Indications

1. An IV access is not available or can't be obtained
2. Need for rapid medication administration:
    a. Reversal of opiate sedation
    b. Need for rapid cessation of seizure
    c. Need for sedation
    d. Need for pain relief

Precautions

1. Know the adverse reaction profile of the drugs that are approved for atomization.
2. Drugs approved for atomization:
    a. Naloxone (Narcan)
    b. Midazolam (Versed)
    c. Fentanyl (Sublimaze)
    d. Glucagon
3. Know what medication allergies the patient has.
4. Understand that this method of drug administration is more effective in pediatric patients than in adult patients.

Technique

1. Draw up the appropriate volume for the weight of medication to be given.
2. Pediatric (12 y. o. or younger) dosing
    a. naloxone 0.01 – 0.02 mg/kg
    b. midazolam 0.1 – 0.2 mg/kg
    c. fentanyl 2 – 10 mcg/kg
    d. glucagon 1 mg
3. Adult dosing has only been studied for glucagon.
    a. glucagon 2 mg atomized
    b. for the other meds use their standard IV doses
4. Attach syringe to the end of the mucosal atomization device (MAD).

5. Place device at nostril and slowly depress the syringe plunger.
6. If possible, the dose should be divided between the two nostrils. No more than 0.5ml should be given in one nostril at a time.

Notes

1. You may be unable to deliver the medication due to injury or malformation of the nostril. Try the other one.
2. Depressing syringe too rapidly can cause problems with administration. A smooth, moderate speed push works best.
3. Repeat doses should alternate nostrils to allow for better absorption.
4. May cause epistaxis (nose bleed).