

# What Do Unborn Babies Know and When Do They Know It?

**Life in the womb can be a lot more interesting and stimulating than was once believed.**

by Steven D. Greydanus

Last week Stacy Trasancos wrote a commentary piece for the Register called “The Pain Unborn Children Feel.” In contrast to the dogmatism on this subject often seen on both sides of the abortion debate, Stacy was careful not to claim too much. What we can say is that fetuses as early as 8 weeks show physiological signs of distress in response to stimuli, and as early as 20 weeks they are able to recoil from stressors and undergo an increase in stress hormones. Excessive exposure to stressors in utero can lead to emotional and behavioral problems later in life.

Does this physiological distress amount to the experience of pain? That’s not an easy question to answer. This doesn’t stop pro-life and pro-choice partisans from offering overly confident answers, though. Trasancos cites one such overly confident answer on the pro-abortion side: A 2006 article in the British Medical Journal made the unqualified claim that “It is impossible for a fetus to feel pain.”

The reality behind this claim is that the perception of pain as pain is not merely a physiological event, but a subjective experience depending not just on physical capacity but also on cognitive development in relation to formative experiences early in life. Such formative experiences, the argument assumes, occur only in connection with stimuli outside the womb. In recent years, though, we’ve learned a lot about just how much more interesting and stimulating an unborn baby’s life can be than was once thought or is commonly supposed. Some examples:

Sight and visual preferences. It’s been well known for a long time that sounds from the outside world reach babies in the womb — but less well known is that light can reach them too. Sufficiently bright light passes through the abdominal wall; if it’s too bright, babies will flinch from it. They don’t always flinch from light, though, and sometimes they’re more interested in what they see than other times.

We’ve known for a while now that newborns demonstrate a preference for looking at faces over other things. Last year a pioneering study projected light images through the uterine wall — and found that even before they are born babies already prefer face-like images to non-face-like images.

Hearing and language recognition. We’ve known for some time that babies can recognize familiar voices (above all Mama’s voice, but also other voices they hear often) as well as songs and nursery rhymes. Recently we’ve learned more about in utero language learning. Not only can unborn babies learn to recognize particular words and retain that memory into the post-partum world, they can also differentiate between familiar and unfamiliar languages, so that the phonemes and speech patterns of, e.g., Chinese will be unfamiliar to a baby used to hearing Russian, and vice versa.

Taste and smell preferences. Did you know that unborn babies experience taste and smell in the womb — and that they prefer some tastes to others? Whatever Mama is eating or drinking doesn’t reach the baby only through the umbilical cord. What she tastes also affects the taste of the amniotic fluid, which babies taste and swallow. (They also lick the uterine wall and the placenta!)

When amniotic fluid tastes sweet, babies swallow more of it, a preference beginning as early as 15 or 16 weeks. There are also built-in affinities for the tastes of salt and umami — but, beyond these natural preferences, babies also learn about taste in the womb.

Smell, too. Although we think of “smells” as airborne, the sense of smell involves the perception of chemical stimuli by olfactory receptors in our nasal cavities, and, as babies snort amniotic fluid in and out, the same perceptive process occurs. By 21 weeks, fetuses using their sense of taste and smell in concert can experience complex flavors. What’s more, how good or bad Mama’s diet is, and how more or less varied, can affect her baby’s proclivities later in life.

With all this going on, the world of fetal experience and cognition is richer and more complicated than was once believed. Is it really clear that fetuses can’t have the cognitive development to experience pain as pain? More recent statements from the Royal College of Obstetricians and Gynecologists, the American Congress of Obstetricians and Gynecologists and other authorities concede that fetuses may experience pain at least by the third trimester.

Even well before the third trimester, physiological distress and aversive reactions are evidence of some kind of trauma. Perhaps it’s not conscious pain, but that doesn’t mean it’s not unpleasant. It’s important to remember that the dignity of the human person does not depend on a capacity for pain. All members of the human family deserve the community’s protection of and respect for the gift of human life that they share with us.

Still, the dogmatic attempt to deny or down the possibility of fetal pain is revealing for what it says about the deniers. (N.b. As Stacy notes, the author of that 2006 British Medical Journal article served as an unpaid consultant to Planned Parenthood.)

Copyright © 2017 [National Catholic Register](#)

Posted on [StayCatholic.com](#)