

Background

Currently recommended options for emergency contraception (EC) include an emergency contraceptive pill or a copper intrauterine device (IUD). Copper IUDs are considered the most effective method of EC, and all copper IUDs available in Australia can be used for EC. There has been interest in whether hormonal IUDs might also be used as emergency contraception because there are a number of potential advantages to using the 52 mg levonorgestrel (LNG) IUD as EC in Australia. (1) A 2021 randomised controlled trial found the 52mg levonorgestrel intrauterine device (52mg LNG IUD) was non inferior to a copper T380A IUD for emergency contraception (EC). (2) Although this is encouraging the 52 mg LNG IUD is still currently not recommended as a first line method of EC.

The overall risk of pregnancy, including ectopic pregnancy, is reduced with an IUD. However, in the rare situation when conception occurs in the presence of an IUD, there is a much greater likelihood of ectopic pregnancy and clinicians need to consider and exclude this diagnosis. (3)

Limitations to the study

The number of pregnancies estimated to occur in each group without the use of EC was not calculated. It may be that those randomised to the 52 mg LNG IUD had a lower risk of pregnancy compared to those randomised to a copper IUD. For instance, those randomised to the 52 mg LNG IUD were more likely to have used some type of contraception at time of last unprotected sex, so could potentially be at a lower risk of pregnancy than those who were randomised to a T380A IUD.

Potential advantages of 52 mg LNG IUD as EC

In Australia, the cost of the 52 mg LNG IUD is subsidised by the pharmaceutical benefits scheme, and there is evidence that users are more likely to choose a 52mg LNG IUD than a Cu IUD for long term use. (3, 4) There are more primary care providers of IUD insertion who are familiar and experienced with 52mg LNG IUD insertion than copper IUD insertion, which may increase access. However, despite this general preference for 52mg LNG IUDs, follow up of the IUD EC study participants showed discontinuation rates at one year were similar between those randomised to the 52 mg LNG IUD compared to those randomised to the copper T380A IUD. (5)

Risks if pregnancy occurred

Greater certainty that 52 mg LNG IUDs are as effective as copper IUDs as EC is required before it can be recommended due to the potential for pregnancy complications. Around 50% and 17% of pregnancies that occur with a 52 mg LNG IUD and a Cu IUD in place respectively, are ectopic. (6-8). If the pregnancy is intrauterine and the IUD cannot be removed, there is a risk of premature delivery or late miscarriage. (9) Further, there is more potential for delay in diagnosis of pregnancy with the 52 mg LNG IUD, due to changes in bleeding which occur while using the IUD, and medical abortion is contraindicated with an IUD in situ. (10) Note the IUD can be removed in many cases and the pregnancy is then treated as normal. (11)

Recommendations

With the currently available evidence, the 52 mg LNG IUD is **not** recommended as first line for EC but off-label use with informed consent may be considered if the person is aware:

- that the current recommendations for emergency contraception are a copper IUD, ulipristal 30mg or levonorgestrel 1.5 mg
- that the 52 mg LNG IUD might be less effective than a copper IUD as EC
- that while the copper IUD is immediately effective as contraception the levonorgestrel IUD will not provide ongoing contraceptive cover for 7 days.
- of the potential risks of ectopic pregnancy
- of the risk to an ongoing pregnancy if the IUD cannot be removed.

For guidance on safe use and time frames of use for EC see the [FSRH Guideline Emergency Contraception](#) . (12)

References

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