

# PRACTICE BULLETIN

EVIDENCE DIRECTING PRO-LIFE OBSTETRICIANS & GYNECOLOGISTS

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## Counseling the Abortion-Vulnerable Patient

*Many physicians will encounter patients considering pregnancy termination for various reasons. This presents an opportunity not only to create a lasting bond with a patient, but also to open doors to the patient and explore possibilities she may not have considered, and thereby enable her to choose life. Given the importance of offering accurate information about abortion and continuation of pregnancy, this bulletin lists resources for the pro-life physician faced with an abortion-vulnerable patient.*

### Background

#### *Epidemiology*

About 45% of pregnancies in the United States are unintended (1,2). Stulber et al reported in 2011 that 97% of practicing obstetrician-gynecologists in the United States encounter patients seeking abortion (3). According to the Guttmacher Institute (4):

The reasons patients gave for having an abortion underscored their understanding of the responsibilities of parenthood and family life. The three most common reasons—each cited by three-fourths of patients—were concern for or responsibility to other individuals; the inability to afford raising a child; and the belief that having a baby would interfere with work, school or the ability to care for dependents. Half said they did not want to be a single parent or were having problems with their husband or partner.

#### *Definitions*

The following definitions were modified from *Excellence of Care: Standards of Care for*

*Providing Sonograms and Other Medical Services in a Pregnancy Medical Clinic (5).*

The *abortion-vulnerable* patient is one who by continuing her pregnancy faces challenges and problems that she may feel unprepared or unable to manage. She may tell her physician that she is considering abortion, may feel that abortion is her only or best option, or simply may not have ruled out abortion. She may have a medical condition affecting her decision-making.

An *abortion-minded* patient is one who is planning to obtain an abortion or who has already initiated the process by making an appointment with an abortion clinic or having had laminaria placed or having taken misoprostol.

Although this Practice Bulletin uses primarily the term “abortion-vulnerable” for the sake of clarity, the same counseling concepts and techniques may

**Committee on Practice Bulletins.** This Practice Bulletin was developed by the Committee on Practice Bulletins. The information is designed to aid practitioners in making decisions about appropriate obstetric and gynecologic care of both patients involved in pregnancy. These guidelines should not be construed as dictating an exclusive course of treatment or procedure. Variations in practice may be warranted based on the needs of the individual patient, resources, and limitations unique to the institution or type of practice.

be applied as needed for an abortion-minded patient who is open to having a conversation.

*Challenges*

The practicing ObGyn faces several challenges in counseling abortion-vulnerable patients: Clinic time may be limited and patients may require more counseling time than is scheduled (6-9). Some physicians may feel discomfort, or perhaps an inner conflict stemming from a desire not to condemn or alienate the patient while at the same time feeling an obligation to protect the life of the unborn. Patients themselves may feel uncomfortable discussing their circumstances because of coercion from partner or family, worries about school or finances.

*Ethical Responsibilities*

In counseling the abortion-vulnerable patient, fundamental values to consider are respect for the dignity of human life and the duty to alleviate suffering and distress by working with community resources to help meet needs, to make carrying the pregnancy as easy as possible for the patient. Previously established ethical systems can be applied to counseling the abortion-vulnerable patient (10-12):

*Fidelity* to the patient involves protection of confidentiality, a duty to provide accurate information, and a commitment to remain available to help and support the patient as she works through her decisions.

*Autonomy* means that the patient ultimately decides the intended outcome of her pregnancy. The physician counseling her aims to improve her ability to make a well-informed decision.

*Beneficence* moves the physician to act for the benefit of both patients, the woman and her unborn child.

*Non-maleficence* is the responsibility to mitigate, while still respecting autonomy, any harm to the patient and her unborn child. This includes patient safety.

*Justice* means that with utmost respect for the dignity of *all* human life, we should do our best to ensure that all patients have accurate information concerning their health and that of their unborn baby and are offered support and counseling regarding viable options that enable her to continue her pregnancy, regardless of socioeconomic status, sexual orientation, or ethnic background.

<b>Box 1. Counseling Topics for the Abortion-Vulnerable</b>
The woman’s own feelings about parenting, adoption, and abortion
Perceived barriers to continuation of pregnancy
Your role in emotional support, encouragement, and obstetrical care if she continues the pregnancy
Your identity as a pro-life physician (i.e. she can trust you to provide care for her <i>and</i> her baby)
Open adoption (including anecdotes if possible)
Pressure and coercion, even from people with whom the patient has a positive relationship (7)
Fetal development
Fetal pain (20,21)
Abortion procedures, including medical abortion
Risks of abortion <ul style="list-style-type: none"> <li>• Claims that abortion is safer than childbirth highly questionable (27-34)</li> <li>• Preterm birth (35-62)</li> <li>• Effects on mental health (63-82)</li> <li>• Hemorrhage</li> <li>• Uterine perforation (surgical abortion only)</li> <li>• Injury to surrounding organs (surgical abortion only)</li> <li>• Infection</li> </ul>
Abortion pill rescue (104)

*General Counseling Technique and Content*

Preparation is very important to good counseling of abortion-vulnerable patients. A physician can improve his or her counseling by considering counseling technique, community resources (including in-office literature and relationships with local pregnancy care centers), and evidence

before being faced with an abortion-vulnerable patient (6,7).

While counseling content may vary from one patient to the next depending on individual patient needs, this Practice Bulletin aims to provide the physician with a number of topics which can be considered for discussion. In general, it is wise to start by asking questions, express empathy, and learn about the patient’s situation.

If the patient has brought up the subject of abortion, it may only be necessary to ask, “How do you feel about abortion?” Some patients will express a belief that abortion is objectionable. If that is the case, the physician may need only to encourage fidelity to her deeply held beliefs, then go on to discuss how to overcome hurdles and challenges that make continuing the pregnancy

seem difficult. Other counseling topics, including perceived barriers to pregnancy continuation and coercion, are listed in Box 1.

Part of comprehensive counseling is to encourage the patient to gather as much information as possible and to take time to understand and consider it carefully (6,7, 13, 14). Assure her that she does have options and use language of empowerment to specifically advise her to resist coercion, to focus on making a decision that she will be comfortable with for her entire life, and to make yourself available in the decision-making process and for support during her pregnancy. As you listen to and counsel the patient, be aware of signs of human trafficking, listed in Box 2.

<b>Box 2. Red Flags for Human Trafficking</b>
<p>Working and Living Conditions:</p> <ul style="list-style-type: none"> <li>• Is not free to leave or come and go as he/she wishes</li> <li>• Is in the commercial sex industry and has a pimp / manager</li> <li>• Is unpaid, paid very little, or paid only through tips</li> <li>• Works excessively long and/or unusual hours</li> <li>• Is not allowed breaks or suffers under unusual restrictions at work</li> <li>• Owes a large debt and is unable to pay it off</li> <li>• Was recruited through false promises concerning the nature and conditions of his/her work</li> <li>• High security measures exist in the work and/or living locations (e.g. opaque windows, boarded-up windows, bars on windows, barbed wire, security cameras, etc.)</li> </ul>
<p>Mental Health and Behavioral Conditions:</p> <ul style="list-style-type: none"> <li>• Is fearful, anxious, depressed, submissive, tense, or nervous/paranoid</li> <li>• Exhibits unusually fearful or anxious behavior after bringing up law enforcement</li> <li>• Avoids eye contact</li> </ul>
<p>Physical Conditions:</p> <ul style="list-style-type: none"> <li>• Lacks medical care and/or is denied medical services by employer</li> <li>• Appears malnourished or shows signs of repeated exposure to harmful chemicals</li> <li>• Shows signs of physical and/or sexual abuse, physical restraint, confinement, or torture</li> </ul>
<p>Lack of Control:</p> <ul style="list-style-type: none"> <li>• Has few or no personal possessions</li> <li>• Is not in control of his/her own money, no financial records, or bank account</li> <li>• Is not in control of his/her own identification documents (ID or passport)</li> <li>• Is not allowed or able to speak for themselves (a third party may insist on being present and/or translating)</li> </ul>
<p>Other:</p> <ul style="list-style-type: none"> <li>• Claims of just visiting and inability to clarify where he/she is staying/address</li> <li>• Lack of sense of time, or knowledge of whereabouts and/or of what city he/she is in</li> </ul>

- Has numerous inconsistencies in his/her story

*Modified from the National Human Trafficking Resource Center.*

There are a few things to avoid in counseling the abortion-vulnerable patient. Avoid negativity, don't marginalize her emotions, and don't try to tell her what to do (5).

If possible, offer to perform (or order) an ultrasound. Dating the pregnancy will be necessary regardless of her decision. Ultrasound affords the opportunity for your patient to actually see the life she is carrying. While it is unclear exactly how many women choose life because of ultrasound (15,16), experience has shown that many women choose to continue their pregnancies when allowed to see an ultrasound. (17,18)

Finally, it is generally useful to offer a follow up appointment to continue your discussions, answer questions that have come up, or repeat the ultrasound examination. You may offer to see the patient and/or her family more frequently so that she can benefit from your understanding and willingness to listen. You will make any referrals needed for her to receive the best care.

## Clinical Considerations and Recommendations

*Q I am faced with an abortion-vulnerable patient in my office now and I don't have time to sift through literature or form relationships with the local pregnancy care center. Who can help me right now?*

AAPLOG.org hosts multiple documents such as this, that condense useful information. It also provides a list of pro-life physicians, who may have additional local resources or may form a referral base.

Optionline.org is associated with the hotline at 1-800-712-HELP (4357). (Patients can also text "HELPLINE" to 313131.) This site provides comprehensive option counseling. Similarly, pregnancydecisionline.org provides links to local pregnancy care centers and provides a hotline (855-910-9123).

Lifetimeadoption.org is devoted to helping women understand and consider adoption.

Care-net.org is a website devoted to pregnancy care centers, with a Christian emphasis.

Abortionpillrescue.com provides a telephone hotline and online chat for women who have initiated a medical abortion and are reconsidering their decision. The website also provides information about medical abortion and the rescue process.

Abortionprocedures.com describes various abortion methods.

When there is a concern about human trafficking, the National Human Trafficking Resource Center (1-888-373-7888, or text "BEFREE" TO 233733) is invaluable.

*Q How can a busy OB/GYN begin to establish rapport with an abortion-vulnerable patient?*

Try to create a suitable environment and a relationship with the patient that makes her feel comfortable and safe to express herself. It is helpful to show empathy, to make an effort to understand her situation from her perspective.

The patient must have a sense that the physician counselor is sincere. She must know that she can count on you and your staff to follow through with the support and help you offer.

*Q Are special laws in effect for minors participating in sex work?*

Yes. According to federal law, any minor under the age of 18 engaging in commercial sex is a victim of sex trafficking, regardless of the presence of force, fraud, or coercion.

*Q How should sex trafficking be reported? What referrals should sex trafficking victims be given?*

Report sex trafficking online at [traffickingresourcecenter.org](http://traffickingresourcecenter.org). Referrals and resources are also available there, or by calling 1-888-373-7888 (twenty-four/seven hotline) or emailing [nhtrc@polarisproject.org](mailto:nhtrc@polarisproject.org).

*Q What about the case of the patient whose fetus has anomalies?*

Women whose unborn child is diagnosed with a serious or lethal fetal anomaly should be aware of the availability of perinatal hospice. Research regarding grief and posttraumatic stress symptoms after termination of pregnancy for fetal anomalies indicate that “women simply do not ‘get over it.’” As an alternative honoring the dignity of human life, AAPLOG offers Practice Bulletin Number 1, February 2015, Perinatal Hospice: Care with Compassion for Families with an Adverse Prenatal Diagnosis. Perinatal hospice focuses on the family rather than the diagnosis. The family is placed in the center of the care and there is a continuum of support from the diagnosis, through death, and grief. Experience has shown that many men and women strongly desire to live out their calling as a loving parent, no matter how short their child’s lifespan, and despite serious anomalies (19). Please

refer to our Perinatal Hospice Practice Bulletin (20) for more detailed information.

*Q What language can be used to describe fetal development in a short time?*

The following is an excerpt from the AAPLOG Patient Guide pamphlet: “Your unborn child is a person. At about 22 days after fertilization your child’s heart begins to circulate his or her own blood, unique from your own, and has a heartbeat that can be detected on ultrasound. At just six weeks after fertilization, your child’s eyes and eye lids, nose, mouth, and tongue can be seen. Then just ten weeks after fertilization your child can make bodily movements. Around week 19-21 your child can hear. During this time you should begin to feel movement. From fertilization on, your child is a human being and a human person, uniquely distinct from you. Your child is alive, and every life is a precious and valuable gift.”

*Q When can fetuses feel pain?*

It is clear that fetuses are capable of pain by 22 weeks gestational age at the latest; possibly earlier, as fetuses do respond to touch as early as 7.5 to 8 weeks (20,21). For more information, refer to AAPLOG’s Practice Bulletin No. 2, November 2017, Fetal Pain.

*Q How much does abortion increase a patient’s risk of subsequent preterm birth?*

Since abortion was legalized, many studies have demonstrated an increased risk of preterm birth (PTB)(36-63), notably two recent reviews. In one meta-analysis which considered over 900,000 women with prior surgical abortion, surgical abortion was found to have an odds ratio (the occurrence of preterm birth when surgical abortion has happened, compared to the occurrence of PTB when surgical abortion has not happened, which

would be 1.0) of 1.52, which was statistically significant. On the other hand, women who underwent D&C for management of spontaneous abortion also inherited a higher risk of PTB, but this was lower than surgical abortion (odds ratio of 1.19). For women undergoing surgical abortion, the odds ratio of low birth weight (LBW) was also significantly elevated at 1.41, and the odds ratio of small for gestational age neonate (SGA) was significantly elevated at 1.19 (62).

This review also examined women who had received medical abortion, and these women did not have a significantly increased risk of PTB, LBW, or SGA (62). However, if a medical abortion fails and requires surgical completion, the risk of preterm birth following surgical completion will be at least as high as a primary surgical abortion. It is important for a pro-life OB/GYN to represent this data honestly.

There is a suggestion that surgical abortion may increase the risk of very preterm birth (birth prior to 32 completed weeks) more than all preterm births taken together (less than 37 completed weeks): the odds ratio of very preterm birth was found to be 1.68 in one study, compared to 1.29 for all preterm births, suggesting that very preterm births may make up more of the preterm births that women with a prior surgical abortion suffer (63).

The risk of PTB increases with multiple surgical abortions: women with a history of multiple surgical abortions have a 1.79 odds ratio of PTB compared to women with one surgical abortion (63).

Helping patients understand why PTB is to be avoided can be helpful in some situations. Preterm birth can have both short-term and long-term

health risks for the neonate. Short-term risks include the hurdles in respiratory and digestive function that neonatal intensive care patients deal with on a daily basis.

In addition, preterm birth leads to an increased risk for some long-term complications, such as cerebral palsy, impaired vision and hearing, behavioral and psychosocial difficulties, and impaired cognitive development. (The last two paragraphs of this reply were modified from the AAPLOG pamphlet on Abortion and Preterm Birth.)

*Q How much does abortion increase a patient's risk of mental health problems?*

It is important for the abortion-vulnerable patient to understand that although many abortions are purportedly done to prevent or reduce mental health risks, the medical literature offers no evidence that abortion reduces mental health risk (64,65). In fact, while some claim no abortion-related mental health risk, there are actually hundreds of studies (66-104), including a carefully designed meta-analysis in 2011 (67), revealing abortion as a significant risk factor for mental health problems. Summarizing the medical literature, Dr. Patricia Coleman has stated, "For a significant number of women, abortion initiates a life trajectory characterized by feelings of grief, loss, alienation from others, and mental health challenges" (105).

*Q Does abortion increase a patient's risk of breast cancer?*

The Howe study, a large pair-matched case-control study nested in a prospective database raised concern in 1989 when it pointed to a risk ratio of 1.9 (106). After a meta-analysis in 1996 revealed induced abortion as an independent risk factor for breast cancer (107), several subsequent large meta-

analyses which included multiparous as well as nulliparous women did not confirm an increased risk (108, 109). However, there exists evidence that abortion of a first pregnancy, especially for teens and women over the age of 30, increases breast cancer risk. Innes and Byers have demonstrated that pregnancies which end prior to 32 weeks result in an increased risk (110).

For women carrying a BRCA mutation (111), incomplete pregnancies increased the risk of subsequent breast cancer. The mechanism is stimulation of stem cell breast tissue (Type 1 and 2) in early pregnancy but lack of terminal differentiation which occurs after elaboration of human placental lactogen (HPL) by the placenta after 20 weeks gestation. HPL is required for terminal differentiation of breast tissue to lactational tissue, which is cancer resistant. Studies which look at the subset of women who abort prior to carrying a child to term show the strongest association. Studies which look at women who abort after previous term pregnancies do not show as strong an association. There is biologic plausibility as well as epidemiologic evidence (112-130) for an abortion-breast cancer link.

*Q What options are available for a patient who has taken mifepristone but then changes her mind?*

For patients who have already taken mifepristone, there is as high as 68% chance of saving the pregnancy by following an abortion pill rescue protocol (131). For patients who choose this treatment, she should know that having taken the mifepristone, her fetus is not at increased risk for birth defects. For more information, contact the Abortion Pill Rescue Network: [abortionpillrescue.com](http://abortionpillrescue.com).

## Summary of Recommendations and Conclusion

*The following recommendations are based on good and consistent scientific evidence (Level A):*

1. Physicians should encourage the patient to gather as much information as possible, take time to make a decision, and to provide significant support (14).

*The following recommendations are based on limited and inconsistent scientific evidence (Level B):*

1. Patients may be counseled that abortion causes increased risk for preterm birth, mental health problems, and possibly breast cancer (28-130).
2. For patients who have taken mifepristone, there is as high as 68% chance of saving the pregnancy by following an abortion pill reversal protocol (131).

*The following recommendations are based primarily on consensus and expert opinion (Level C):*

1. Physicians should prepare ahead of time to counsel abortion-vulnerable patients, in particular by studying the literature cited and by forming connections with local organizations that can offer these patients resources.
2. It is important for physicians counseling abortion-minded patients to listen to the patient and ask her about her own feelings about life, adoption, and abortion.
3. Physicians counseling abortion-vulnerable patients should avoid negativity, marginalizing emotions, and any paternalism.
4. Experience has shown that many women choose to continue their pregnancies when

they see their baby on an ultrasound monitor.

5. Women whose unborn child is diagnosed with a serious or lethal fetal anomaly should be aware of the availability of perinatal hospice.
6. Pregnancy Care Centers should be used whenever possible.
7. Physicians counseling abortion vulnerable patients should be aware of signs of human trafficking.

## References

1. Finer LB, Henshaw SK. Disparities in rates of unintended pregnancy in the United States, *Pers Sex Reprod Health*. 2006; 38(2):90–96.
2. Finer LB and Zolna MR, Declines in unintended pregnancy in the United States, 2008–2011, *New England Journal of Medicine*, 2016, 374(9): 843-852.
3. Stulber DB, Dude AM, Dahlquist I, Curlin FA. Abortion provision among practicing obstetrician - gynecologists. *Obstet Gynecol* 2011;118: 609-14
4. <https://www.guttmacher.org/fact-sheet/induced-abortion-united-states>. Accessed 6/1/2018.
5. Care Net. Guidelines for Life Advocates: 10 Things NOT to Do When a Woman Tells You She Wants an Abortion. 2016 Care Net.
6. Searight R. Realistic approaches to counseling in the office setting. *Am Fam Physician*. 2009 Feb 15;79(4):277-84.
7. Searight HR. Efficient counseling techniques for the primary care physician. *Prim Care*. 2007 Sep;34(3):551-70, vi-vii.
8. Atallah R et al. Please put on your own oxygen mask before assisting others: a call to arms to battle burnout. *Am J Obstet Gynecol*. 2016 Dec;215(6):731. E1-731.
9. Smith RP. Burnout in Obstetricians and Gynecologists. *Obstet Gynecol Clin North Am*. 2017 Jun;44(2):297-310.
10. ACOG Committee Opinion. Ethical Decision Making in Obstetrics and Gynecology. Committee on Ethics, Number 390, December 2007.
11. Beauchamp TL, Childress JF. Principles of biomedical ethics. 5<sup>th</sup> ed. New York (NY): Oxford University Press;2001.
12. Childress JF. Methods in bioethics. In: Steinbock B, editor. *The Oxford handbook of bioethics*. New York (NY): Oxford University Press; 20017. P. 15-62.
13. Centers for Disease Control and Prevention. Principles for Providing Quality Counseling. *Morbidity and Mortality Weekly Report (MMWR)*. April 25, 2014. 63(RR04):45-46.
14. ACOG Committee Opinion. Informed Consent. Committee on Ethics. Number 439, August 2009.
15. Focus on the Family Clarifies Option Ultrasound Numbers: [focusonthefamily.com/about/newsroom/news-releases/20111018-focus-on-the-family-clarifies-option-ultrasound-numbers](http://focusonthefamily.com/about/newsroom/news-releases/20111018-focus-on-the-family-clarifies-option-ultrasound-numbers). Accessed 11/3/2018
16. Gatter, Mary MD et al. Relationship Between Ultrasound Viewing and Proceeding to Abortion. *Obstetrics & Gynecology*: 123(1): 81–87
17. Why Ultrasounds Matter for Women Planning Abortion: Care Net, [care-net.org/center-insights-blog/why-ultrasounds-matter-for-women-planning-abortion](http://care-net.org/center-insights-blog/why-ultrasounds-matter-for-women-planning-abortion), accessed 11/3/2018
18. Sedgmen et al. The Impact of Two-Dimensional versus Three-Dimensional Ultrasound Exposure on Maternal-Fetal Attachment and Maternal Health Behavior in Pregnancy. *Ultrasound Obstetrics and Gynecology*, 2006 (27) pp. 245-251.
19. McCaffrey M. Lives Worth Living. *Issues in Law & Medicine*; 32 (2): 215-224
20. AAPLOG Practice Bulletin. Perinatal Hospice: Care with Compassion for Families with an Adverse Prenatal Diagnosis. No 1. Feb, 2015.
21. Page S. The Neuroanatomy and Physiology of Pain Perception in the Developing Human. *Issues in Law & Medicine*; 30(2): 227-236.
22. AAPLOG Practice Bulletin Number 2. Fetal Pain. November 2017
23. <https://humantraffickinghotline.org/human-trafficking/recognizing-signs>. Accessed 9/28/2018.
24. Care Net. Before You Decide. 2016 Care Net.
25. Weikart R. Upholding the Sanctity of Life in a Culture of Death. *Issues in Law & Medicine*;32 (2):269-276.
26. American College of Pediatricians. Induced Abortion: Risks That May Impact Adolescents, Young Adults, and Their Children. *Issues in Law & Medicine*; 33(1): 85-112.



27. Lawrence B, Finer LF, Frohwirth L, A Dauphinee, Singh S, Moore AM. Reasons U.S. Women Have Abortions: Quantitative and Qualitative Perspectives. *Perspectives on Sexual and Reproductive Health*. Volume 37, Number 3, September 2005:110-118.
28. Calhoun, B. The maternal mortality myth in the context of legalized abortion, *The Linacre Quarterly* 80 (3) 2013, 264–276.
29. Calhoun B. The Myth That Abortion is Safer than Childbirth: Through the Looking Glass. *Issues in Law & Medicine*; 30(2): 209-216.
30. Coleman PK, Reardon DC, Calhoun BC. Reproductive history patterns and long-term mortality rates: a Danish, population-based record linkage study *Eur J Public Health*, first published online September 5, 2012
31. Reardon DC, Coleman PK. Short and long term mortality rates associated with first pregnancy outcome: Population register based study for Denmark 1980-2004. *Med Sci Monit* 2012;18(9):PH 71 – 76.
32. Klemetti R, Gissler M, Niinimäki M, Hemminki E. Birth outcomes after induced abortion: a nationwide register-based study of first births in Finland. *Hum Reprod* 2012 Aug 29. [Epub ahead of print]
33. Gissler, M., et.al., Pregnancy-associated mortality after birth, spontaneous abortion, or induced abortion in Finland, 1987-2000., *American J. ObGyn* (2004)190, 422-7
34. Gissler, M, et.al., (1997) “Pregnancy associated deaths in Finland 1987-1994, *Acta Obstetrica et Gynecologica Scandinavica* 76:651-657
35. Garfinkle, B., et. al., “Stress, Depression, and Suicide: A study of Adolescents in Minnesota” (Minneapolis: Univ Minnesota Extension Service, 1986
36. McCaffrey M: Abortion’s Impact on Prematurity: Closing the knowledge gap. *Issues in Law & Medicine* 2017;32(1):43-52
37. Liao et al, Repeated medical abortions and the risk of preterm birth in the subsequent pregnancy, *Arch Gynecol Obstet* (2011) 284:579–586
38. Hanes M. Swingle, Tarah T. Colaizy, M. Bridget Zimmerman & Frank H. Morriss, Jr., Abortion and the Risk of Subsequent Preterm Birth: A Systematic Review with Meta-analyses, *J Reprod Med*. 2009; 54:95-108
39. van Oppenraaij RH, Jauniaux E, Christiansen OB, Horcajadas JA, Farquharson RG, Exalto N; ESHRE Special Interest Group for Early Pregnancy (SIGEP). Predicting adverse obstetric outcome after early pregnancy events and complications: a review. *Human Reproduction Update Advance Access* 7 March 2009; 1(1):1-13
40. McCaffrey M: The Burden of Abortion and the Preterm Birth Crisis. *Issues in Law & Medicine* 2017;32(1):73-98.
41. Hardy, G, Benjamin A, Abenheim, H.A., Effect of induced abortions on early preterm births and adverse perinatal outcomes. *J Obstet Gynaecol Can* 2013; 35(2):138–143
42. Watson LF, Rayner J, King J, Jolley D, Forster D, Lumley J. Modelling prior reproductive history to improve prediction of risk for very preterm birth. *Paediatric and Perinat Epidem* 2010; 24: 402-415.
43. Watson LF, Rayner J, King J, Jolley D, Forster D, Lumley J. Modelling sequence of prior pregnancies on subsequent risk of very preterm birth. *Paediatric and Perinat Epidem* 2010; 24: 416-23.
44. Bhattacharya S, Raja EA, Mirazo ER, Campbell DM, Lee AJ, Norman JE, Bhattacharya S. Inherited predisposition to spontaneous preterm delivery. *Obstet & Gynecol* 2010; 115(6): 1124-133.
45. Voigt M, Henrick W, Zygmunt M, Friese K, Straube S, Briese V. Is induced abortion a risk factor in subsequent pregnancy? *J Perinat Med* 2009; 37: 144-149.
46. Yuan W, Duffner AM, Chen L, Hunt LP, Sellers SM, Bernal AL. Analysis of preterm deliveries below 35 weeks’ gestation in a tertiary referral hospital in the UK: A case-control study. *BioMed Central* 2010;3: 119-28.
47. Grote NK, Bridge JA, Gavin AR, Melville JL, Iyengar S, Katon WJ. A meta-analysis of depression during pregnancy and the risk of preterm birth, low birth weight and intrauterine growth restriction. *Arch Gen Psychiatry* 2010; 67(10): 1012-1024
48. Anum EA, Brown HL, Strauss JF. Health disparities in risk for cervical insufficiency. *Human Repro* 2010 open access. Oxford University Press. Doi:10.1093. vol.0, no. 0 pp 1-7, 2010.
49. Reime B, Schuecking BA, Wenzlaff P. Reproductive Outcomes in Adolescents Who Had a Previous Birth or an Induced Abortion Compared to Adolescents’ First Pregnancies. *BMC Pregnancy and Childbirth* 2008; 8:4.

50. Freak-Poli R, Chan A, Gaeme J, Street J. Previous abortion and risk of preterm birth: a population study. *J Maternal-Fetal Med* Jan. 2009; 22(1):1-7
51. B. Rooney, E. Shdigian, B. Calhoun, Cost consequences of induced abortion as an attributable risk for preterm birth and impact on informed consent. *J Reprod Med*. 2007 Oct; 52(10):929-37.
52. Shah PS, Zao J. Induced termination of pregnancy and low birthweight and preterm birth: a systematic review and meta-analysis. *BJOG* 2009; 116:1425-1442.
53. Calhoun, B, Rooney, B; Induced Abortion and Risk of Later Premature Birth; (*Journal of American Physicians and Surgeons*, Vol 8, #2, 2003.
54. Jay D. Iams, MD; Vincenzo Berghells, MD. Care for women with prior preterm birth. *American Journal of Obstetrics & Gynecology*. August 2010; 203(3):89-100
55. Bibliography of 122 studies showing an association between abortion and prematurity from the 1960s to the early 2000s: <https://aaplog.org/bibliography-of-122-studies/>
56. Lumley, "The epidemiology of Pre-term birth, Baillieres "Clinical OBGYN, 1993:7(3)477-498).
57. Voigt M, Olbertz D, Fusch C, Krafczyk D, Briese V, Schneider KT. The influence of previous pregnancy terminations, miscarriages and still-births on the incidence of babies with low birth weight and premature births as well as a somatic classification of newborns. *Z Geburtshilfe Neonatol*. 2008 Feb; 212(1):5-12
58. Ancel P, et al. History of induced abortion as a risk factor for preterm birth in European countries: results of the EUROPOP survey. *Hum Reprod* 2004; 19:734-40.
59. Moreau C, et al. Previous induced abortions and the risk of very preterm delivery: results of the EPIPAGE study. *Br J Obstet Gynaecol* 2005; 112:430-437.
60. Burguet A. The Complex Relationship between Smoking in Pregnancy and Very Preterm Delivery. Results of the EPIPAGE Study. *Br J Obstet Gynaecol* 2004; 111:258-265.
61. Thorp, et. al., Long term Physical and Psychological Health Consequences of Induced Abortion: Review of the Evidence; *Obstet Gynecol Surv*. 2003 Jan; 58(1):67-79.
62. Saccone G, Perriera L, Berghella V. Prior uterine evacuation of pregnancy as independent risk factor for preterm birth: a systematic review and metaanalysis. *Am J Obstet Gynecol*. 2016 May;214(5):572-91.
63. Lemmers M, Verschoor MA, Hooker AB, Opmeer BC, Limpens J, Huirne JA, Ankum WM, Mol BW. Dilatation and curettage increases the risk of subsequent preterm birth: a systematic review and meta-analysis. *Hum Reprod*. 2016 Jan;31(1):34-45.
64. Bieman, W. *The Heart and the Abyss, Preventing Abortion*. Connor Court Publishing, Ballart VIC. Kindle location 2751.
65. Fergusson, L.J. et al. Does abortion reduce the mental health risks of unwanted or unintended pregnancy? A reappraisal of the evidence. *Australian and New Zealand Journal of Psychiatry*, 30(13). 47(9), pp. 819-827
66. Mota, Burnett, and Sareen, Associations Between Abortion, Mental Disorders, and Suicidal Behaviour in a Nationally Representative Sample, *Canadian Journal of Psychiatry*, Vol 55, No 4, April 2010, 239-247
67. Coleman Priscilla K. Abortion and mental health: quantitative synthesis and analysis of research published 1995–2009, *The British Journal of Psychiatry* (2011)199, 180–186
68. AAPLOG Complete Bibliography on Abortion and Mental Health: <https://aaplog.org/complete-bibliography-on-abortion-and-mental-health/>
69. Reardon, et.al., Psychiatric admissions of low-income women following abortion and childbirth, *Canadian Med Assn J*, May 13, 2003 168 (10), 1253-1256.
70. Fergusson DM, Horwood JL, & Boden JM (2008). Abortion and mental health disorders: evidence from a 30-year longitudinal study, *The British Journal of Psychiatry* (2008) 193: 444-451
71. Pedersen, W; Abortion and depression: A population-based longitudinal study of young women; *Scandinavian Journal of Public Health*, volume 36, 2008 pages 424–428.
72. Dingle, K., Alati, R., Clavarino, A. et al. (2008) Pregnancy loss and psychiatric disorders in young women: an Australian birth cohort study. *The British Journal of Psychiatry* 193: 455-460.
73. Rees, D. I. & Sabia, J. J. (2007). The relationship between abortion and depression: New Evidence from the Fragile Families and Child Wellbeing Study. *Medical Science Monitor* 13(10): 430-436.

74. Fergusson, D.M. Horwood, L.J., Ridder, E.M.: Abortion in young women and subsequent mental health, *J. of Child Psychology and Psychiatry*, Vol 47:1 2006. Pages: 16-24
75. Coleman, P, Induced Abortion and Increased Risk of Substance Abuse: a Review of the Evidence. *Current Women's Health Reviews*, 2005, Vol 1,21-34
76. Coleman, et.al., Substance use among pregnant women in the context of previous reproductive loss (abortion, miscarriage, stillbirth) and desire for current pregnancy; *Brit J of Health Psychology*, 2005, 10, 255-268.
77. Reardon, D. C., Coleman, P. K., & Cogle, J. (2004) Substance use associated with prior history of abortion and unintended birth: A national cross sectional cohort study. *Am. Journal of Drug and Alcohol Abuse*, 26, 369-383
78. Reardon, et.al., Psychiatric admissions of low-income women following abortion and childbirth, *Canadian Med Assn J*, 2003, 168 (10), 1253-1256
79. Coleman et.al. History of induced abortion in relation to substance use during subsequent pregnancies carried to term, *AJOG*, 2002, 187, 1673-1678
80. AAPLOG Response to the APA Task Force Report: [aaplog.org/aaplog-response-to-the-apa-task-force-report-2/](http://aaplog.org/aaplog-response-to-the-apa-task-force-report-2/)
81. Biggs MA, Upadhyay UD, McCulloch CE, Foster DG. Women's Mental Health and Well-being 5 Years After Receiving or Being Denied an Abortion: A Prospective, Longitudinal Cohort Study. *JAMA Psychiatry*. 2017;74(2):169-178.
82. Horvath S, Schreiber CA. Unintended Pregnancy, Induced Abortion, and Mental Health. *Curr Psychiatry Rep*. 2017 Sep 14;19(11):77.
83. Daugirdaitė V, van den Akker O, Purewal S. J. Posttraumatic stress and posttraumatic stress disorder after termination of pregnancy and reproductive loss: a systematic review. *Journal of Pregnancy*, 2015; Article number 646345.
84. Toffol E, Pohjoranta E, Suhonen S, Hurskainen R, Partonen T, Mentula M, Heikinheimo O. Anxiety and quality of life after first-trimester termination of pregnancy: a prospective study. *Acta Obstet Gynecol Scand*. 2016 Oct;95(10):1171-80.
85. Korenromp, M. J. et al. Long-term psychological consequences of pregnancy termination for fetal abnormality: a cross-sectional study. *Prenatal Diagnosis*, 2005, 25(3): 253–260.
86. Henshaw, R. et al. Psychological responses following medical abortion (using mifepristone and gemeprost) and surgical vacuum aspiration. A patient-centered, partially randomized prospective study. *Acta Obstetrica et Gynecologica Scandinavica*, 1994 (73) pp. 812-818
87. Bellieni, C., & Buonocore, G. (2013). Abortion and subsequent mental health: Review of the literature. *Psychiatry and Clinical Neurosciences*, 67(5), 301–310.
88. Bradshaw, Z. & Slade, P. (2003). The effects of induced abortion on emotional experiences and relationships: A critical review of the literature. *Clinical Psychology Review*, 23, (7), 929-958.
89. Broen, A. N., Moum, T., Bodtker, A. S., & Ekeberg, O. (2004). Psychological impact on women of miscarriage versus induced abortion: A 2-year follow-up study. *Psychosomatic Medicine* 66: 265-71.
90. Broen, A. N., Moum, T., Bodtker, A. S., & Ekeberg, O. (2005) Reasons for induced abortion and their relation to women's emotional distress: A prospective, two-year follow-up study. *General Hospital Psychiatry* 27: 36-43.
91. Coleman, P. K. (2006). Resolution of unwanted pregnancy during adolescence through abortion versus childbirth: Individual and family predictors and psychological consequences. *The Journal of Youth and Adolescence*, 35, 903- 911.
92. Coleman, P. K., Reardon, D. C., Rue, V., & Cogle, J. (2002b). State-funded abortions vs. deliveries: A comparison of outpatient mental health claims over four years. *The American Journal of Orthopsychiatry*, 72, 141-152.
93. Coleman, P. K., Reardon, D. C., Strahan, T., & Cogle, J. (2005). The psychology of abortion: A review and suggestions for future research. *Psychology & Health*, 20, 237- 271.
94. Cogle, J.R., Reardon, D.C. & Coleman, P.K. (2003). Depression associated with abortion and childbirth: A long-term analysis of the NLSY cohort. *Medical Science Monitor*, 9 (4), CR 105-112.
95. Cogle, J., Reardon, D. C., & Coleman, P. K. (2005). Generalized anxiety associated with unintended pregnancy: A cohort study of the 1995 National Survey of Family Growth. *Journal of Anxiety Disorders*, 19 (10), 137-142.
96. Dingle, K., et al. (2008). Pregnancy loss and psychiatric disorders in young women: An

- Australian birth cohort study. *The British Journal of Psychiatry*, 193, 455-460. 28.
97. Gissler, M., et al. (2005). Injury deaths, suicides and homicides associated with pregnancy, Finland 1987-2000. *European Journal of Public Health*, 15, 459-463.
  98. Gissler M, Karalis E, Ulander VM. Decreased suicide rate after induced abortion, after the Current Care Guidelines in Finland 1987-2012. *Scand J Public Health* 2015;43(1):99-101.
  99. Gong, X., Hao J., Tao, F., Zhang, J., Wang, H., & Xu, R. (2013). Pregnancy loss and anxiety and depression during subsequent pregnancies: data from the C-ABC study. *European Journal of Obstetrics & Gynecology and Reproductive Biology*, 166(1),30–36.
  100. McCarthy, F. P., Moss-Morris, R., Khashan, A. S., et al. (2015). Previous pregnancy loss has an adverse impact on distress and behaviour in subsequent pregnancy. *BJOG*, 122, 1757-1764.
  101. Mota, N.P. et al (2010). Associations between abortion, mental disorders, and suicidal behaviors in a nationally representative sample. *The Canadian Journal of Psychiatry*, 55 (4), 239-246.
  102. Pedersen, W. (2007). Addiction, childbirth, abortion and subsequent substance use in young women: a population-based longitudinal study, 102 (12), 1971-78.
  103. Söderberg, H., Janzon, L., & Sjöberg, N-O. (1998). Emotional distress following induced abortion: A study of its incidence and determinants among abortees in Malmö, Sweden. *European Journal of Obstetrics & Gynecology and Reproductive Biology*, 79, 173-178.
  104. Sullins, P. D. (2016). Abortion, substance abuse and mental health in early adulthood: thirteen-year longitudinal evidence from the United States. *Sage Open Medicine*, 4.
  105. Coleman, P. Personal communication.
  106. Howe, H.L. et al. Early Abortion and Breast Cancer Risk among Women under Age 40. *International Journal of Epidemiology* 1989. 18(2). pp. 300-304.
  107. Brind, J, Chinchilli, V M Severs, W B and Summy-Long, J. Induced abortion as an independent risk factor for breast cancer: a comprehensive review and meta-analysis. *J Epidemiol Community Health*. 1996 Oct; 50(5): 481–496.
  108. Guo J, Huang Y, Yang L, Xie Z, Song S, Yin J, Kuang L, Qin W. Association between abortion and breast cancer: an updated systematic review and meta-analysis based on prospective studies. *Cancer Causes Control*. 2015 Jun;26(6):811-9.
  109. Deng Y, Xu H, Zeng X. Induced abortion and breast cancer: An updated meta-analysis. *Medicine (Baltimore)*. 2018 Jan;97(3):e9613.
  110. Innes, K.E, Byers, T.E. First Pregnancy Characteristics and Subsequent Breast Cancer Risk Among Young Women. *Int. J. Cancer*. 2004. 112, pp. 306-311. Anderson J, American College of Pediatrics. Information for the Adolescent Woman and Her Parents: Abortion and the Risk of Breast Cancer. . *Issues in Law & Medicine*; 32(1) 99-104
  111. Lecarpentier, J. et al. Variation in breast cancer risk associated with factors related to pregnancies according to truncating mutation location, in the French National BRCA1 and BRCA2 mutations carrier cohort (GENEPSO). *Breast Cancer Research* 2012. 14:R99. <https://breast-cancer-research.biomedcentral.com/articles/10.1186/bcr3218>. Accessed 11/24/2018.
  112. Dolle, J.M. et al. Risk Factors for Triple-Negative Breast Cancer in Women Under the Age of 45 Years. *Cancer Epidemiol Biomarkers Prev* 2009. 18(4) pp. 1157-166.
  113. Daling, J.R., et al. Risk of Breast Cancer Among Young Women: Relationship to Induced Abortion. *Journal of the National Cancer Institute*, 1994. 86 (21) pp.1584-1592.
  114. Induced abortion and subsequent breast cancer risk: An Overview, <https://aaplog.org/induced-abortion-and-subsequent-breast-cancer-risk-an-overview/>
  115. Brind J. Abortion-Breast Cancer Link: Review of Recent Evidence from Asia. *Issues in Law and Medicine*; 32 (2): 325-334.
  116. Brind J; (Winter 2005) Induced Abortion as an Independent Risk Factor for Breast Cancer: A Critical Review of Recent Studies Based on Prospective Data *J. Amer Physicians & Surgeons*; Vol 10, #4. P. 105-110
  117. Brind J, (Sum 07) Induced Abortion and Breast Cancer Risk: A Critical Analysis of the Report of the Harvard Nurses Study II; *J Amer P&S*; Vol 12,#2
  118. Segi M, et al. An epidemiological study on cancer in Japan. *GANN*. 48 1957;1–63
  119. Watanabe H, et al. Epidemiology and clinical aspects of breast cancer. [in Japanese], *Nippon Rinsho* 26, no. 8. 1968; 1843–1849
  120. Dvovyrin VV, et al. Role of women’s reproductive status in the development of breast cancer. *Methods*

- and Progress in Breast cancer Epidemiology Research Tallin 1978; 53-63.
121. Pike MC, et al. Oral contraceptive use and early abortion as risk factors for breast cancer in young women. *Br J Cancer* 43, no. 1. 1981; 72-6.
  122. Nishihyama, F. The epidemiology of breast cancer in Tokushima prefecture. *Shikoku Ichi* 1982; 38:333-43 (in Japanese).
  123. Brinton LA, et al. Reproductive factors in the etiology of breast cancer. *Br J Cancer* 1983, 47(6):757- 762.
  124. Hirohata T, et al. Occurrence of breast cancer in relation to diet and reproductive history: a case-control study in Fukuoka, Japan. *Natl Cancer Inst Monographs*, 1985. 69. 187-90.
  125. LaVecchia C, et al. General epidemiology of breast cancer in northern Italy. *Intl J of Epidemiol.* 1987; 16 (3):347-355.
  126. Ewertz M, et al. Risk of breast cancer in relation to reproductive factors in Denmark. *Br J Cancer* 58(1) 1988:99-104.
  127. Luporsi E. (1988), in Andrieu N, Duffy SW, Rohan TE, Le MG, Luporsi E, Gerber M, Renaud R, Zaridze DG, Lifanova Y, Day NE. Familial risk, abortion and their interactive effect on the risk of breast cancer—a combined analysis of six case-control studies. *Br J Cancer* 1995; 72:744-751.
  128. Lanfranchi A. Induced Abortion and Breast Cancer. *Issues in Law & Medicine*; 30(2):143-152
  129. Brind J. Abortion and Breast Cancer: Recent Evidence Confirms a Robust Link. *Issues in Law & Medicine*; 30(2):153-158.
  130. Brind J, Condly SJ, Lanfranchi A, Rooney B. Induced Abortion as an Independent Risk Factor for Breast Cancer: A Systematic Review and Meta-analysis of Studies on South Asian Women. *Issues in Law & Medicine*; 33 (1): 33-54
  131. Delgado G, Condly SJ, Davenport M, Tinnakornsriruphap T, Mack J. A Case Series Detailing the Successful Reversal of the Effects of Mifepristone Using Progesterone. *Issues in Law & Medicine*; 33 (1): 21-32.

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