What to Expect During Your Prenatal Visits

The following is an overview of screening and surveillance recommended during pregnancy. Prenatal care is provided in accordance with the recommendations of the American College of Obstetrics and Gynecology (ACOG).

Prenatal care appointments will be every 4 weeks until 28 weeks. After 28 weeks, visits are every two weeks, and after 36 weeks, visits are every week. At each visit, your doctor or her assistant will check your weight, urine (looking for signs of infection), and blood pressure and listen to the fetal heart rate.

Ultrasounds will be done at certain milestones in the pregnancy (e.g., to confirm pregnancy and then to evaluate fetal anatomy) but not at every visit. Please be advised although some insurance companies do not cover the costs of recommended ultrasounds, as part of your prenatal care, certain ultrasounds will be required.

In addition, insurance coverage for prenatal screening labs may vary. Our office is unable to verify insurance benefits for laboratory services. Questions regarding a bill for laboratory services should be directed to your insurance company and/or that laboratory. If you chose to decline any recommended screening, then you may be asked to sign an Informed Refusal.

Confirmation of Pregnancy

Your confirmation of pregnancy appointment is usually scheduled for 6 to 8 weeks after your last menstrual period. At that appointment, you will have an ultrasound to confirm the pregnancy and establish your due date. Routine blood work is drawn to determine your blood type, your blood count, and to screen for infections such as HIV. We also routinely check thyroid function and screen for gonorrhea and chlamydia infections. At this appointment, you will also receive information on referrals for genetic counseling, carrier screening, and aneuploidy screening options.

Genetic Counseling

We offer referrals for genetic counseling to all of our patients. Genetic counselors provide information regarding genetic screening options. Typically, a genetic counseling session will include a discussion of your goals for screening, your family history, and assistance with choosing or declining the different screening options.

Carrier Screening

Many people have only one working copy of a gene while their other copy is non-working. Individuals with one non-working copy of a gene are carriers. It is common to be a carrier for at least one condition, and typically there are no health problems that result from being a carrier.

The purpose of carrier screening is to identify couples at risk for passing on genetic conditions to their offspring. Carrier screening is typically offered to the mother, and if she is found to be a carrier, then

carrier screening is offered to the genetic father of the baby. Universal carrier screening is recommended for conditions such as Cystic Fibrosis and Spinal Muscular Atrophy, while other conditions are more common in certain ethnic groups than in others. A genetic counselor can help you determine the conditions for which you have the highest chance to be a carrier. Many pregnant women have already had carrier screening prior to the current pregnancy, in which case it may not be necessary to repeat the carrier screening.

Prenatal Aneuploidy Screening

Prenatal aneuploidy screening is designed to assess whether a pregnancy is at increased risk of having a fetus affected by one or more extra or missing chromosomes. In a surviving newborn, loss or gain of large chromosomal segments may result in congenital birth defects; failure to thrive; and functional abnormalities, including mild-to-severe intellectual disability, infertility, and shortened lifespan. The incidence of fetal aneuploidy increases as a woman ages but can affect any woman regardless of age and is not related to race or ethnicity. The American College of Obstetricians and Gynecologists (ACOG) recommends that all pregnant women be offered aneuploidy screening or diagnostic testing.

Like all screening, fetal aneuploidy screening has limitations. It will screen only for the specific chromosomal abnormalities for which it is designed to screen. Normal screening results do not eliminate the possibility that the pregnancy may have other chromosomal abnormalities, birth defects, or other conditions, such as Spina Bifida. Normal results do not guarantee a healthy pregnancy or baby. **A positive screening result is NOT diagnostic but is suggestive of an increased risk of aneuploidy.** Diagnostic testing through CVS or amniocentesis is recommended for patients with a positive screen.

A genetic counselor can discuss your pretest risk of aneuploidy and help you choose from the following screening options:

- **First-Trimester Screening** combines ultrasound measurement of the fluid accumulation behind the neck of the fetus (nuchal translucency) with maternal blood work between 11 and 14 weeks of pregnancy. It provides patient-specific risk for Trisomy 21 (Down syndrome) and Trisomy 18. There may be false positive or false negative results. This test is performed by Maternal Fetal Medicine specialists and requires a referral from our office.
- **Non-Invasive Prenatal Testing (NIPT)** is a method of screening for Trisomy 21 (Down syndrome), Trisomy 13, Trisomy 18, and the presence of the Y chromosome through analysis of circulating cell-free DNA extracted from maternal blood. The screening should be performed during the 10^{th} week of pregnancy or any time after that. The results will also report the gender of the fetus. The accuracy of NIPT for low-risk pregnancies is not well-understood, and currently insurance coverage for NIPT for low-risk pregnancies is not universal. Our office cannot verify whether your insurance company will cover this screening.

Diagnostic testing options include **Chorionic Villus Sampling (CVS)** and **Amniocentesis** procedures, which are performed at the hospital by Maternal Fetal Medicine specialists. The risk for pregnancy complications and/or miscarriage is up to 1/100 for invasive diagnostic procedures. CVS involves

sampling of the placental tissue and is usually performed between the 10th and 12th weeks of pregnancy. Amniocentesis is a sampling of amniotic fluid surrounding the fetus. The test is usually performed between the 16th and 20th weeks of pregnancy. In addition to testing for chromosomal abnormalities, amniocentesis also screens for Spina Bifida.

Screening for Spina Bifida

Spina Bifida occurs when the spinal column does not close all the way during fetal development. Spina Bifida can be detected during pregnancy through a maternal blood test measuring alpha-fetoprotein (AFP), ideally between the 16th to 18th week of pregnancy. A false positive result may be associated with a high-risk pregnancy. This test may be used to complement earlier screening for aneuploidy. Spina Bifida may also be detected from an **Amniocentesis** or during an **Anatomy Ultrasound**. For more information, please visit www.spinabifidaassociation.org.

Anatomy Ultrasound

An anatomy ultrasound is a screening tool for certain structural birth defects. It is usually performed at 20 weeks of pregnancy. It is NOT a screening tool for fetal aneuploidy, and it cannot detect all forms of fetal congenital anomalies. It is NOT a screening tool for autism.

1-hour Glucose Screening

Universal gestational diabetes (diabetes in pregnancy) screening is recommended between 24 and 28 weeks of pregnancy. Some patients with a higher risk of developing gestational diabetes (such as those patients with a history of gestational diabetes in a prior pregnancy) may have screening earlier in the pregnancy and again between 24 and 28 weeks of pregnancy.

The test will take one hour. You will be given a sweet, fruit punch-flavored soda to drink, and your blood will be drawn one hour after you finish the drink. After you finish the drink, you may not eat or drink anything until the blood sample is taken. In addition, we ask that you remain in the office until the test is complete. If this screening is positive, you will be asked to return to the office for a 3-hour glucose test to diagnose diabetes in pregnancy.

At that appointment, we will provide you with information on hospital registration, tours and classes; a list of local pediatricians; information on breastfeeding; and information on cord blood banking.

Vaccinations

Flu vaccine: If you are expecting during flu season (September to May), we recommend that you be vaccinated against the flu. For more information, please visit www.protect2.org.

Pertussis Vaccine: Pertussis (Whooping Cough) is a highly-contagious respiratory tract infection that can cause permanent disability or death in infants. The best way to prevent infection for infants younger than 12 months is through vaccination of adolescent and adult contacts of the infant. The booster vaccine for

adolescents and adults is called Tdap, which we administer in our office to family members and pregnant moms in their third trimester. For more information, please visit https://www.cdc.gov/pertussis/pregnant/mom/get-vaccinated.html

Screening for Infections

Cultures will be taken to screen for vaginal Group B Strep infections, usually at 36 weeks of pregnancy. If the culture is positive, you will need intravenous antibiotics during labor. In addition, Texas requires that pregnant women be rescreened for HIV and syphilis in the third trimester.

Preparing for Delivery

Register at the Hospital: Our doctors deliver only at Memorial Hermann Memorial City Hospital. You may pre-register online at http://www.memorialhermann.org. After your 28th week of pregnancy, you need to finalize your registration by completing the paperwork at the hospital that requires your signature. You cannot be scheduled for a cesarean delivery or an induction until you have completed the hospital registration process. Information about hospital tours and classes is also available online at womens.memorialhermann.org or by calling 713-222-CARE (2273).

Choose a Pediatrician: You will need to have a pediatrician for care of your newborn once your baby goes home from the hospital. Our office will provide a list of pediatricians in this area. You may also visit your insurance website for a list of providers.

Cord Blood Banking: Cord blood is the blood from the baby that is left in the umbilical cord and placenta after birth. It contains special cells called hematopoietic stem cells that can be used to treat some types of diseases. You have the option to register with a commercial company to process and store your baby's umbilical cord blood. For more information, please visit www.acog.org/Patients/FAQs/Cord-Blood-Banking. **If you choose to have cord blood banking at your delivery, you must register with the cord blood banking company prior to your delivery and bring the company's cord blood collection kit with you to the hospital.**

FMLA Paperwork: The standard medically-indicated leave is 6 weeks for a vaginal delivery and 8 weeks for a cesarean delivery. Please obtain the necessary paperwork from your Human Resources department to submit to our office. The cost for completion of the paperwork is $25. We make every attempt to have it completed within 2 weeks.

Labor and Delivery

Although we make every attempt to deliver our patients personally, we cannot be available for 100% of our deliveries. Therefore, we participate in a call group with other OB/GYNs. This call group includes physicians with practices in other offices, and it includes female and male physicians. Please be advised that we cannot guarantee that you will be delivered by a female provider, and we cannot make alternate arrangements for a female provider to deliver you in the event that a male provider is on call.

Memorial Hermann Memorial City Hospital has an Obstetric Emergency Department (OBED). In certain situations (e.g., preterm labor), you may be seen in the OBED by a Hospitalist, an obstetrician-gynecologist who staffs the OBED. The OBED and the Hospitalist may bill your insurance company separately for services provided in the OBED.

You have the option of developing a birth plan, but this is not absolutely necessary. Birth plans must comply with hospital policies for your and your baby's safety.