

CALCIUM CHLORIDE (generic)

ACTION: Electrolyte modifier; essential for the transmission of nerve impulses in cardiac muscle contraction

INDICATIONS:

1. Symptomatic hyperkalemia
2. Hypocalcaemia, especially from acute causes such as Hydrofluoric acid or fluorine gas exposure
3. Calcium channel blocker overdose or toxicity; including: verapamil (Calan, Isoptin), diltiazem (Cardizem), nifedipine (Procardia, Adalat), nicardipine (Cardene, Vasonase), nimodipine (Nimotop), amlodipine, felodipine, flunarizine, bepridil, isradipine, nisoldapine, nitrendapine
4. Respiratory depression following administration of magnesium sulfate

CONTRAINDICATIONS:

1. Not to be used during resuscitation unless hyperkalemia, hypocalcaemia, or calcium channel blocker toxicity has been proven.

PRECAUTIONS:

1. Rapid administration of calcium in a beating heart may produce slowing of the cardiac rate.
2. Patients taking digitalis may have increased ventricular irritability and calcium may produce digitalis toxicity.
3. In the presence of sodium bicarbonate, it will precipitate calcium salts or carbonates.
4. Do not give to any patient without Medical Control Physician order.

ADVERSE REACTIONS/SIDE EFFECTS:

1. Syncope
2. Arrhythmias, bradycardia, and cardiac arrest
3. Tissue necrosis at injection site

ADMINISTRATION:

1. Obtain physician order for all indications.
2. Dosage in adults: 500-1000 mg of 10% solution (1.0 ml = 100 mg).
3. Administer over 2-5 minutes in a critical situation.

PEDIATRIC CONSIDERATIONS:

1. Do not give to patients < 12 years without physician order.
2. Initial dose is 0.2 ml/kg (20 mg/kg) *slowly* IV or IO. Repeat doses for peds are not recommended.

SPECIAL NOTES:

1. If infiltration occurs, notify physician at receiving hospital immediately upon arrival so that antidotal therapy can begin immediately.