

# Nifedipine Extended Release

(Adalat XL)

**Indication(s):** High Altitude Illness Protocol (High Altitude Pulmonary Edema)

**Contraindications:** Hypersensitivity to nifedipine or history of severe hypotension. Extended-release formulations of nifedipine should not be used in patients with GI obstructive disorders.

**Precautions:** Although generally well tolerated, severe hypotension may occur and must be monitored. All CCBs are excreted in maternal milk in significant concentrations. Risk vs benefit should be considered when deciding whether or not to discontinue nursing or discontinue the drug.

**Drug Interactions:** Azole Antifungals (e.g., fluconazole, itraconazole) can increase the effect of CCBs (Monitor/Consider ↓ CCB dose). Concomitant use with benzodiazepines (e.g. alprazolam, midazolam, triazolam) may enhance the effect of benzodiazepines (Monitor/Consider ↓ benzodiazepine dose). CCBs may have an additive sedative effect if combined with alcohol (Avoid if possible/ Monitor).

**Adverse effects:** (≥1%) Pedal, peripheral or facial edema (2–30%); headache (2–16%); weight gain and/or increased appetite (15%); dizziness (2–11%); flushing (2–8%); constipation (2–7%); fatigue (4–6%) nausea (2–5%). (<1%) Tinnitus; gingival hyperplasia; rash; increased sweating; chills; photosensitivity reaction; urticaria; pruritus and hair loss.

**Pharmacology:** Nifedipine is a peripheral arterial vasodilator which acts directly on vascular smooth muscle. It binds to voltage-dependent channels and inhibits calcium influx resulting in vasodilation, decreased peripheral vascular resistance and reduced arterial blood pressure.

**Dosage and Administration:** In cases of HAPE, Nifedipine XL 30mg PO q 12-24hrs. Monitor Blood Pressure. Contact a HMA as soon as practical. Avoid grapefruit in patients taking these drugs.

## **Dosage and Administration:**

**Pain Management – Children:** Ondansetron 2 to 4mg PO or 0.1mg/kg IV, q 8hr prn. Adults: Ondansetron 8mg PO/IV/IM q 8hr prn.

**Gastroenteritis – Ondansetron 8mg PO/IV/IM q 8hr prn.**

**Acute Mountain Sickness – 4mgIV/IM or 8mg PO BID for nausea.**