The Smoking Saga & Why This Non-Fiction Addiction Should Be Shelved During Pregnancy

By Sharon Voyer Lavigne, MS, MotherToBaby CT Teratogen Information Specialist

"I know I should quit, but it's hard…I've cut down, though! I know it's bad for me, but is it really that bad for my baby anyway?" I had heard these words time and time again as a teratogen information specialist and genetic counselor at MotherToBaby. Let's call this particular caller "Jenny." Well, whether Jenny had volunteered this information about her addiction to cigarette smoking or not, I would have asked her anyway. At MotherToBaby Connecticut, we ask all our callers about cigarettes as well as alcohol exposure even if it isn't the reason they placed the call in the first place. Why? Because most need help quitting without judgment and with the facts about smoking during pregnancy guiding their way to leading a tobacco-free lifestyle. We find that many, if not all, smokers tell us that they have cut down on their use or recently quit once they learned that they were pregnant.

Like Jenny, the general public is well aware that cigarette smoking causes cancer, heart disease as well as other medical conditions. Most have also learned that smoking while pregnant can be dangerous to the baby. However, most women know at least one person, maybe even their own mother, who smoked during pregnancy without any apparent adverse pregnancy outcome. So why should we be concerned? There is much more to this story and with each chapter, I was hoping to let Jenny in on why quitting could change the outcome for her baby…

Chapter 1. Smoking and Fertility

Cigarette smoke contains more than 4,000 toxic chemicals and cancer causing agents, including nicotine, tar, arsenic, lead, carbon monoxide. It is hard to imagine intentionally putting those things into your own body, but imagine the problems they may cause if a developing baby is exposed? These agents can cross the placenta and cause a decrease in the amounts of oxygen and nutrients that reach the baby. There have been reports that suggest smoking prior to pregnancy may make it more difficult to conceive. Discontinuing smoking can reverse this potential fertility road block. Even when men smoke, smoking can adversely affect their chances of getting their partners pregnant.

Chapter 2. Loss of Pregnancy Risk

In the early stages of pregnancy, i.e., the first trimester, smoking cigarettes can increase your chances for an ectopic pregnancy. This condition is when the embryo implants into a fallopian tube and not into the uterus. This is a very serious complication of pregnancy that may require surgery or special medications to stop the growth of the embryo. Another early pregnancy complication related to cigarette smoking in pregnancy is loss or miscarriage. Smoking changes how the blood flows thru the placenta and this change may lead to a loss.

Chapter 3. Potential for Birth Defects

Smoking in pregnancy has been well studied for many decades and there have been reports suggesting an increased risk for birth defects. Oral clefts (cleft lip and or cleft palate) occur when the lip or palate (roof of the mouth) do not fully close during early fetal development. These birth defects of the face are typically surgically corrected here in the United States, but more than one surgery could be necessary and lasting effects may still be visible on the face and in speech development. There have been other reports of other birth defects being more common in moms who smoked in pregnancy, but the level of risk appears small and more information on these is needed to make better risk assessments.

Chapter 4. Pregnancy Complications

Not done yet. Many women are aware of the risks for pregnancy complications with smoking later in pregnancy. Prematurity (born before 37 weeks gestation) and low birth weight are well established risks. Each of these may pose their own secondary risks with complications for the newborn born too small or too soon or both. Placental problems are of concern, including placenta previa (a condition where the placenta covers the cervix and blocks the birth canal) or placental abruption (potentially deadly for mom and baby- this is when the placenta breaks away from the uterine wall causing extensive bleeding). Bleeding alone and stillbirth are pregnancy complications also related to smoking in pregnancy.

Chapter 5. Other Potential Long-Term Effects on Baby
Other complications related to smoking in pregnancy that have been studied are childhood asthma, bronchitis and respiratory infections as well as Sudden Infant Death Syndrome (SIDS). SIDS is difficult to impossible to predict and prevent. Withdrawal symptoms in the newborn such as irritability, increased muscle tone and tremors can be seen in those exposed to smoking late in pregnancy. Usually these symptoms resolve on their own quickly. Behavior problems have also been looked at in children whose mom's smoked in pregnancy. A higher risk of Attention Deficit Hyperactivity Disorder (ADHD) is currently being studied more carefully.

Chapter 6. Smoking and Breastfeeding
Nicotine can be found in the breast milk, along with many of the other unhealthy chemicals in cigarettes. It is best to avoid smoking if you are nursing your baby. If you cannot stop completely, the benefits to the baby from breastfeeding still outweigh the risks from smoking while nursing. You should not smoke around the baby or let others do this either.

Final Chapter: How Quitting Can Help You Re-Write This Chapter For Baby
Finally, some good news for Jenny and all of those struggling with this crippling addiction… If a woman can stop smoking early in pregnancy, she can reduce the risk for many of the mentioned complications. If quitting isn't possible than a reduction in the number of cigarettes smoked per day can also make matters better. The less you smoke the lower the chances that you and or your baby will suffer lasting effects in pregnancy. Quitting is best, and it is NEVER TOO LATE to have a positive effect on your baby.

There are many supports for quitting smoking in your community. For advice you can talk to your health care provider, before or during pregnancy. There are medical treatments that can be safe in pregnancy and many quit programs available. Smokers Quit Line at 1-800-784-8699 or online at **www.tobacco-cessation.org/PDFs/?NeedHelpBookelt.pdf**. Partner and family support is also key, so share your goals with them.

Sharon Voyer Lavigne is a teratogen information specialist, genetic counselor and coordinator of MotherToBaby CT, a non-profit affiliate of the international Organization of Teratology Information Specialists (OTIS). She is based at the University of Connecticut Health Center and is a proud mother of three.

MotherToBaby and OTIS are suggested resources by many agencies including the Centers for Disease Control and Prevention (CDC). If you have questions about medications, vaccines, diseases, alcohol, smoking or other exposures, call MotherToBaby toll-FREE at 866-626-6847. You can also visit MotherToBaby.org to browse a library of fact sheets, including one on Cigarette Smoking in Pregnancy/Breastfeeding, and find your nearest affiliate.

Questions? Call 866.626.6847 | Text 855.999.3525 | Email or Chat at MotherToBaby.org.

Disclaimer: MotherToBaby Fact Sheets are meant for general information purposes and should not replace the advice of your health care provider. MotherToBaby is a service of the non-profit Organization of Teratology Information Specialists (OTIS). Copyright by OTIS, October 6, 2014.