**Algorithm: Infant Hip Dysplasia (0-3 months of age)**

**Suspected hip dysplasia**

- **YES**: Child age <2 weeks
  - YES: Re-examine hips at 2 weeks of age
    - If exam remains abnormal: refer to Ortho
    - If exam is normal: screen with hip US at 4-6 weeks
  - NO: Refer to Ortho
- **NO**: Abnormal physical exam?
  - **YES**: Refer to Ortho
  - **NO**: Screening US abnormal? **

*Hip dysplasia risk factors*
- Breech presentation
- Family history of hip dysplasia
- Improper swaddling
- Suspicious or inconclusive exam

**Abnormal physical exam**
- Limited hip abduction (unilateral or bilateral)
- Positive Galeazzi sign (leg appears short in flexion)
- Positive Ortolani sign (reduces in abduction)
- Positive Barlow maneuver (dislocates in adduction)

**Physiologic Immaturity**
- Age 4-8 weeks
  - Alpha angle ≥50° and Femoral head coverage ≥35%
  - Repeat hip US at 12 weeks of age
  - US at 12 weeks of age normal? **
    - **YES**: Refer to Ortho for treatment
    - **NO**: US at 12 weeks of age normal? **

**Hip Dysplasia**
- Age 4-8 weeks
  - Alpha angle <50° or Femoral head coverage <35%
  - Refer to Ortho for treatment

**Ultrasound**: Obtain screening hip US at 6 weeks of age. If <37 weeks term, screen at corrected age. (As a reminder: US preferred up to 4 months; after 4 months of age, x-ray is normally recommended.)

**Normal hip US metrics**: Alpha angle ≥60°, Femoral head coverage >50%
What about hip clicks?
- "Hip clicks" without sensation of hip instability are clinically insignificant
- An Ortolani sign represents a "clunk" as the femoral head reduces into the acetabulum
- Isolated high-pitched "clicks" represent the movement of soft tissues over bony prominences and are not a sign of hip dysplasia or instability
- If in doubt, screen with hip US <4 months or an AP pelvis x-ray if over 4 months of age

Normal Acetabular Index**
- 6 months: <30 degrees
- 12 months: <28 degrees
- 24 months: <24 degrees

Borderline/Mild Dysplasia**
- No treatment usually needed.
- Repeat imaging in 6-12 months.
- Upload images to Seattle Children’s Radiology and email us at hipteam@seattlechildrens.org. We will review imaging and advise whether follow-up or referral is needed.

Dysplasia**
- May be indicated for treatment.
- Refer to Ortho
- Upload images to Seattle Children’s Radiology and email hipteam@seattlechildrens.org to review imaging and/or assist follow-up timing.

Algorithm: Infant Hip Dysplasia (4-24 months of age)

Suspected hip dysplasia*
- Obtain AP pelvis x-ray
- Hip dislocation or subluxation?
  - YES Refer to Ortho
  - NO

* Hip dysplasia risk factors
  - Breech presentation
  - Family history of hip dysplasia
  - Improper swaddling
  - Suspicious or inconclusive exam

Abnormal physical exam
- Limited hip abduction (unilateral or bilateral)
- Positive Galeazzi sign (leg appears short in flexion)
- Positive Ortolani sign (reduces in abduction)
- Abnormal gait

** Definitions of normal acetabular index, borderline/mild dysplasia and dysplasia: See our Hip Dysplasia Q&A with Dr. Todd Blumberg, December 2021.