Tocolytics

Description

Terbutaline

Background
Terbutaline is a beta-adrenergic agonist with preferential effects on the beta-2 receptors resulting in smooth muscle relaxation. It is FDA-approved for the treatment or prophylaxis of bronchospasm associated with asthma, bronchitis and emphysema in patients 12 years old and older (1).

The American Congress of Obstetricians and Gynecologists (ACOG) makes the following recommendations regarding the use of tocolytics in the management of preterm labor (Level A recommendation): There are no clear “first-line” tocolytic drugs to manage preterm labor. Preterm labor is defined as contractions, prior to 37 weeks gestation, with sufficient intensity and frequency to induce progressive softening, effacement and/or dilatation of the cervix (2-3).

Calcium channel blockers and prostaglandin inhibitors are considered experimental / investigational after 72 hours of therapy for tocolysis as is the use of magnesium sulfate for neuroprotection (2-3).

Regulatory Status
FDA approved indications: Terbutaline is indicated for the prevention and reversal of bronchospasm in patients 12 years of age and older with asthma and reversible bronchospasm associated with bronchitis and emphysema (1).
Terbutaline has a boxed warning regarding that terbutaline has not been approved for prolonged tocolysis and should not be used. In particular, do not use terbutaline for maintenance tocolysis in the outpatient or home setting. Serious adverse reactions, including death, have been reported after administration of terbutaline to pregnant women. In mothers, these adverse reactions include increased heart rate, transient hyperglycemia, hypokalemia, cardiac arrhythmias, pulmonary edema, and myocardial ischemia. Increased fetal heart rate and neonatal hypoglycemia may occur as a result of maternal administration (1-3).

Most common maternal adverse effects of terbutaline are headache, nausea, tachycardia and palpitations (1). However, more serious maternal adverse effects that can occur include cardiac or cardiopulmonary arrhythmias, pulmonary edema, myocardial ischemia, hypotension and tachycardia. Further, serious fetal adverse effects including fetal tachycardia, hyperinsulinemia, hyperglycemia, myocardial and septal hypertrophy and myocardial ischemia can also occur as result of terbutaline use in a pregnant woman (1-3).

Tocolytic therapy in an outpatient basis is not a covered benefit by the plan.

Related policies

Policy

This policy statement applies to clinical review performed for pre-service (Prior Approval, Precertification, Advanced Benefit Determination, etc.) and/or post-service claims.

Terbutaline may be considered medically necessary for indications other than preterm labor.

Terbutaline may be considered investigational for tocolysis therapy.

Prior-Approval Requirements

Age 12 years of age or older

Diagnoses Patient must have the following:

Diagnosis other than preterm labor
Prior – Approval **Renewal Requirements**

**Age**
12 years of age or older

**Diagnoses**
Patient must have the following:

Diagnosis *other than* preterm labor

### Policy Guidelines

#### Pre - PA Allowance
None

#### Prior - Approval Limits

**Duration**
12 months

#### Prior – Approval **Renewal Limits**
Same as above

### Rationale

**Summary**
Terbutaline is a beta-adrenergic agonist with preferential effects on the beta-2 receptors resulting in smooth muscle relaxation. It is FDA-approved for the treatment or prophylaxis of bronchospasm associated with asthma, bronchitis and emphysema in patients 12 years old and older (1).

Prior authorization is required for terbutaline to ensure their safe, clinically appropriate and cost effective use of while maintaining optimal therapeutic outcomes.

**References**

Section: Prescription Drugs  Effective Date: January 1, 2020
Subsection: Endocrine and Metabolic Drugs  Original Policy Date: January 13, 2012
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Policy History

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<td>December 2012</td>
<td>Annual editorial review and update.</td>
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<tr>
<td>September 2014</td>
<td>Annual editorial review and update. Addition of FDA boxed warning.</td>
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<tr>
<td>January 2015</td>
<td>Removal of Standard Allowance and the addition of oral terbutaline</td>
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<td>March 2015</td>
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<td>September 2016</td>
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<td>Addition of the statement of tocolytic therapy in an outpatient basis is not a covered benefit by the plan</td>
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<td>Policy number changed from 5.07.06 to 5.30.06</td>
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<td>January 2017</td>
<td>Removal of Magnesium sulfate from criteria</td>
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Keywords

This policy was approved by the FEP® Pharmacy and Medical Policy Committee on December 6, 2019 and is effective on January 1, 2020.