Social Anxiety Disorder
Earliest age of onset – most before the age of 12	Emerge in childhood - late adolescents prior to age of 25
4% of preadolescents	15.5% of XX and 11.1% of XY
Trouble separating from parent	Shy, withdrawn, self-conscious
Child often sleeps with parents	Poor eye contact
Excessive “homesickness” in older children	Reduced language and social functioning
Fear of something bad happening to caretaker	Fear of saying or doing the wrong thing and worry about what others think

Generalized Anxiety Disorder	Panic Disorder
Inability to tolerate uncertainty	15-20 minutes of acute symptoms with rapid onset and slower resolution
Seek frequent reassurance	“out of the blue”/unprovoked
Focus on mistakes they have made – overly self critical	Focus on the uncomfortable physical symptoms
Worry about wide range of events occurring to them or loved ones	Avoidance of setting/situations for fear of triggering a panic attack

Anxiety Assessments and Treatments

Assessment tools:

- Screen for Child Anxiety Related Emotional Disorders (SCARED)
- Multidimensional Anxiety Scale for Children (MASC)
- Pediatric Anxiety Rating Scale (PARS)

Uncomplicated Depression/Anxiety

Stage 1

Citalopram, Escitalopram,
Fluoxetine, or Sertraline

No
response

Stage 2

SSRI not used above

No
response

Stage 3

Venlafaxine or Duloxetine

ADHD and Anxiety

ADHD Diagnostic criteria

- Symptoms:
 - Inattention
 - Hyperactivity and impulsivity
 - Functional impairment
- Symptoms must:
 - Occur often
 - Be present before the age of 12
 - Be present in more than one setting
 - Impair function in academic, social, or occupational activities
 - Be excessive for the developmental level of the child

- **25% of children with ADHD also have anxiety**
- Children with ADHD and comorbid AD exhibit:
 - Impaired inhibitory and emotional control compared to those with only ADHD
 - Worsened performance on working memory tasks that does not respond well to methylphenidate treatment

Overlapping Symptoms of Anxiety and ADHD:

- ❖ Sleep issues
- ❖ Difficulty with concentration
- ❖ Poor grades
- ❖ Restlessness
- ❖ Intrusive thoughts
- ❖ Muscle tension
- ❖ Irritability
- ❖ Fight-or-flight
- ❖ Tires easily/fatigue

ADHD Assessments and Treatments

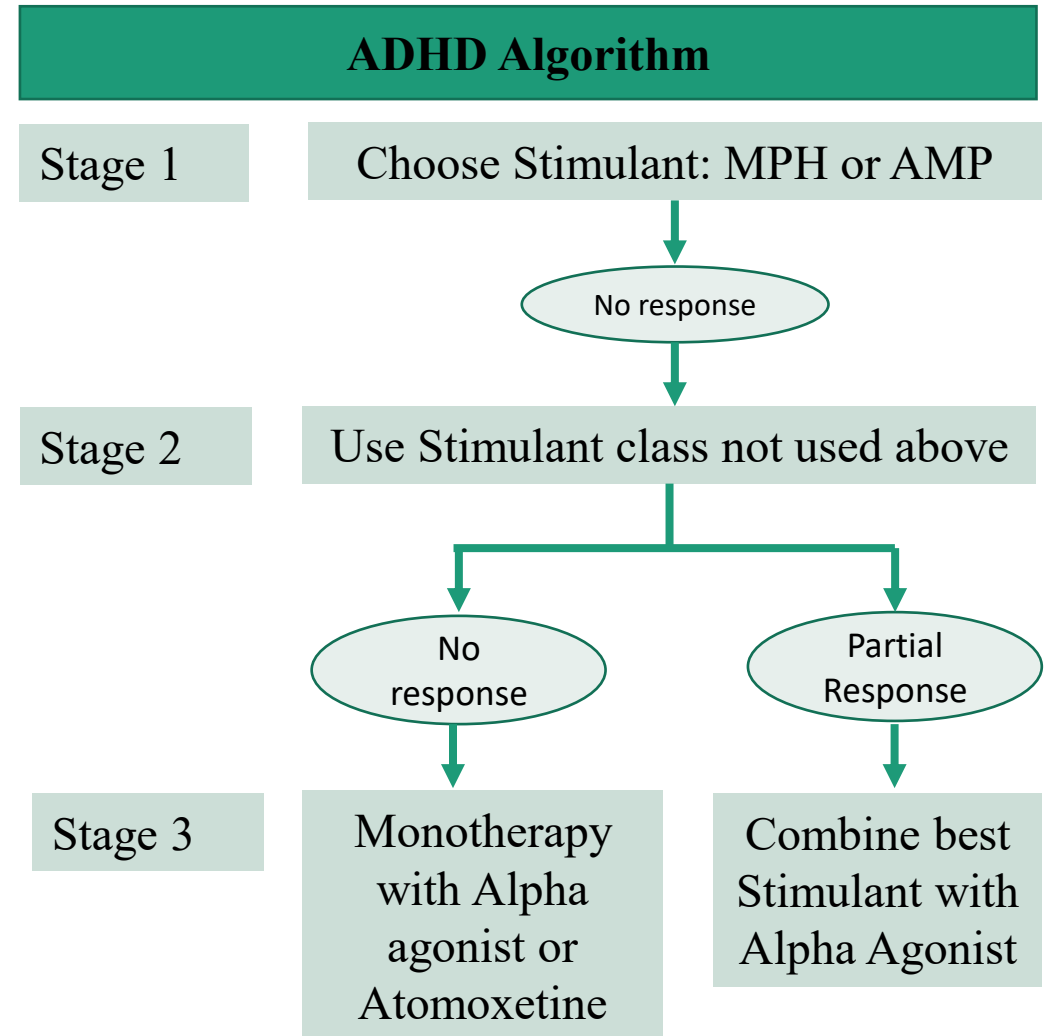
Assessments:

- BRIEF: working memory and sustained attention
- Vanderbilt ADHD rating scale
- Family history of ADHD

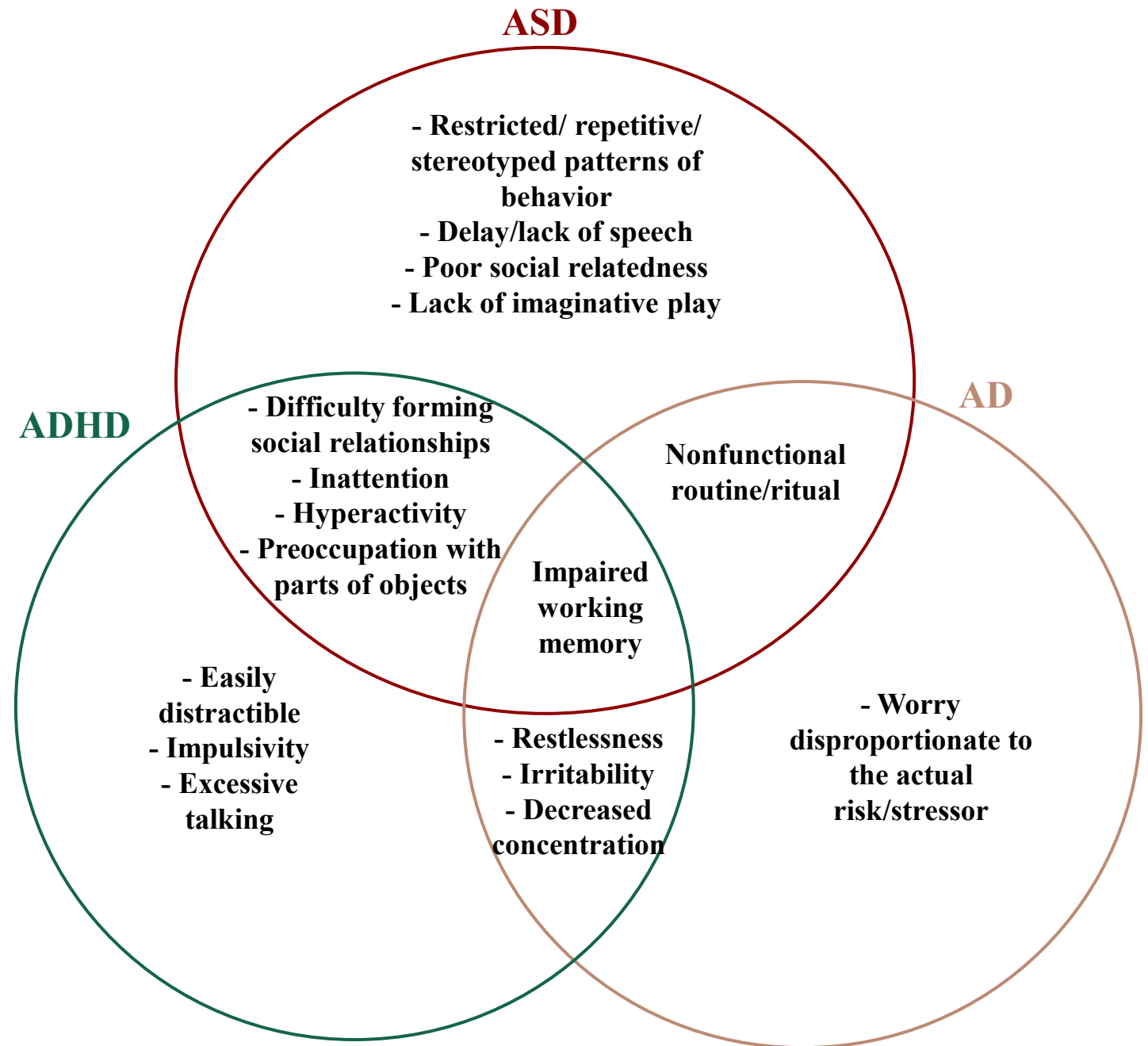
Anxiety may impact the patient's ability to answer these questionnaires accurately

ADHD medications can worsen symptoms of anxiety!

- **Try treating symptoms of anxiety first with an SSRI**
- **If inattention persists, begin treatment with an ADHD medication**



Overlap between High Functioning ASD, ADHD, and Anxiety Disorders



Autism Spectrum Disorder and Anxiety

- Psychiatric comorbidities in individuals with ASD increase the possibility of worse long-term outcomes and impaired quality of life
- **Anxiety Disorder and ADHD are among the most common psychiatric comorbidities in children and adolescents with ASD**

Characteristics of Anxiety Disorders (AD) in ASD:

- Significant global functional impairment has been shown in children with ASD and AD compared to children with ASD alone
- Individuals with ASD may have reduced insight into their emotional difficulties, thus there are significant discrepancies between child and parent ratings on anxiety scales
- **Specific phobias and separation anxiety disorders seem to be the most common forms of AD in children and adolescents with ASD**
- Anxiety in ASD may present more behaviorally



Bipolar Mania and Anxiety

- **Some of the main symptoms of bipolar mania, such as irritability and hyperarousal, are also characteristic of anxiety disorders**
- Anxiety disorders are a common Bipolar II comorbidity in youth
- Anxiety disorders typically precede the onset of mania

Bipolar Mania	Anxiety Disorder
Excessive energy with little to no sleep	Dissatisfied on little to no sleep
Euphoric	Fatigued and groggy
High self-esteem	Low self-esteem
Impulsive	Irrational fears
More talkative than usual	Avoidant of social situations

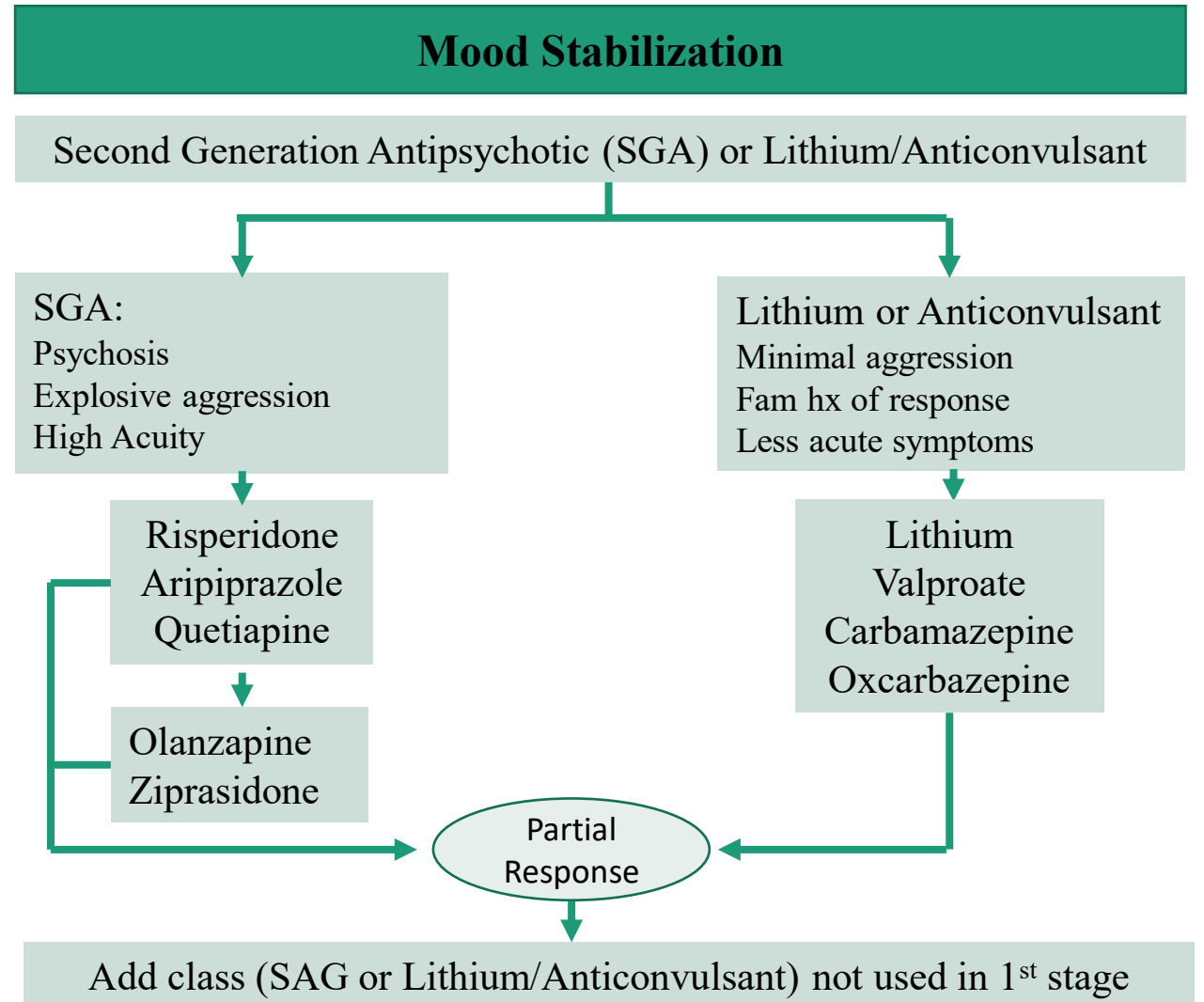
Both
Decreased sleep
Restlessness
Irritability

Bipolar Assessments and Treatment

Assessment tools:

- Young Mania Rating Scale
- Child Bipolar Questionnaire
- Family history of Bipolar Disorder

Consider lamotrigine
addition in treatment
failures





Any questions?

Thank You!

References

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