# **QUETIAPINE** (Seroquel) Fact Sheet [G]

## **BOTTOM LINE:**

Lower risk for EPS and a broad spectrum of efficacy make this an appealing first-choice agent. However, sedation, weight gain, and orthostasis may limit use. Dosing at bedtime, or switching to XR, may help reduce daytime sedation.

#### **PEDIATRIC FDA INDICATIONS:**

Schizophrenia (13–17 years); bipolar mania (10–17 years).

#### **ADULT FDA INDICATIONS:**

Schizophrenia; bipolar, manic/mixed; bipolar I or II depression; maintenance treatment for bipolar; major depression, as adjunct.

## **OFF-LABEL USES:**

Insomnia; anxiety disorders; behavioral disturbances; impulse control disorders.

#### **DOSAGE FORMS:**

- Tablets (G): 25 mg, 50 mg, 100 mg, 200 mg, 300 mg, 400 mg.
- ER tablets (G): 50 mg, 150 mg, 200 mg, 300 mg, 400 mg.

#### **PEDIATRIC DOSAGE GUIDANCE:**

- Adolescents: Start 25 mg BID or 50 mg XR QHS, ↑ dose by 50–100 mg/day increments every one to four days to target/ max dose 400–600 mg/day (mania) or 400–800 mg/day (schizophrenia).
- Max dose for <9 years: 400 mg/day.</li>

**MONITORING:** Prolactin if symptoms, lipids, glucose, BP, weight, waist circumference, abnormal movements.

#### COST: \$

#### SIDE EFFECTS:

- Most common: Somnolence, hypotension, dry mouth, dizziness, weight gain, increased appetite, fatigue, nausea, vomiting, tachycardia, EPS, abnormal movements.
- Serious but rare: Increases in BP occurred in pediatric studies vs orthostasis in adults (15% had systolic elevation >20 mmHg and 40% had diastolic elevation >10 mmHg).

## **MECHANISM, PHARMACOKINETICS, AND DRUG INTERACTIONS:**

- Dopamine D2 and serotonin 5HT2A receptor antagonist.
- Metabolized by CYP3A4; t ½: 6 hours (ER: 7 hours).
- Avoid or use caution with agents that may cause additional orthostasis. CYP3A4 inducers (eg, carbamazepine) may lower quetiapine levels; CYP3A4 inhibitors (eg, erythromycin, ketoconazole) may increase quetiapine levels. Adjust quetiapine dose in presence of CYP3A4 inducers or inhibitors.

# **EVIDENCE AND CLINICAL PEARLS:**

- A six-week randomized controlled trial in 220 adolescents with schizophrenia found quetiapine was significantly more effective than placebo at reducing psychotic symptoms.
- A three-week randomized trial in 277 kids (ages 10–17) with bipolar disorder found significantly higher remission rates with quetiapine compared to placebo.
- A four-week randomized trial in 50 kids (ages 12-18) with bipolar disorder found significantly higher remission rates with quetiapine than divalproex.
- A study in bipolar depression in kids (ages 10–17) did not find quetiapine XR more effective than placebo. Two open-label studies in autism did not find it to be effective either.
- Swallow XR tablet whole; do not break, crush, or chew; switch between IR and XR at the same total daily dose; dose adjustments may be necessary based on response and tolerability.
- If patient discontinues drug >1 week, retitrate dose as with initial therapy.
- Quetiapine abuse has been reported, particularly in incarcerated adult populations.
- Nearly 20% of children gained >7% of body weight (adjusted for usual growth) after 26 weeks of guetiapine.

## **FUN FACT:**

Cataracts developed in initial studies with beagle dogs; human studies have not shown an association. However, the label still recommends a slit-lamp exam every six months.



