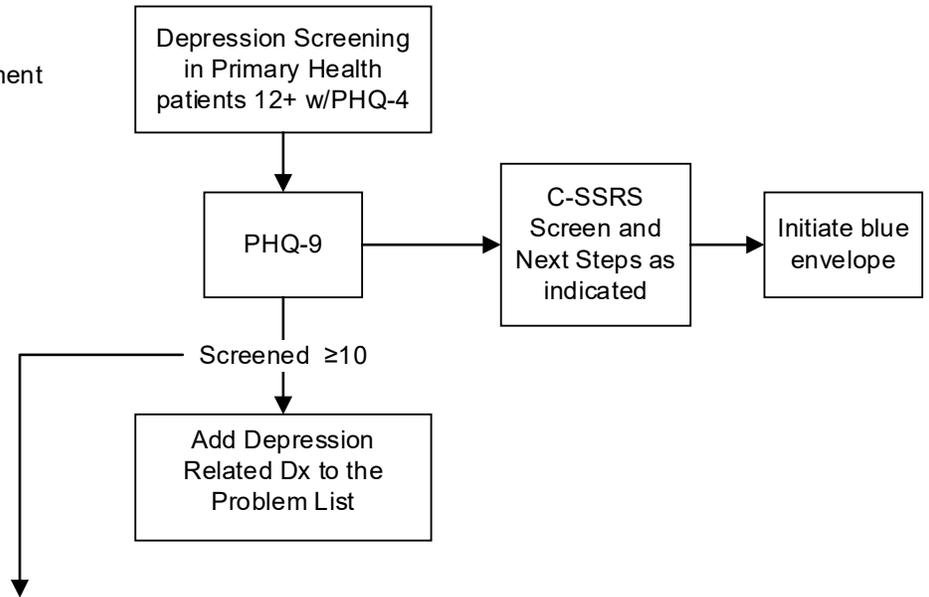


## Guideline: Pediatric Depression Assessment and Treatment, Outpatient

Updated: February 15, 2021

### Clinical algorithm:

Assessment



Screened $\geq 10$	Additional Diagnosis to Consider
Did the patient answer 5 or more questions on the PHQ-9 in route to score?	Consider MDD found here: <a href="#">Acute Phase</a>
In the past 2 years, patient has never been without symptoms for more than 2 months (children >1 year and often appears irritable vs. sad).	*Irritability and/or Aggression – Kids presenting symptom of Depression
Evidence from history, physical exam or lab results that mood disturbance is a direct result of another medical condition?	Consider dysthymia.
Is the patient experiencing these symptoms in the context of illicit drug use or misuse of Rx drugs or alcohol?	Consider depressive disorder due to a medical condition.
Are symptoms due to a specific change or stressful event in their life?	Consider mood disorder substance induced.
Has the patient ever had a health professional suggest they have bipolar disorder? Or Manic/Psychotic symptoms?	Consider adjustment disorder
How difficult has these problems made it for the patient to work, take care of things at home, or get along with other people?	Consider further evaluation for Bipolar or Psychotic symptoms.
	Functional question.

## Clinical guideline summary

**CLINICAL GUIDELINE NAME:** Pediatric Depression Assessment and Treatment, Outpatient

**PATIENT POPULATION AND DIAGNOSIS:** 12 years and above

**APPLICABLE TO:** All Spectrum Health Sites

**BRIEF DESCRIPTION:** The guideline is designed for pediatrician or family practice providers to use with their pediatric patients ages 12 and above.

**OVERSIGHT TEAM LEADER(S):** Aniruddh Behere, Lisa Lowery, Phillip Waalkes, Brittany Barber Garcia, Erica Auger, Scott Stebbins, Sarah Pentoney, Brandon Holmes, Kiran Taylor

**OWNING EXPERT IMPROVEMENT TEAM (EIT):** Pediatric Behavioral Health EIT

**MANAGING CLINICAL PRACTICE COUNCIL (CPC):** Primary Health CPC

**CPC APPROVAL DATE:** 10/22/2020

**OTHER TEAM(S) IMPACTED (FOR EXAMPLE: CPCs, ANESTHESIA, NURSING, RADIOLOGY):** Children's Health CPC

**IMPLEMENTATION DATE:** 1/1/2021

**LAST REVISED:** 2/15/2021

**FOR MORE INFORMATION, CONTACT:** Aniruddh Behere or Brittany Barber Garcia

## Clinical pathways clinical approach

### TREATMENT AND MANAGEMENT:

The assessment would start with a PHQ 4 screen for a patient who is 12 years and older. A positive screen would trigger the PHQ 9 screener questions. The PHQ-9 also assesses for suicidality and if that is positive a Columbia Suicide Screen and risk assessment scale should be completed, if positive, a blue envelope should be initiated. If on the PHQ-9 a score of 10 or more than a diagnosis of depression should be considered. It is also important to remember that pediatric patients may present with irritability and or aggression as a symptom of depression. If patient has mild symptoms for about 1 year and have never been symptom free for more than 2 months a diagnosis of dysthymia should also be considered. Further, depressive symptoms due to medical condition, substance abuse, adjustment disorder, bipolar disorder should also be ruled out. It is always important to assess the degree of functional impairment before deciding treatment interventions.

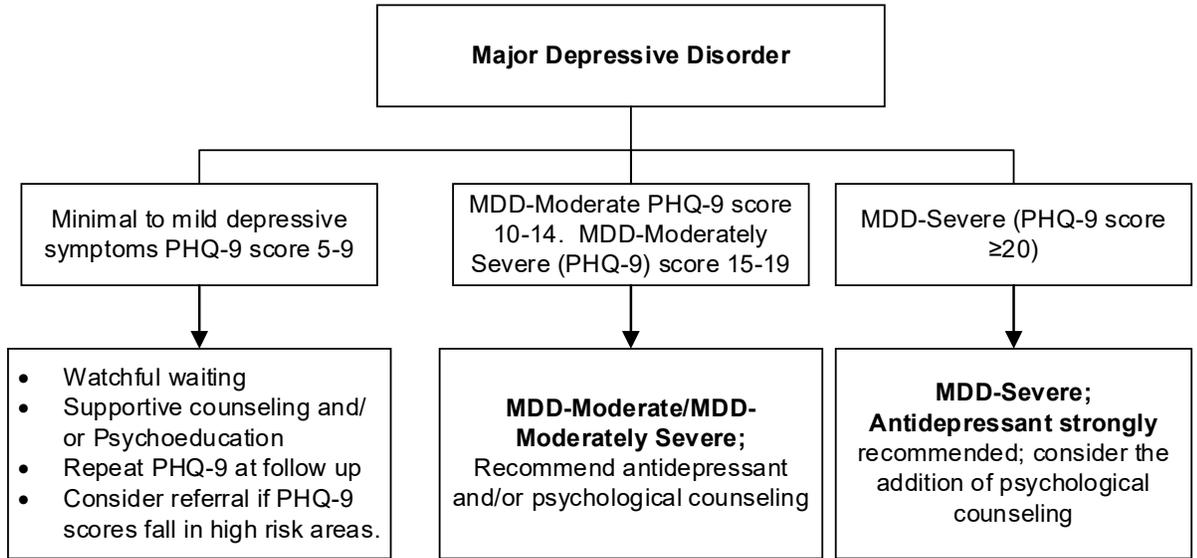
The degree of [major depressive disorder](#) can be divided in to minimal to mild, moderate, severe based on the PHQ score. For minimal to mild category we recommend watchful waiting, psychoeducation, counseling and repeat PHQ 9 at follow-up visit. For moderate severity we recommend therapy and/ or medication. For severe symptoms of depression, we strongly recommend use of antidepressant and counseling.

Initial response to [medication](#) should be assessed at 4-6 weeks using the PHQ-9. If patient achieves remission medication should be continued for about 9 months before slowly tapering off. If patient does not achieve remission medication adjustment and stepped-up care are recommended. For population with higher risk for recurrence we would recommend continuation of pharmacotherapy and reassessment. Once the diagnosis is made and the need for medication is ascertained we recommend starting with a SSRI agent. Response should be assessed at 4-6 weeks. If there is no response, consider checking compliance and making sure the dose is optimized. If further, there is no response recommend switching to another SSRI but maintaining the same class of medication. Subsequently, if there is no response, we

recommend switching class of medication to either as a SNRI, bupropion or mirtazapine. If there is partial response, we recommend either augmenting with bupropion, mirtazapine or aripiprazole or alternatively switching to another class including SNRI, bupropion or mirtazapine. If there is no adequate response, we recommend reconsidering diagnosis and possibly referral to Psychiatry.

### Acute Phase

Acute Phase (6-12 weeks after Dx)  
Contact (telephone or in person, by Behavioral Health Specialist or member of care team) should occur 1 week after diagnosis and/or initiation of treatment, and then every 2-4 weeks until there is remission or response.

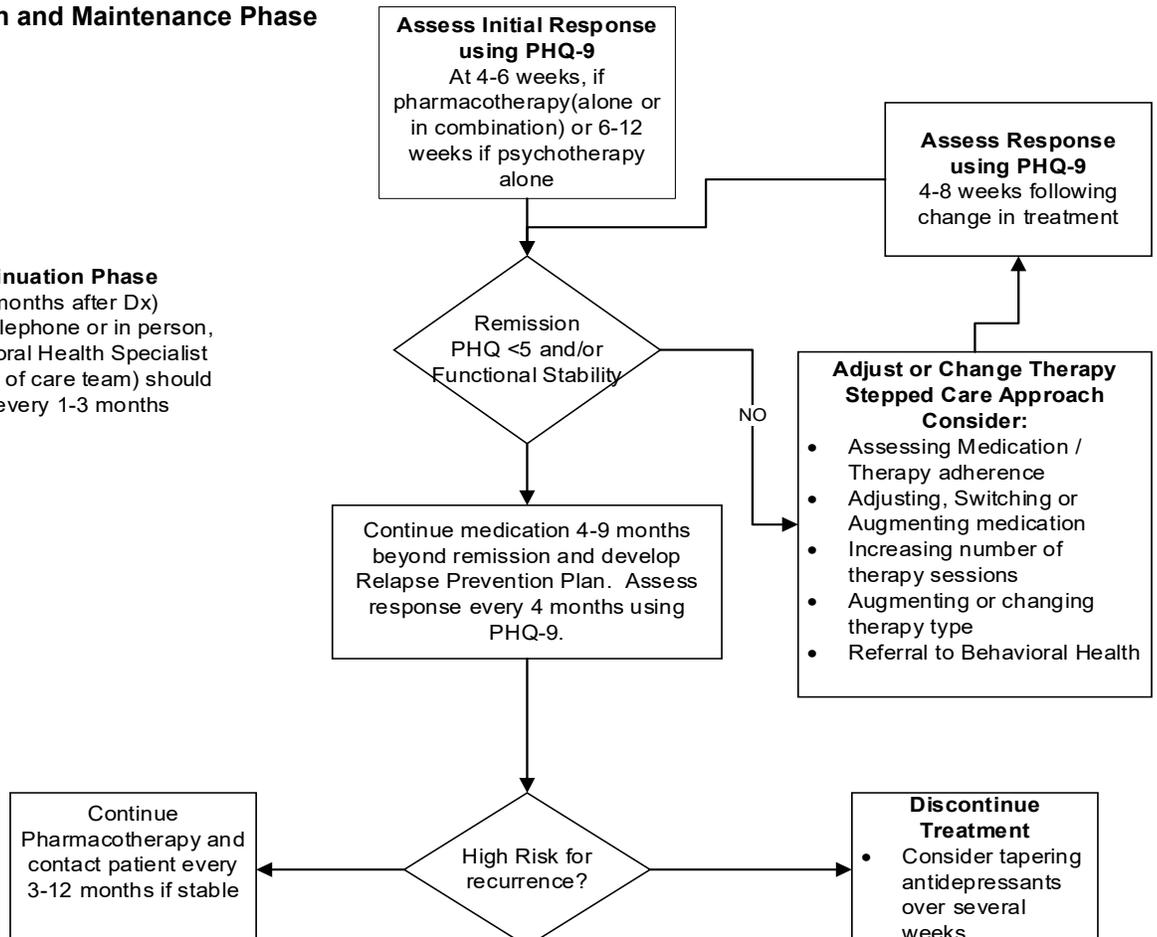


**Consider referral to Behavioral Health at any time, especially if:**

- Possibility of bipolar disorder
- Psychiatric co-morbidity (i.e., substance abuse, anxiety, OCD, eating disorder)
- Concern regarding the possibility of suicide and/or homicide
- Psychosis with depression
- No improvement with medications despite multiple dose adjustments and trials of different medication classes
- Significant or prolonged inability to work and care for self and/or family
- Diagnostic uncertainty

### Continuation and Maintenance Phase

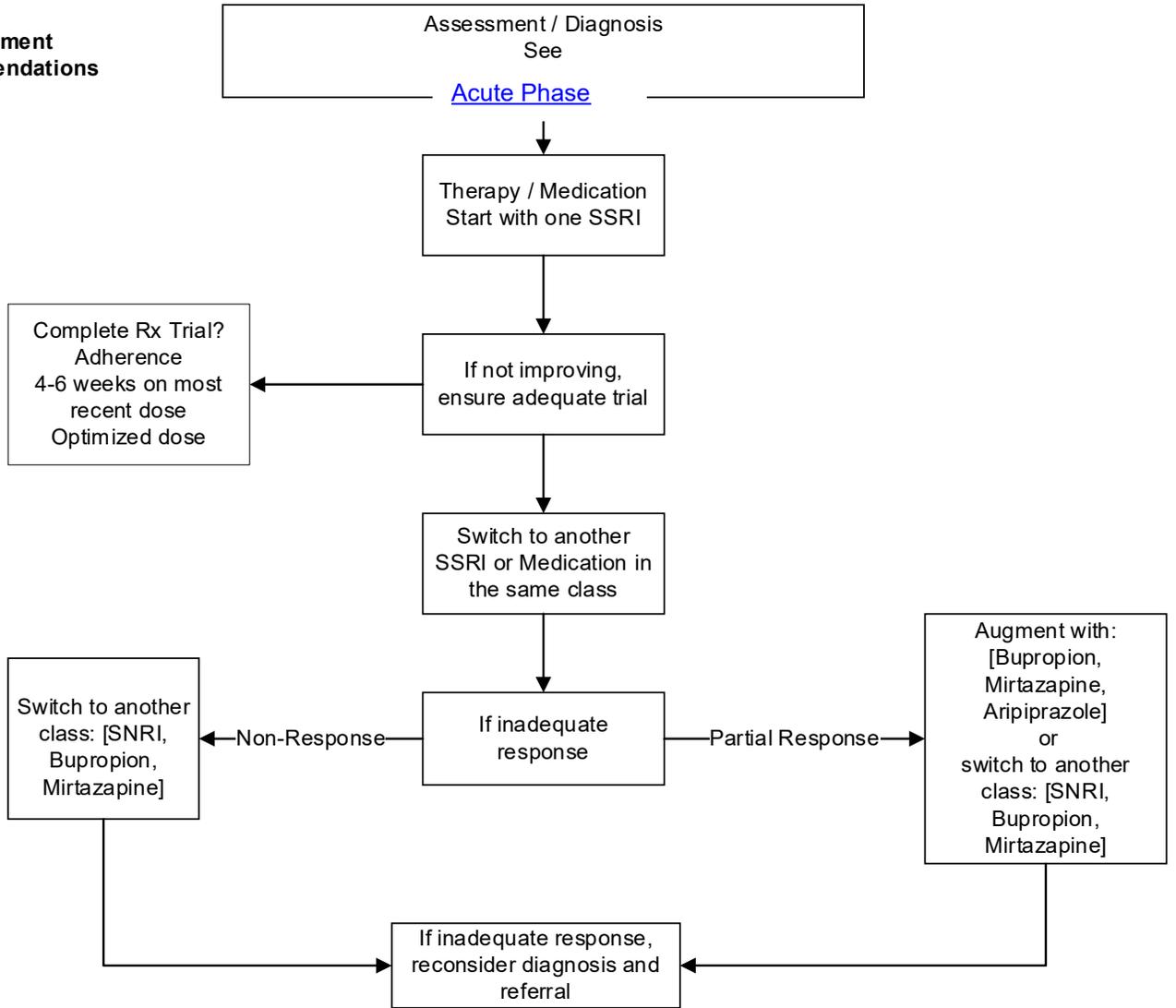
**Continuation Phase**  
(4-9 months after Dx)  
Contact (telephone or in person, by Behavioral Health Specialist or member of care team) should occur every 1-3 months



**Maintenance Phase**

# Treatment Recommendations

## Treatment Recommendations



## Medication Dosing and Recommendations

Medication	Starting Dose	Dose Increments	Typical Target dose	Maximum dose	Typical side-effects
<b>Selective Serotonin Reuptake Inhibitors (SSRI)</b>					
Fluoxetine (FDA Approved >8yrs) (Qam)	5-10mg	10mg	10-20mg in pre-teens 20-40mg in teens	60mg	Nausea, sleep disturbances, sexual disturbance, appetite changes, headache, dry mouth
Escitalopram (FDA Approved >12yrs) (Qday)	2.5-5mg	2.5-5mg	10-20mg	20mg	
Sertraline (Qday)	12.5-25mg	25-50mg	50-100mg	200mg	
Citalopram (Qday)	5-10mg	10mg	20-40mg	40mg	
Paroxetine (Qday)	5-10mg	10mg	10-20mg	40mg	
<b>Serotonin and Norepinephrine Reuptake Inhibitors (SNRI)</b>					
Duloxetine (Qday-BID)	20-30mg	20-30mg	60-90mg	120mg	Similar to SSRI, hypertension, tachycardia. Slow wean off venlafaxine due to discontinuation syndrome.
Venlafaxine (BID-TID)	12.5mg	12.5-25mg	75-150mg	225mg	
Venlafaxine XR (Qday)	37.5mg	37.5mg	75-150mg	225mg	
<b>Other Class</b>					
Bupropion (BID-TID)	37.5-75mg	75-150mg	150-300mg	450mg	Appetite suppression, nausea, anxiety, difficulty sleeping, risk of seizures
Bupropion SR (BID)	100mg	50-100mg	150-300mg	400mg	
Bupropion XL (Qam)	150mg	150mg	300mg	450mg	
Mirtazapine (QHS)	7.5-15mg	15mg	30mg	45mg	Drowsiness, weight gain, hypercholesterolemia
<b>Antipsychotics</b>					
Aripiprazole (Qday)	1-2.5mg	2-2.5mg	5-10mg	30mg	Weight gain, dyslipidemia, sedation

## Guidelines for Monitoring Side-Effects of Antipsychotic Medications

Guidelines for Monitoring Side-effects of Antipsychotic Medications	
Parameters	Recommendations
Personal and family history	Annually
Lifestyle behaviors	Each visit
Height, weight, BMI	Each visit
BP, fasting blood sugar & lipids	Baseline, 3mts and then every 6mths

## Frequently Asked Questions?

**1. Is there a preferred SSRI for depression?**

*In children and adolescents, fluoxetine (>8 yrs) and escitalopram (>12 yrs) are approved by FDA for treating depression. Typically, fluoxetine tends to be more activating and may not be the first choice in someone with comorbid anxiety as it can heighten symptoms of anxiety.*

**2. What are the most common side-effects to monitor for after initiating a SSRI?**

*Typical side-effects include headache, upset stomach, diarrhea and nausea. These tend to improve within the first few days. Citalopram should not be given above 40mg due to risk for arrhythmias. Sertraline may induce tics due to its action on dopamine. SSRIs may also induce easy bruising due to its effect on platelets.*

**3. Can SSRIs induce mania? Is there a better medication for someone with suspected bipolar disorder?**

*There is a very slim risk of inducing drug induced mania with SSRIs. The risk maybe be greater in someone with a predisposition for bipolar disorder. Bupropion has a lower risk of causing mania in someone with a predisposition for bipolar disorder.*

**4. With comorbid anxiety/ depression/ ADHD which should be treated first?**

*Typically, the symptom or diagnosis with the greatest dysfunction should be treated first.*

**5. Is there a safer SSRI in pregnant patients?**

*SSRIs should be used with caution in pregnant patients. Risk vs benefits especially in the first trimester should be considered carefully and medication may be restarted in the 2<sup>nd</sup> or 3<sup>rd</sup> trimester.*

**6. Is regular blood work required for someone who is on an anti-depressant?**

*Regular blood work is not indicated either while initiating medication or during treatment.*

**7. What medications can be used for sleep problems?**

*Sleep disorder maybe related to underlying depression but should be further investigated as indicated. Typically, melatonin either ir or er should be trialed first. Subsequently hydroxyzine 25-50mg or trazodone 25-50mg or mirtazapine 7.5-15mg can be used. In case of treatment resistant depression trazodone may lead to more dysphoria and should be used with caution.*

**8. Is Genesight testing helpful?**

*Current evidence is mixed regarding the usefulness of Genesight testing. It may be considered in a patient with treatment resistant depression, poor tolerance to medications. It's also important to interpret the results correctly and columns with yellow and red are not necessarily contraindications to use. No specific guidelines exist that recommended Genesight testing while initiating treatment.*

**9. Are medications effective alone or should the patient be referred for therapy?**

*Repeated studies have shown that greatest response to treatment is seen with a combination of cognitive behavior therapy and medication. Either of these treatments by themselves may be less effective.*

**10. Do the medications need to be taken life long?**

*Current recommendations state that medications may be weaned off slowly after the patient has been stable on a medication regimen for about 9-12mths.*

**11. Is there a way to access psychiatry for urgent questions?**

*Spectrum Health Peds Behavior Health can be reached via perfectserve or by calling HDVCH direct for over the phone consultations/ questions. You may also reach the office directly by calling 616-267-2830.*

## 12. Should I be concerned about the Black Box warning?

*Pooled data has shown increased suicidal behaviors/ thoughts in 3.5% cases vs 2% placebo group. It is important to discuss risk for changes in mood and behavior after starting medications. FDA recommends weekly contact for the 1<sup>st</sup> week, every 2 weeks contact through week 12 and then as indicated.*

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