Learn simply

Medically-Indicated Late Preterm and Early Term Delivery

Passion profession same

Optimal timing of birth[1]

- **Preterm (<37 weeks)**
  - **Very preterm (<34 weeks)**
    - Every effort should be made to delay delivery
    - Exclude contraindications to continued expectant management[2]
    - **Consider interventions to optimize neonatal outcome (such as antenatal steroids, magnesium)**[3]
    - See Chapter 54
  - **Late preterm (34–37 weeks)**

    Are any of the following conditions present?
    - Chronic hypertension – poorly controlled (36–37 weeks)
    - Preeclampsia – with severe features (34 weeks)
    - Pregestational diabetes – extremely poorly controlled (34–37 weeks)
    - Gestational diabetes – extremely poorly controlled (37–39 weeks)
    - Preterm premature rupture of membranes (34 weeks)
    - Singleton IUGR with complications (34–37 weeks)[4]
    - Dichorionic/diamniotic twins with IUGR and complications (32–34 weeks)4
    - Monochorionic/diamniotic twins with IUGR (32–34 weeks)
    - Monochorionic/diamniotic twins without complications (34–37 weeks)
    - Monochorionic/monoamniotic twins (32–34 weeks)
    - Twin pregnancy with single fetal death (34–35 weeks)
    - Suspected placenta accreta (34–35 weeks)
    - Fetal congenital malformations with complications[5]
    - Oligohydramnios – isolated and persistent (36–37 weeks)
    - Alloimmunization of pregnancy with known or suspected fetal effects (34–37 weeks)
    - Chorioamnionitis (at diagnosis)

    - **No** → Delay delivery at this time
    - **Yes** → Proceed with delivery
    - **No** → Delay delivery at this time
- **Term (37–42 weeks)**
  - **Early term (37–39 weeks)**

    Are any of the following conditions present?
    - Chronic hypertension – no medications (38–39 weeks)
    - Chronic hypertension – controlled on medications (37–39 weeks)
    - Gestational hypertension (37–38 weeks)
    - Preeclampsia – without severe features (37 weeks)
    - Pregestational diabetes – poorly controlled (37–39 weeks)
    - Pregestational diabetes – with vascular disease (37–39 weeks)
    - Gestational diabetes – poorly controlled (37–39 weeks)
    - Cholestasis / liver disease (36–37 weeks)
    - Singleton IUGR with good testing (38–39 weeks)
    - Dichorionic/diamniotic twins with isolated IUGR (36–37 weeks)
    - Dichorionic/diamniotic twins (38 weeks)
    - HIV infection (38 weeks)
    - Prior high vertical (classical) cesarean (36–37 weeks)
    - Placental abruption
    - Placenta previa (36–37 weeks)
    - Prior full-thickness myomectomy (37–38 weeks)
    - Chorioamnionitis (at diagnosis)
  - **Late term (39–42 weeks)**
    - All else being equal, this is the optimal timing of delivery for mother and fetus
    - Included in this group are pregnancy complications not deemed by ACOG to require preterm delivery[6]
    - Elective delivery is acceptable[7]
- **Post-term (>42 weeks)**
  - See Chapter 51

1. The timely onset of labor and birth is a critical determinant of perinatal outcome. The mean duration of singleton pregnancy is 40 weeks (280 days) dated from the first day of the last menstrual period (LMP). "Term" is defined as two standard deviations from the mean or, more precisely, 37–42 weeks (266–294 days) of gestation.
2. Both preterm birth (defined as delivery prior to 37 0/7 weeks of gestation) and post-term pregnancy (failure to deliver before 42 0/7 weeks) are associated with an increased risk of adverse pregnancy events. However, under certain conditions, earlier delivery may be appropriate for either maternal or fetal indications.
3. Contraindications to continued expectant management <34 weeks include intra-amniotic infection (chorioamnionitis), excessive vaginal bleeding, nonreassuring fetal testing, fetal demise, and select maternal complications (such as severe pulmonary or cardiac disease). Under such conditions, delivery may need to be expedited. Confirmation of fetal lung maturity by amniocentesis is not necessary.
4. Interventions to improve neonatal outcome in the event of impending delivery <34 weeks include: (i) transfer to a tertiary care center; (ii) a course of antenatal corticosteroids (either betamethasone or dexamethasone); and (iii) magnesium sulfate for neuroprotection (proven benefit in improving neurologic outcome if given for a minimum of 12 hours in women delivering <32 weeks).

1. Complications include oligohydramnios, abnormal Doppler studies, and/or co-morbid conditions in the mother (such as chronic hypertension or preeclampsia).

2. Complications may include suspected worsening fetal organ damage, potential for fetal intracranial hemorrhage (such as neonatal alloimmune thrombocytopenia), prior fetal surgery or urgent need for neonatal surgery, and/or potential for adverse maternal effects from fetal condition.

3. Pregnancy complications not deemed by ACOG to require preterm delivery include well-controlled pregestational or gestational diabetes (whether or not they are on medications), prior unexplained stillbirth, morbid obesity (BMI >40 kg/m2) and advanced maternal age.

1. According to ACOG, elective induction of labor at or after 39-0/7 weeks is a reasonable option in a well-dated pregnancy without documenting fetal lung maturity by amniocentesis.
2. In HIV-positive women and twins, elective delivery can be performed at 38-0/7 weeks. The risk of failed induction leading to cesarean delivery should be discussed.
3. In nulliparous patients with an unfavorable cervical exam (Bishop score <6), the risk of cesarean is clearly increased. Whether this is true also in multiparous women or nulliparous women with a favorable cervical exam is not clear.