# HYPERTENSION IN PREGNANCY (HIP) INITIATIVE EMERGENCY DEPARTMENT GUIDANCE

The Florida Perinatal Quality Collaborative (FPQC) and its partners have implemented an initiative focused on prevention of severe maternal morbidity and mortality related to Hypertension in Pregnancy (HIP). The initiative follows national recommendations developed by the Council on Patient Safety in Women's Health Care. One of the challenges of the initiative is the broad range of touch points for pregnant women: from the prenatal through the postpartum period there are many community partners and hospital departments who may encounter a woman experiencing hypertension in pregnancy. The Emergency Department is a key player in assessing and managing these women.

The following information, excerpted from the FPQC HIP Toolkit, provides a succinct statement of needed interventions and coordination with EDs. Emergency Departments are urged to coordinate with the Obstetrics Departments and providers in their area to assure that policies and protocols are in place to standardize responses. Obstetric providers need to know when postpartum emergencies occur and be a part of management of these patients.

### EMERGENCY DEPARTMENT RECOGNITION AND TREATMENT

# Focus on Recognition of Hypertensive Disorders in Pregnancy and Delayed Postpartum Preeclampsia

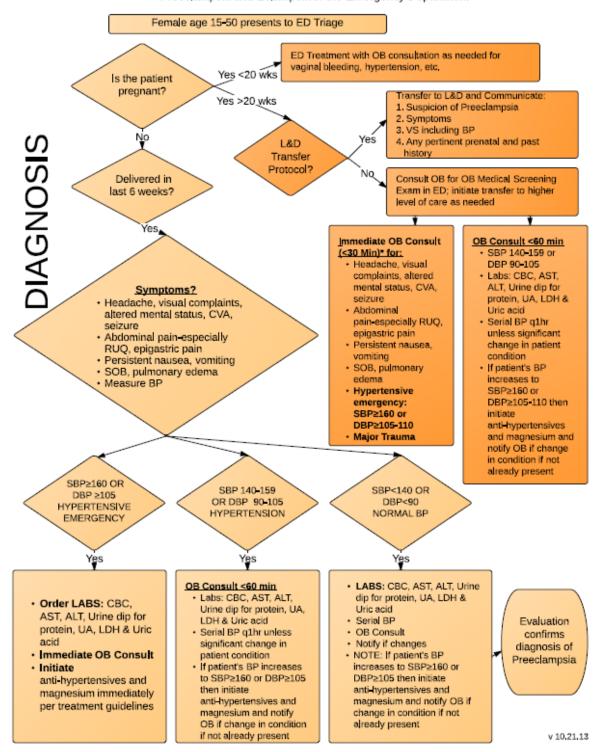
- In Florida, hypertensive disorders accounted for 15.5% of pregnancy-related deaths from 1999-2012, representing one of the leading causes of maternal death.
- Intracerebral hemorrhage is the leading cause of death attributed to hypertensive related emergencies during pregnancy and the postpartum period. Because gravid and recently gravid patients have a lower ability to autoregulate blood pressure within the central nervous system, they are more likely to suffer a hemorrhagic stroke when the systolic blood pressure exceeds 160 mm Hg and/or when the diastolic blood pressures exceed 110 mm Hg. Administration of escalating antihypertensive medication within one hour of these confirmed blood pressure thresholds can decrease the risk for hemorrhagic stroke and death.
- Up to 26% of eclamptic seizures occur beyond 48 hours and as late as 4-6 weeks postpartum, therefore it is not uncommon for these patients to present to the Emergency Department (ED).
- Proper assessment and identification of preeclampsia is essential. Women of childbearing
  age that present with common symptoms of preeclampsia should be questioned about a
  current or recent pregnancy.
- It is imperative that Emergency Department personnel be comfortable with diagnosis of and initial management of these cases and prompt obstetric consultation is always necessary.
- Systolic BP >160 or diastolic BP >110 in pregnant or postpartum women is considered a
  hypertensive emergency. Delays in aggressive management of hypertensive emergency is
  associated with stroke and other adverse outcomes. All emergency department personnel
  should be aware of this association and initiate the Diagnosis Algorithm for Emergency
  Departments.

## Recommendations for Quality Improvement

- 1. ED triage protocols must include identification of patients who are currently pregnant or have delivered in the previous six (6) weeks. This information must be clearly communicated to the treatment team.
- 2. ED personnel should be familiar with the risk factors and characteristics of delayed postpartum preeclampsia and eclampsia.
- 3. While it is easy to recognize and treat the extremes: 155-160 and 105-110, the grey zones are tough 140's high 90's because of varying OB preferences for admission and treatment of HIP patients, some patients may be very ill and not manifest higher blood pressure but have significant symptoms. ACOG recommends standardized practices and this should extend to the ED setting, coordination within the hospital obstetric and ED to establish standard of practice is important. Assessment for these patients should begin at triage and include questions regarding recent pregnancy and any complications. There is also a need for coordination with L and D regarding the initiation of Magnesium Sulfate (some sites send the pts right up to L and D, others start the Magnesium in the ED.)
- 4. EHR order sets are very helpful in beginning the treatment process offering prompts and documentation of practices.
- 5. Do not overlook other neurologic causes of seizure, particularly if the seizure occurs more than 48 hours after delivery.
- 6. Implementation of the protocol for diagnosis and treatment of preeclampsia and eclampsia in the Emergency Department. This can be reinforced through the use of educational tools available in the FPQC HIP Toolkit and with the use of drills and simulations.
- 7. An opportunity for improvement may exist for hospitals to provide education to their Emergency Medical Services providers on the assessment, identification and treatment of women who may have seized due to eclampsia with a current pregnancy or postpartum eclampsia.
- 8. Patient education regarding signs and symptoms of preeclampsia should be provided to all prenatal patients encountered in the ED prior to discharge. Signage in the ED waiting area can be used to instruct patients to inform the provider if they have been pregnant within the past 6 weeks to 2 months. Other innovative mechanisms to identify pregnant and postpartum women may be employed that encourage self-advocacy.
- 9. Collaboration with obstetric providers regarding initiation of treatment and consultation is an essential component of improving patient safety and outcomes.
- 10. When some providers cannot stay for a debrief, a written form can be developed to solicit their feedback. A written response to the questions 1) What went well with the collaboration between departments and 2) What opportunities existed for improvement. These can be reviewed at the time of the nursing debrief.
- 11. An ongoing semi-annual collaboration and review between key nursing, physician, and administrative personnel is recommended with review of severe morbidity obstetric patients and de-brief data is also recommended.

### DIAGNOSIS ALGORITHM FOR EMERGENCY DEPARTMENT

Evaluation and Treatment of Antepartum and Postpartum Preeclampsia and Eclampsia in the Emergency Department



Reproduced from the CMQCC Preeclampsia Toolkit "Diagnosis: Evaluation and Treatment of Antepartum and Postpartum Preeclampsia and Eclampsia in the Emergency Department."

### MANAGEMENT OF ECLAMPSIA ALGORITHM

