Science & Sensibility

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Today, midwife and researcher, Wendy Gordon, LM, CPM, MPH, Midwives Alliance Division of Research, takes a look at the recent article in the American Journal of Obstetrics and Gynecology that shared the authors' view of the appropriate professional response from obstetricians when counseling and discussing home birth with patients. Was this article based on good science? Accurate and accepted studies? Did the authors selectively choose their sources and ignore other research that may have supported a different viewpoint? Wendy shares information and research that invites consideration and discussion of the validity of the authors' opinion. – Sharon Muza, Community Manager.

Recently, an article in the American Journal of Obstetrics & Gynecology pled with obstetricians to not support planned home birth in any way, and even suggested that those who do "should be subject to peer review and justifiably incur professional liability and sanction from state medical boards" (1). In their strongly worded opinion, the authors (the first two of whom are, curiously, members of the journal's Advisory Board, and four of whom are also board members of the International Society of Fetus as a Patient) make their case that physicians should provide evidence-based information to women that planned home birth is not safe, that reports of patient satisfaction are overrated, that it's actually *not* cost-effective, and that a pregnant woman has a moral duty to her fetus to give up her autonomy to her doctor's judgment on this issue. Let's take a look at the basis for these recommendations.

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Although there are many high-quality studies of home birth on which Chervenak et al. could have based their opinions, they led with the ACOG statement (2) that rests on the findings of the Wax et al. meta-analysis (3), which relied heavily on a study that included *unplanned* home births in its findings of neonatal mortality rates (4). Many strong critiques of the Wax analysis have been published (5-11), including an unbiased look from someone who has no stake in the home birth debate. The authors cited several more poor-quality studies, as well as 52 citations of commentaries, opinions and anecdotes (some even pulled from the popular media) to build their "evidence" basis. They conveniently ignored the large and growing body of literature that continues to show that planned home birth *with qualified and experienced midwives* holds no greater risk of perinatal mortality than birth in the hospital, and in fact results in far fewer interventions and lower risk of maternal and perinatal morbidity.

Here are some of the high-quality studies that Chervenak et al. did *not* cite in developing their opinion of the "professional responsibility response":

- two systematic reviews (12-13) and a meta-analysis (14) of home and birth center safety studies that all show that there is no greater perinatal risk for planned, attended home births than for hospital births, and significantly fewer interventions;
- the only large-scale, high-quality study of Certified Professional Midwives (CPMs) in the U.S. that described intrapartum and neonatal death rates as similar to other studies of low-risk home and hospital births (15);
- other high-quality U.S. studies that show no difference in perinatal mortality between planned home and hospital births (16-18);
- several high-quality Canadian studies confirming no difference in the rates of perinatal death between planned home and hospital birth with much lower rates of both interventions and adverse outcomes (19-21);
- a huge Dutch study of over half a million births that shows no difference in perinatal mortality rates or NICU admissions between planned home and hospital births (22);
- another Dutch study that shows no difference in perinatal mortality and lower risk of interventions and other adverse outcomes, particularly for multips (23);
- large, high-quality U.K. studies that show no difference in perinatal mortality rates and lower risk of both interventions and adverse outcomes (24-25); and
- a German study that shows no difference in rates of perinatal mortality and lower risk of interventions and adverse outcomes (26).

The authors then go on to discount the evidence of higher satisfaction among women choosing to deliver at home, as well as the cost-effectiveness of doing so, while presenting absolutely no evidence to the contrary. The authors reference a study in the Netherlands where the transport rate from home to hospital is over twice that in the U.S. (and where Chervenak et al. took *great* liberties in interpreting the results on patient satisfaction) and a U.K. study where the costs of home and hospital birth are virtually equivalent. While consistent, this approach to selectively reviewing the evidence and generalizing the findings to the U.S. maternity care system is disingenuous and deliberately misleading to American obstetricians and their patients. A Washington State study of Medicaid patients planning a home birth with Licensed Midwives showed a savings of nearly $3 million, *including* the increased cost of those who transferred care and/or site of delivery (27). This analysis did not attempt to account for the vast cost reductions of potentially avoided interventions, including cesareans and their complications, which would make the case for the cost-effectiveness of midwifery-led care in Washington State even stronger. It is puzzling that Chervenak et al. did not cite this study, which is recent, took place in the U.S., was conducted by unbiased health-economics consultants, and directly addresses one of their four concerns.

The authors' main argument against the proven cost-effectiveness of planned home birth is that "the lifetime costs of supporting the neurologically disabled children who will result from planned home birth" have not been factored in, nor have the supposedly increased rates of death. If one accepts the conclusions of the enormous body of literature that finds no difference in perinatal mortality rates or other adverse outcomes between planned, midwife-attended home births and hospital births, then the pursuit of this line of reasoning is a non-starter.

The U.S. continues to lag behind many other high- and low-resource countries in accepting the evidence of the vast benefits of midwifery care. The U.K.'s National Health Service has encouraged women to plan home births with midwives for several years; the Netherlands has always acknowledged midwives as the primary care provider in the childbearing year; New Zealand's system similarly places midwives at the forefront of maternity and newborn care; Japan has a long tradition of midwifery-led care. Most recently, British Columbia Health Minister MacDiarmid, accepting the evidence of safety, patient satisfaction and cost-effectiveness, has announced government support for women with low-risk pregnancies to plan a home birth, including support for physicians to become appropriately trained to attend home births (28). But the

medical associations of the U.S. continue to erect barriers to the type of interprofessional collaboration that has resulted in the excellent outcomes of these other countries. The Chervenak et al. article is clearly intended to be yet another of those barriers.

In the centerpiece of the *AJOG* article, Chervenak cites himself an astounding 15 times in justifying why the rights of a pregnant woman to make autonomous decisions for herself and her baby should be relegated to her doctor's judgment of what's right for the "fetus as a patient," grounded firmly, of course, in the aforementioned "evidence." In an astonishing disregard for shared decision-making and informed choice, Chervenak et al. state that "in a professional relationship, the physician's integrity justifiably limits the woman's rights by limiting the scope of clinically reasonable alternatives." The authors' repeated and unusual use of the word "recrudescence" when referring to home birth, which reveals their perception of the choice as a disease or disorder, and their stubborn contempt for high-quality evidence if it disproves their opinion, exposes their intent and certainly calls into question their "integrity."

"Professional responsibility" demands that we dare to examine the evidence that does not agree with our personal beliefs. It requires that we allow the volumes of high-quality evidence to seep into our analysis of reality and into our presentation of true informed choice to our patients. "Professional responsibility" demands that we examine and disclose our own personal, religious or anecdotal beliefs that may bias our interpretation and presentation of the research. And it requires that we refuse to cloak those personal beliefs as "evidence" and "integrity" and by so doing avoid an abuse of power in relationship with our patients.

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