Bipolar Disorder: Maintenance Therapy with Mood Stabilizers in the Outpatient Setting

All patients with bipolar disorder (I or II) as well as other specified bipolar disorder should be on maintenance therapy\(^1\) (the earlier in the course of illness the better)\(^2\)

- Goals: symptom reduction, prevention of acute mood episodes, suicide risk and attempt reduction, psychosocial function improvement, reduced violent behavior
- Concomitant psychotherapy (individual or group) is encouraged to help prevent relapse and promote medication adherence
- First-line: maintain on regimen that successfully treated an acute mood episode\(^3\)
- Pharmacotherapy should be chosen via a shared decision making approach between the clinician and the patient based on prior trial and/or success with specific medications, patient comorbidities, values, and preferences
  - Lithium, anticonvulsants, second generation antipsychotics (table on back of this page)
- Treatment resistant or refractory patients
  - Electroconvulsive therapy: no absolute contraindications
  - Clozapine: associated with metabolic syndrome, agranulocytosis – must do CBC every 1-4 weeks
    - Baseline testing: WBC count, absolute neutrophil count, weight, glucose, lipids, BP, prolactin, pregnancy
  - Benzodiazepines (clonazepam, lorazepam): maintenance therapy for patients with catatonia that remits with benzodiazepine use; does not have to be indefinite; can do a benzodiazepine taper over time

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<table>
<thead>
<tr>
<th>Stabilizer</th>
<th>Baseline testing</th>
<th>Side effects</th>
<th>Starting dose</th>
<th>Target serum level</th>
<th>Surveillance</th>
<th>Associated risks</th>
<th>Avoid with</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lithium</td>
<td>Urinalysis, BUN, Cr, thyroid function, Ca, CBC, electrolytes, pregnancy, EKG</td>
<td>Nausea, tremor, polyuria, polydipsia, weight gain, loose stools</td>
<td>300 mg BID or TID</td>
<td>0.8-1.2 mEq/L; Measure level 5-7 days after dose change 12 hrs after last dose usually in morning</td>
<td>Lithium level every 6-12 mos; Urinalysis, BUN, Cr every 2-3 mos during first 6 mos and every 6-12 mos after; Thyroid function 1-2x during first 6 mos and every 6-12 mos after; Ca yearly</td>
<td>Arrhythmia, renal impairment, thyroid impairment, cognitive impairment</td>
<td>Renal disease</td>
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<tr>
<td>Valproic acid</td>
<td>LFTs, CBC, electrolytes, PT, pregnancy</td>
<td>Weight gain, nausea, vomiting, hair loss, bruising, tremor</td>
<td>250 mg BID or TID</td>
<td>50-125 mcg/mL (most effective level is 80-125 mcg/mL); Measure level 2-5 days after dose increase 8-12 hrs after last dose usually in morning</td>
<td>LFTs, platelets, serum valproic acid level every 6-12 mos</td>
<td>Suicidality, liver failure, thrombocytopenia, pancreatitis</td>
<td>Liver disease, pregnancy</td>
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<tr>
<td>Carbamazepine</td>
<td>Screen for HLA-B*1502 allele in Asians, CBC, LFTs, electrolytes, BUN, Cr, urinalysis, pregnancy, thyroid function</td>
<td>Nausea, vomiting, diarrhea, hyponatremia, rash, pruritus, fluid retention</td>
<td>100-200 mg daily or BID</td>
<td>4-12 mcg/mL (most effective level is 8-12 mcg/mL)</td>
<td>Monitor for rash in first 8 weeks, LFTs, CBC, Na, serum carbamazepine level every 6-12 mos</td>
<td>Suicidality, leukopenia, Stevens-Johnson syndrome, toxic epidermal necrolysis, liver enzyme induction</td>
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<tr>
<td>Aripiprazole</td>
<td>Weight, waist circumference, BP, glucose, lipids, EKG, prolactin, pregnancy</td>
<td>Extrapyramidal signs, headache, nausea, vomiting, constipation, insomnia, akathisia</td>
<td>10-30 mg daily</td>
<td></td>
<td></td>
<td>Extrapyramidal sign sensitivity</td>
<td></td>
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<tr>
<td>Risperidone</td>
<td>Weight, waist circumference, BP, glucose, lipids, EKG, prolactin, pregnancy</td>
<td>Weight gain, glucose intolerance, diabetes, hyperlipidemia, extrapyramidal signs, prolactin elevation, akathisia, sedation, dyspepsia, nausea</td>
<td>1-2 mg daily or divided into 2 doses</td>
<td></td>
<td>Weight at 4, 8, 12 weeks and then quarterly; waist circumference, BP, and glucose, at 12 weeks and then annually; lipids at 12 weeks and then at least every 5 years</td>
<td>Extra-pyramidal sign sensitivity</td>
<td></td>
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<tr>
<td>Olanzapine</td>
<td>Weight, waist circumference, BP, glucose, lipids, EKG, prolactin, pregnancy</td>
<td>Weight gain, glucose intolerance, diabetes, hyperlipidemia, extrapyramidal signs, sedation, constipation, dry mouth, orthostatic hypotension</td>
<td>10-15 mg daily or divided into 2 doses</td>
<td></td>
<td>Weight at 4, 8, 12 weeks and then quarterly; waist circumference, BP, and glucose, at 12 weeks and then annually; lipids at 12 weeks and then at least every 5 years</td>
<td>Obesity</td>
<td></td>
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<tr>
<td>Quetiapine</td>
<td>Weight, waist circumference, BP, glucose, lipids, EKG, prolactin, pregnancy</td>
<td>Weight gain, glucose intolerance, diabetes, hyperlipidemia, headache, dry mouth, constipation, sedation, dizziness, orthostatic hypotension</td>
<td>100-200 mg daily or divided into 2 doses</td>
<td></td>
<td>Weight at 4, 8, 12 weeks and then quarterly; waist circumference, BP, and glucose, at 12 weeks and then annually; lipids at 4, 12 weeks and then at least every 5 years</td>
<td>Obesity</td>
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