Medical Coverage Policy | Progesterone Therapy as a Technique to Reduce Preterm Birth in High-Risk Pregnancies

Blue Cross Blue Shield of Rhode Island

EFFECTIVE DATE:
POLICY LAST UPDATED: new

OVERVIEW

Preterm birth is the leading cause of neonatal morbidity and mortality, and effective primary preventive interventions have remained elusive. In recent years, there has been renewed interest in the use of progesterone (injectable and intravaginal formulations) to prevent preterm birth. This policy addresses treatment with the use of progesterone (injectable and intravaginal formulations) to prevent preterm birth. This policy is applicable to Blue CHip for Medicare and Commercial products

MEDICAL CRITERIA

Not applicable

PRIOR AUTHORIZATION

Prior authorization review is not required.

POLICY STATEMENT

Progesterone therapy is medically necessary for women with a singleton pregnancy and prior history of spontaneous preterm birth before 37 weeks of gestation or for women with a singleton pregnancy and a short cervix (<20 mm). All other indications are not medically necessary that there is not any peer reviewed scientific evidence to support its efficacy.

Coverage is limited to the compounded formula of progesterone only. The brand name drug is not medically necessary as there is an equivalent compounded formula.

COVERAGE

Benefits may vary between groups and contracts. Please refer to the appropriate Evidence of Coverage, Subscriber Agreement for applicable physician administered drug benefits/coverage.

BACKGROUND

Preterm birth is the leading cause of neonatal morbidity and mortality, and effective primary preventive interventions have remained elusive. In recent years, there has been renewed interest in the use of progesterone (injectable and intravaginal formulations) to prevent preterm birth.
There is sufficient evidence from randomized controlled trials (RCTs) and meta-analyses of RCTs that injectable and vaginal progesterone are associated with improved health outcomes in women with singleton pregnancies who have a history of prior preterm birth. In addition, there is sufficient evidence that progesterone improves health outcomes in women with singleton pregnancies and short cervical length. Thus, progesterone therapy may be considered medically necessary in these situations for selected women who meet clinical criteria.

Preterm labor and delivery are major determinants of neonatal morbidity and mortality. In the United States, the rate of preterm birth is 12%. A variety of diagnostic and prophylactic measures have been investigated including home uterine activity monitoring, subcutaneous terbutaline tocolytic therapy, and routine culture and antibiotic treatment of subclinical bacterial vaginosis. To date, none of these have made a significant

demonstrable impact on the incidence of preterm delivery. In the past, intramuscular (IM) injections of hydroxyprogesterone caproate (ie, Delalutin) were used routinely to prevent premature labor. However, the drug was shown to have teratogenic properties, and FDA labeled the drug as Category D (ie, studies have demonstrated fetal risk, but use of the drug may outweigh the potential risk). Delalutin was voluntarily withdrawn from the market in 1999.
In recent years, there has been renewed research interest in IM injection of 17□ -hydroxyprogesterone caproate (17P). 17P is a weakly acting, naturally occurring progesterone metabolite, which when coupled with caproate dextran works as a long-acting progestin when administered intramuscularly. 17P has been manufactured locally by compounding pharmacies. After an extended application process, Makena®, another injectable form of 17P was approved by FDA in February 2011. Intravaginal progesterone gel and suppositories have also been used.

Progesterone is used for the following indications:
For women with a singleton pregnancy and prior history of spontaneous preterm birth before 37 weeks of gestation, the following may be considered **medically necessary**:

- Weekly injections of 17□ -hydroxyprogesterone caproate, performed in the office setting, initiated between 16 and 20 weeks of gestation and continued until 36 weeks 6 days
- Daily vaginal progesterone between 24 and 34 weeks of gestation
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For women with a singleton pregnancy and a short cervix (<20 mm), the following may be considered **medically necessary**:

- Daily vaginal progesterone initiated between 20 and 23 weeks 6 days of gestation and continued until 36 weeks 6 days

Progesterone therapy as a technique to prevent preterm delivery is considered **investigational** in pregnant women with other risk factors for preterm delivery, including but not limited to:

- twin or multiple gestation;
- prior episode of preterm labor in current pregnancy (ie, progesterone therapy in conjunction with tocolysis or following successful tocolysis);
- positive test for cervicovaginal fetal fibronectin;
- cervical cerclage; and/or
- uterine anomaly.

There is sufficient evidence from randomized controlled trials (RCTs) and meta-analyses of RCTs that injectable and vaginal progesterone are associated with improved health outcomes in women with singleton pregnancies who have a history of prior preterm birth. In addition, there is sufficient evidence that progesterone improves health outcomes in women with singleton pregnancies and short cervical length. Thus, progesterone therapy may be considered medically necessary in the above situations for selected women who meet clinical criteria.

The evidence is insufficient that progesterone is effective for reducing preterm delivery in other situations such as women with twin or multiple gestations, women with preterm rupture of the membranes, or women with a prior episode of preterm labor in the current pregnancy (in conjunction with or following tocolysis) and thus these indications are considered investigational.

CODING

Compound Formula
Claims must be submitted with the unlisted J code and the applicable NDC

The following HCPCS is not medically necessary as this is used for the brand name drug

J1725 - Injection, hydroxyprogesterone caproate, 1 mg (new code effective 01/01/12)

RELATED POLICIES
None

PUBLISHED
August 2015

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