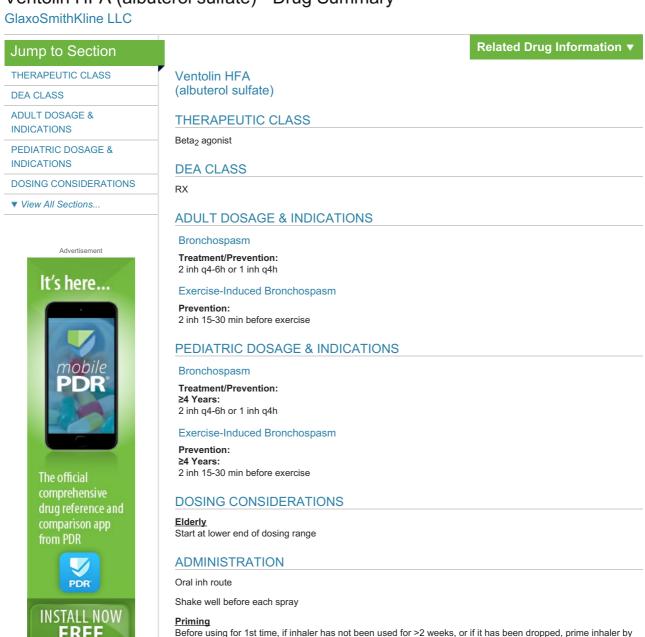


# Ventolin HFA (albuterol sulfate) - Drug Summary



**HOW SUPPLIED** 

MDI: 90mcg of albuterol base/inh [60, 200 inhalations]

# WARNINGS/PRECAUTIONS

releasing 4 sprays into air, away from face Refer to PI for further instructions on proper use

D/C if paradoxical bronchospasm following dosing or if cardiovascular (CV) effects occur. More doses than usual may be a marker of destabilization of asthma and may require reevaluation of the patient and treatment regimen; give special consideration to the possible need for anti-inflammatory treatment (eg, corticosteroids). ECG

changes and immediate hypersensitivity reactions, including anaphylaxis, may occur. Fatalities reported with excessive use. Caution with CV disorders (eg, coronary insufficiency, arrhythmias, HTN), convulsive disorders, hyperthyroidism, diabetes mellitus (DM), and in patients unusually responsive to sympathomimetic amines. Large doses of IV albuterol reported to aggravate preexisting DM and ketoacidosis. May cause significant hypokalemia. Caution in elderly.

## **ADVERSE REACTIONS**

Throat irritation, viral respiratory infections, upper respiratory inflammation, cough, musculoskeletal pain.

# **DRUG INTERACTIONS**

Avoid with other short-acting sympathomimetic aerosol bronchodilators; caution with additional adrenergic drugs administered by any route. Use with  $\beta$ -blockers may block pulmonary effects and produce severe bronchospasm in asthmatic patients; avoid concomitant use. If needed, consider cardioselective  $\beta$ -blockers and use with caution. ECG changes and/or hypokalemia caused by non-K<sup>+</sup>-sparing diuretics (eg, loop, thiazide diuretics) may be worsened. May decrease serum digoxin levels. Use extreme caution with MAOIs and TCAs, or within 2 weeks of discontinuation of such agents.

#### PREGNANCY AND LACTATION

Category C, not for use in nursing.

#### **MECHANISM OF ACTION**

 $\beta_2$ -agonist; activates  $\beta_2$ -adrenergic receptors on airway smooth muscle, leading to the activation of adenylcyclase and to an increase in the intracellular cAMP. Increased cAMP leads to the activation of protein kinase A, which inhibits the phosphorylation of myosin and lowers intracellular ionic Ca $^{2+}$  concentrations, resulting in relaxation of the smooth muscles of all airways, from the trachea to the terminal bronchioles.

#### **PHARMACOKINETICS**

**Absorption:** C<sub>max</sub>=3ng/mL (1080mcg of albuterol base); T<sub>max</sub>=0.42 hrs. **Elimination:** T<sub>1/2</sub>=4.6 hrs.

# **ASSESSMENT**

Assess for history of hypersensitivity to the drug, CV disorders, convulsive disorders, hyperthyroidism, DM, pregnancy/nursing status, and possible drug interactions. Assess use in patients unusually responsive to sympathomimetic amines.

## **MONITORING**

Monitor for paradoxical bronchospasm, deterioration of asthma, CV effects, ECG changes, hypokalemia, immediate hypersensitivity reactions, and other adverse effects. Monitor BP, HR, and blood glucose levels.

# PATIENT COUNSELING

Counsel not to increase dose/frequency of doses without consulting physician. Advise to seek immediate medical attention if treatment becomes less effective for symptomatic relief, symptoms become worse, and/or there is a need to use the product more frequently than usual. Instruct on how to properly prime, clean, and use inhaler. Instruct to take concurrent inhaled drugs and asthma medications only ud by the physician. Inform of the common adverse effects of treatment. Advise to notify physician if pregnant/nursing. Instruct to avoid spraying in eyes.

# **STORAGE**

 $20-25^{\circ}$ C (68-77°F); excursions permitted to 15-30°C (59-86°F). Store with mouthpiece down. Do not puncture or store near heat or open flame.

Back to top

About Us | Help | Contact Us | Order Books | Report Adverse Events | Privacy Policy | Terms of Service

US-based MDs, DOs, NPs and PAs in full-time patient practice can register for free on PDR.net. PDR.net is to be used only as a reference aid. It is not intended to be a substitute for the exercise of professional judgment. You should confirm the information on the PDR.net site through independent sources and seek other professional guidance in all treatment and diagnosis decisions.

© 2015 PDR. LLC. All rights reserved.

