GYNECOLOGY

Impact of a theory-based video on initiation of long-acting reversible contraception after abortion

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OBJECTIVE: Adoption of long-acting reversible contraception (LARC) (ie, the intrauterine device or the contraceptive implant) immediately after abortion is associated with high contraceptive satisfaction and reduced rates of repeat abortion. Theory-based counseling interventions have been demonstrated to improve a variety of health behaviors; data on theory-based counseling interventions for post-abortion contraception are lacking.

STUDY DESIGN: Informed by the transtheoretical model of behavioral change, a video intervention was developed to increase awareness of, and dispel misconceptions about, LARC methods. The intervention was evaluated in a randomized controlled trial among women aged 18-29 years undergoing surgical abortion at a clinic in Chicago, IL. Participants were randomized 1:1 to watch the intervention video or to watch a stress management video (control), both 7 minutes in duration. Contraceptive methods were supplied to all participants free of charge. Rates of LARC initiation immediately after abortion were compared.

RESULTS: Rates of LARC initiation immediately after abortion were not significantly different between the 2 study arms; 59.6% in the intervention and 51.6% in the control arm chose a LARC method ($P = .27$).

CONCLUSION: This study resulted in an unexpectedly high rate of LARC initiation immediately after abortion. High rates of LARC initiation could not be attributed to a theory-based counseling intervention.

Key words: abortion, counseling, long-acting reversible contraception

Cite this article as: Davidson AS, Whitaker AK, Martins SL, et al. Impact of a theory-based video on initiation of long-acting reversible contraception after abortion. Am J Obstet Gynecol 2015;212:310.e1-7.

Despite the availability of highly effective contraception, repeat abortion accounts for 50% of all abortion procedures in the United States.[1] The majority of women undergoing abortion expect to leave their visit with contraception.[2] Therefore, the abortion visit is an important time to ensure that women can initiate contraception.

Initiation of a long-acting reversible contraception (LARC), the intrauterine device (IUD) or the contraceptive implant, immediately after abortion, is associated with decreased rates of repeat abortion.[3-5] Approximately 8% of women undergoing abortion procedures initiate a LARC immediately after abortion.[6] There is evidence that a number of factors prevent LARC initiation immediately after abortion. First, women lack awareness and knowledge of LARC.[7-9] Second, misconceptions about the risks and side effects of these methods are common.[10] Third, only an estimated 30% of abortion facilities offer LARC services immediately after abortion.[6] Finally, the high cost of LARC devices and insertion fees render them prohibitively expensive for many women without adequate insurance coverage.[11]

Although there are a host of barriers to accessing contraception at the time of abortion, counseling can increase awareness and knowledge as well as dispel misconceptions about contraception. Most studies evaluating the effects of contraceptive counseling at the abortion visit have found no significant impact on the postabortal contraceptive method choice or continuation.[12-15] Yet one criticism of these studies is that the counseling approaches were not grounded in behavioral theory.[16]

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Received June 26, 2014; revised Aug. 27, 2014; accepted Sept. 24, 2014.

The views expressed herein are those of the authors and do not necessarily represent the official views of the Society of Family Planning.

This study was supported by grant SFPRF13-6 from the Society of Family Planning Research Fund, Philadelphia, PA.

The authors report no conflict of interest.

Presented at the 2014 annual meeting of the Fellowship in Family Planning, Chicago, IL, April 25-27, 2014.

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0002-9378/$36.00 • http://dx.doi.org/10.1016/j.ajog.2014.09.027

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Theory-based counseling interventions have been used to promote complex behaviors in a variety of clinical settings and have demonstrated promise in contraception counseling outside abortion settings.[16] Brief theory-based interventions providing focused information and an opportunity to address potential barriers to behavior change tend to report the strongest effects.[17,18]

The Prochaska's transtheoretical model (TTM) describes the 5 stages of change through which individuals move when adopting a new behavior: precontemplation (not considering the behavior), contemplation (considering the behavior), preparation (preparing to undertake the behavior), action (practicing the behavior), and maintenance (continuing the behavior).[19] According to the TTM, individuals may start at any stage and may not complete progress through all stages. Movement between stages is largely driven by 2 core constructs: decisional balance (perceived pros and cons of the behavior) and self-efficacy (confidence in one's ability to perform the behavior).

Given that few women opt to initiate LARC immediately after an abortion, this study focused on presenting LARC as highly effective but underused methods that are particularly prone to myths and misconceptions. The tenets of the TTM were used to develop a theory-based video intervention that was evaluated in a randomized controlled trial (RCT) for its impact on the rates of LARC initiation among women undergoing surgical abortion.

Materials and Methods

This study was a randomized (1:1) parallel-group, single-blind trial comparing the rates of LARC initiation immediately after abortion between women assigned to a brief, theory-based video intervention and those assigned to a control video, both prior to routine contraceptive counseling. All study protocols and procedures were approved by The University of Chicago Biological Sciences Division Institutional Review Board.

Video intervention development

The video intervention was developed using the TTM as a framework, assuming that most abortion patients would be in TTM stages of precontemplation or contemplation for LARC uptake. The video featured messages delivered by a health care provider as well as peers (real women sharing their postabortal LARC experiences). Consistent with the TTM, video content was designed to facilitate LARC initiation by increasing women's awareness of LARC, helping women weigh the pros and cons of LARC use and gain self-efficacy for using LARC in the postabortal period.

The video intervention was comprised of 3 segments and delivered on an iPAD. The first segment featured a health care provider delivering basic information about the 3 LARC methods (ie, levonorgestrel IUD [LNG-IUD], copper IUD, and contraceptive implant). The second and third segments featured narrative comments from patients who had used a LARC following a surgical abortion.

To create the health care provider segment, a physician was invited to read a scripted text describing the mechanisms of action, side effects, and efficacy of the 3 LARC methods. The physician showed replicas of each device and emphasized the safety, ease of use, and effectiveness of all 3 methods in the immediate postabortal period.

To create the patient narrative comments, women who were demographically similar to the study population and who had initiated LARC immediately after abortion were recruited to participate in the development of the intervention. Three women agreed to participate. Patient narrative comments were elicited with interview questions scripted in accordance with the TTM. Women discussed how and why they decided to use LARC, their impression of the insertion procedure, and their overall experience with the method including how they had managed any negative aspects of LARC use.

The videos were then edited by 2 videographers, resulting in 2 unique versions of each segment, for a total of 8 video segments. The physician segments were each 4 minutes in length, whereas the patient narratives ranged from 2 to 4 minutes in length. These 8 segments were pilot tested for acceptability, likability, and length by 13 women presenting for a medical abortion follow-up appointment at a reproductive health clinic in Chicago, IL.

This population was chosen because it was demographically similar to the RCT study population, yet the women had more time to participate than women presenting for surgical abortion. The participants viewed all 8 video segments and then gave written and verbal feedback about each video. Based on the pilot testing, 3 segments were selected and combined to create the final video intervention: the health care provider and 2 patient narratives, one about the LNG-IUD and one about the implant. The copper IUD was described in the provider segment; however, to keep the intervention brief, a testimonial from a woman using a copper IUD was not incorporated into the final video. The final video was 7 minutes in duration. The individual video segments are available for viewing online. Participants received $50 for creating the video and $10 for pilot testing.

Setting and participants

The video intervention was evaluated in an RCT conducted between June and September 2013 in a free-standing clinic in Chicago, IL. The study clinic provides more than 5000 surgical abortions annually. Approximately one-third of women seen at the study clinic have publicly funded health insurance (Medicaid), approximately one-third have private insurance, and the remainder are uninsured. Medicaid recipients are eligible for all contraceptive methods without copay, and privately insured patients receive contraception as stipulated by their insurance policy, many of whom in 2013 had copays or deductibles. Uninsured women receive 1 pack of pills, patch, or ring at their abortion visit free of charge.

Inclusion criteria for the study were age 18-29 years, presenting for a surgical abortion, and not desiring pregnancy in the next 12 months. Exclusion criteria were nonviable or anomalous pregnancy, pregnancy as a result of