



ECPs

Emergency contraceptive pills: information for policy-makers and providers

- ECPs offer women a “second chance” to prevent unwanted pregnancy.
- Emergency contraception is meant for emergencies only. ECPs are not as effective as the regular use of reversible contraception.
- ECPs can prevent pregnancy up to 5 days after unprotected sexual intercourse, but are more effective the sooner they are taken.
- ECPs are safe for all women.
- ECPs do not disrupt an established pregnancy or harm a developing embryo.
- ECPs do not discourage regular contraceptive use.

Summary: Unprotected sexual intercourse results in millions of unplanned and unwanted pregnancies worldwide each year. Many of these pregnancies — as well as the health risks and costs associated with them — could be avoided if emergency contraceptive pills were more widely available and easily accessible to women.

What are emergency contraceptive pills?

Emergency contraceptive pills (ECPs) are a method of contraception that can be used by women *after* unprotected or coerced sexual intercourse, contraceptive failure (such as condom breakage), or incorrect use of regular contraception to significantly reduce the risk of unwanted pregnancy. Although the pills are sometimes referred to as “morning-after pills” or “postcoital contraception,” they can be taken up to five days after unprotected intercourse.¹ They are more effective, however, if taken sooner. Emergency contraceptive pills are intended for emergencies or as contraceptive backup rather than as an ongoing, primary method of contraception.

Emergency contraceptive pills contain the hormones found in oral contraceptive pills — either progestin only or progestin plus estrogen — but in higher doses.² In several countries, ECPs are available as dedicated products packaged specifically as emergency contraception. Alternatively, standard oral contraceptive pills can be taken in modified dosages.

How effective are emergency contraceptive pills?

Emergency contraceptive pills are usually taken in two doses: one as soon as possible after unprotected intercourse and a second one 12 hours later. However, recent study results indi-

cate that a taking both doses of a progestin, or levonorgestrel, product can substitute for two doses 12 hours apart.³ Depending on the formulation used, ECPs reduce the risk of pregnancy from a single act of intercourse by up to 85 percent if the first dose is taken within 72 hours (three days) of intercourse.⁴ Some research suggests that ECPs are more effective the sooner after intercourse they are taken.⁵ Additional research indicates that they continue to offer some protection if taken up to 120 hours (five days) after intercourse.⁶

How safe are emergency contraceptive pills?

Emergency contraceptive pills are safe for all women. Because ECPs are used on a temporary basis, the contraindications that accompany standard oral contraceptive pills and many other methods of hormonal contraception do not apply. Emergency contraceptive pills should not be given to women who are already pregnant, only because they will not be effective.

Emergency contraceptive pills are not associated with any long-term or serious side effects. Women who use them may experience nausea and vomiting, but these side effects usually subside within a few days. The risk of nausea and vomiting is much lower for women who take the progestin-only ECP formulation. Other

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Emergency contraceptive pills should be included as a standard component of reproductive health programs and policies worldwide. Decades of research have proven that they are a safe and effective method of contraception. When regular methods of contraception are not used or fail, ECPs are vital in preventing unwanted pregnancies and abortions, as well as the associated health risks and costs.

possible but less common side effects include fatigue, headache, dizziness, menstrual disturbances, and breast tenderness.

How do emergency contraceptive pills work? Like all hormonal methods of contraception, ECPs have several potential mechanisms.^{7,8} The exact mechanism of action may depend on when the pills are taken in relation to the time of ovulation. It takes at least five days for a pregnancy – defined as implantation, or attachment of a fertilized egg to the lining of the uterus – to be established after unprotected intercourse. ECPs work to prevent pregnancy in one or more of the following ways: by inhibiting or delaying ovulation; by preventing fertilization; or by altering the receptivity of the uterine lining. In all cases, ECPs prevent pregnancy by acting before implantation of a fertilized egg. They cannot disrupt an established pregnancy or harm a developing embryo.

Who can distribute emergency contraceptive pills? According to regulations and practices in various settings, emergency contraceptive pills are distributed on a prescription-only basis (sometimes with an advance prescription to be used if needed), directly by a pharmacist, or over the counter along with other non-prescription medicines. In certain locales, nurses, midwives, and community health workers also distribute ECPs.

Will emergency contraceptive pill use discourage regular contraceptive use? Studies from India,⁹ Ghana,¹⁰ the United Kingdom,¹¹ and the United States¹² suggest that advance provision of ECPs is not associated with abandonment of traditional contraception. In fact, ECP provision can provide an additional opportunity for women – including adolescents – to receive counseling and other family

planning services to reduce their pregnancy risks and improve their overall reproductive health.

¹ Von Hertzen H, Piaggio G, Ding J, et al. Low dose mifepristone and two regimens of levonorgestrel for emergency contraception: a WHO multicentre randomized trial. *Lancet* 2002;360(9348):1803-1810.

² Typically, progestin-only ECPs contain 0.75 mg levonorgestrel, and combined formulations contain 0.5 mg levonorgestrel and 0.1 mg ethinyl estradiol.

³ Von Hertzen H, Piaggio G, Ding J, et al. Low dose mifepristone and two regimens of levonorgestrel for emergency contraception: a WHO multicentre randomized trial. *Lancet* 2002;360(9348):1803-1810.

⁴ Task Force on Postovulatory Methods of Fertility Regulation. Randomised controlled trial of levonorgestrel versus the Yuzpe regimen of combined oral contraceptives for emergency contraception. *Lancet* 1998;352(9126):428-33; Trussell J, Rodriguez G, Ellertson C. Updated estimates of the effectiveness of the Yuzpe regimen of emergency contraception.

⁵ Task Force on Postovulatory Methods of Fertility Regulation.

⁶ Rodrigues I, Grou F, Joly J. Effectiveness of emergency contraceptive pills between 72 hours and 120 hours after unprotected sexual intercourse. *Am J Obstet Gynecol* 2001;184(4):531-37.

⁷ International Consortium for Emergency Contraception. Policy Statement: How Do Emergency Contraceptive Pills Work to Prevent Pregnancy?

Available: <http://www.cecinfo.org/files/ICEC%20-%20Mechanism%20of%20Action%20Policy%20Statement%202003.pdf>. July 2003.

⁸ Croxatto HB, Devoto L, Durand M, et al. Mechanism of action of hormonal preparations used for emergency contraception: a review of the literature. *Contraception* 2001;63(3):111-21.

⁹ Ellertson C, Ambardekar S, Hedley A, et al. Emergency contraception: randomized comparison of advance provision and information only. *Obstet Gynecol* 2001;98(4):570-75.

¹⁰ Lovvom A, Nerquaye-Tetteh J, Glover EK, et al. Provision of emergency contraceptive pills to spermicide users in Ghana. *Contraception* 2000;61(4):287-93.

¹¹ Glasier A, Baird D. The effects of self-administering emergency contraception. *N Engl J Med* 1998;339:1-4.

¹² Raine T, Harper C, Leon K, et al. Emergency contraception: advance provision in a young, high-risk clinic population. *Obstet Gynecol* 2000;96:1-7.

For additional information, please visit these Web sites:

Consortium for Emergency Contraception:

<http://www.cecinfo.org>

Emergency Contraception Website: <http://not-2-late.com> or

<http://ec.princeton.edu>

Family Health International:

<http://www.fhi.org/en/topics/listings/emergcontralist.html>

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