# **HSV in Pregnancy and Neonate**

## 2024 BASHH/RCOG Guideline Summary

## **Maternal Management**

### **General Principles**

* Antenatal counselling about HSV for all mothers.
* Confirm diagnosis with PCR (ulcer panel: HSV, VZV, syphilis ± others by risk).
* Refer to GUM/virology; delivery plan documented with MDT (GUM, obstetrics, neonatology).

### **First Episode HSV**

* **Treatment:**
  + Oral aciclovir 400 mg TDS × 5 days OR valaciclovir 500 mg BD × 5 days.
  + IV aciclovir (10 mg/kg TDS) if disseminated/severe.
* **Suppressive therapy:**
  + Start at **32 weeks** (aciclovir 400 mg TDS or valaciclovir 500 mg BD).
  + If high risk preterm → start at **22 weeks** (aciclovir 400 mg BD or valaciclovir 500 mg OD until 32 weeks, then escalate).
* **Mode of delivery:**
  + 1st/2nd trimester infection, delivery >6 weeks later → vaginal delivery.
  + Delivery within 6 weeks of primary infection → Caesarean.

### **Recurrent HSV**

* Transmission risk low (0–3%).
* Vaginal delivery unless obstetric reason for Caesarean.
* Suppressive therapy as above.
* Episodic recurrences: oral aciclovir/valaciclovir.

### **At Onset of Labour**

* **Primary/non-primary lesions:**
  + Caesarean recommended (<4 h ROM optimal).
  + If vaginal delivery (maternal choice/prolonged ROM) → IV aciclovir intrapartum (5 mg/kg q8h) and treat neonate.
* **Recurrent lesions:** Vaginal delivery acceptable; Caesarean not routinely indicated.

### **Special Situations**

* **PPROM (<37 weeks):**
  + Primary HSV → manage as *highest neonatal risk*, IV aciclovir until delivery, MDT discussion.
  + Recurrent HSV → expectant management <34 weeks, antivirals until delivery; follow RCOG PPROM guidance.
* **HIV co-infection:** Manage as HIV-negative; align with BHIVA HIV-in-pregnancy guidance.

## **Neonatal Management**

### **Risk-Stratified Investigations**

#### **Highest Risk**

* **Who:**
  + Symptomatic infants;
  + any positive neonatal HSV test;
  + vaginal birth with maternal first initial primary/non-primary lesions;
  + maternal systemic HSV illness;
  + maternal primary HSV up to 4 weeks postpartum.
* **Timing:** Immediate/urgent (don’t wait to 24 h).
* **Samples:**
  + Surface swabs: any lesions + throat, nose, conjunctivae, rectum.
  + Blood: EDTA HSV PCR, FBC, LFTs, coagulation.
  + CSF (if safe): HSV PCR, protein, glucose, cell count/microscopy/culture.
  + Other tests as clinically indicated; consider resistance testing.
* **Management:** Start IV aciclovir 20 mg/kg q8h immediately.
  + 10 days if all negative
  + 14 days if skin/mouth/eyes
  + 21 days for CNS

#### **High Risk**

* **Who:**
  + Asymptomatic infants with maternal infection within 6 weeks.
* **Timing:** At ≥24 h of life (repeat if earlier).
* **Samples:**
  + Surface swabs: throat, nose, conjunctivae, rectum.
  + Blood: EDTA HSV PCR, FBC, LFTs, coagulation.
  + CSF (if safe): HSV PCR, protein, glucose, cell count/microscopy/culture.
* Management:
  + Start IV aciclovir 20 mg/kg q8h immediately.
  + 10 days if all negative or if positive from unbroken skin only

#### **Low Risk**

* **Who:** Asymptomatic infants with maternal recurrent lesions at delivery, or remote (>6 weeks) HSV history but no active lesions.
* **Timing:** At ≥24 h of life.
* **Samples:**
  + Surface swabs: throat, nose, conjunctivae, rectum.
  + Blood: EDTA HSV PCR, FBC, LFTs, coagulation.
  + CSF if clinically indicated / escalate if positive or symptomatic.

#### **Lowest Risk**

* **Who:** Term, asymptomatic, no active lesions at delivery, maternal HSV history >6 weeks previously.
* **Investigations:** None. Routine newborn care with standard postnatal exam and safety-netting.

### **Duration of Therapy (if treated)**

* SEM disease: 14 days IV aciclovir.
* CNS/disseminated: 21 days IV aciclovir (ensure negative CSF before stopping).
* All-negative but treated empirically: 10 days IV aciclovir.
* Follow with 6 months oral aciclovir prophylaxis if CNS/disseminated; consider in SEM.

## **Prevention of Postnatal Transmission**

* Parents: hand hygiene, no kissing near face, avoid if cold sores/whitlows.
* Staff with lesions: liaise with Occupational Health, cover lesions, hand hygiene, consider suppression.

## **Breastfeeding**

* Aciclovir/valaciclovir safe (<1% infant dose in milk).
* Do **not** feed from breast with active herpetic lesions; discard expressed milk from affected side until healed.
* Cover lesions, sterilise equipment.
* Consider suppression (aciclovir/valaciclovir) after breast HSV until 6 months postpartum.

## **Discordant Couples**

* Pregnant person seronegative, partner HSV-positive = high risk.
* Abstain from sex (including oral) in 3rd trimester (and 2 weeks before).
* If not abstinent: use condoms, partner suppression therapy.
* Avoid receptive oral sex in late pregnancy if partner has oral HSV.

**Key Point:** Any positive infant HSV test or clinical suspicion = treat as *highest risk* with immediate IV aciclovir and full investigations.