**Paracetamol**

**Class:** Analgesic, Miscellaneous

**Indications:** Treatment of mild-to-moderate pain and fever (analgesic/antipyretic)

I.V.: Additional indication: Management of moderate-to-severe pain when combined with opioid analgesia

**Available dosage form in the hospital:** Tablet, oral: 500 mg.
Suspension, oral: 120 mg/5 mL, 125 mg/5 mL, 250 mg/5 mL.
Suppository, rectal: 120 mg, 125 mg, 250 mg.
Injection, solution: 1 g, 2 g.

**Dosage Note:** No dose adjustment required if converting between different acetaminophen formulations. Limit acetaminophen dose from all sources (prescription and OTC) to <4 g daily.

**Pain or fever:**

- **Oral:** OTC dosing recommendations may vary by product and/or manufacturer.
  - Regular release: 325-650 mg every 4-6 hours or 1000 mg 3-4 times daily (maximum: 4 g daily)
  - Extended release: 1300 mg every 8 hours (maximum: 3.9 g daily)

- **Rectal:** 325-650 mg every 4-6 hours or 1000 mg 3-4 times daily (maximum: 4 g daily)

- **I.V.:**
  - <50 kg: 15 mg/kg every 6 hours or 12.5 mg/kg every 4 hours; maximum single dose: 750 mg/dose; maximum daily dose: 75 mg/kg/day (≤3.75 g daily)
  - ≥50 kg: 650 mg every 4 hours or 1000 mg every 6 hours; maximum single dose: 1000 mg/dose; maximum daily dose: 4 g daily

**Renal Impairment:**

- Oral (Aronoff, 2007):
  - Clcr 10-50 mL/minute: Administer every 6 hours.
  - Clcr <10 mL/minute: Administer every 8 hours.
  - Intermittent hemodialysis or peritoneal dialysis: No adjustment necessary.
  - CRRT: Administer every 8 hours.

- I.V.: Clcr ≤30 mL/minute: Use with caution; consider decreasing daily dose and extending dosing interval.
**Hepatic Impairment:**

- Oral: Use with caution. Limited, low-dose therapy is usually well tolerated in hepatic disease/cirrhosis. However, cases of hepatotoxicity at daily acetaminophen dosages <4 g daily have been reported. Avoid chronic use in hepatic impairment.

- I.V.: Mild-to-moderate impairment: Use with caution in hepatic impairment or active liver disease; manufacturer’s labeling suggests a reduced total daily dosage may be warranted, although no specific dosage adjustments are provided.

  Severe impairment: Use is contraindicated.

**Common side effects:** **Oral, Rectal:** Frequency not defined:

- Dermatologic: Rash
- Endocrine & metabolic: May increase chloride, uric acid, glucose; may decrease sodium, bicarbonate, calcium
- Hematologic: Anemia, blood dyscrasias (neutropenia, pancytopenia, leukopenia)
- Hepatic: Bilirubin increased, alkaline phosphatase increased
- Renal: Ammonia increased, nephrotoxicity with chronic overdose, analgesic nephropathy
- Miscellaneous: Hypersensitivity reactions (rare)

**I.V.:**

- Gastrointestinal: Nausea (adults 34%; children ≥5%), vomiting (adults 15%; children ≥5%)

**Pregnancy Risk Factor:** C (intravenous)