Severe haemorrhage after medically and surgically induced abortion

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Abstract

In choosing between medical and surgical abortion and planning regimens for medically induced abortions knowledge about the risk of severe bleeding complications is important.

Aim. To assess the risk and timing of transfusion demanding bleeding after medically and surgically induced first trimester abortions, and to explore the influence of the gestational age (GA) and the woman's age on this risk.

Design. Historical follow-up study. Follow-up time 12 weeks.

***Material and methods*.** All induced first trimester abortions in Denmark during 1998-2006 covered by available population-based transfusion registries were included. A total of 16,872 medical and 58,994 surgical first trimester abortions fulfilled these criteria. The effect of type of abortion, GA, and woman's age was examined in a multivariate model assessing the risk of at least one blood transfusion within the 12 weeks of follow-up.

Results. Among 62,851 women undergoing 75,866 induced abortions 119 women received 170 blood transfusions during the 12-week follow-up period. The crude risk of at least one transfusion within the follow-up period was 0.41% after medical and 0.09% after surgical abortion. For medical abortion, the risk of transfusion increased by an adjusted relative risk (RR) of 1.31 (95% CI 1.09-1.58) per each one week increase in GA, whereas the woman's age did not influence the risk. In contrast, the risk of transfusion after surgical abortion was not influenced by GA but increased significantly with increasing age of the woman; RR = 1.05 (1.02-1.09) per year increase in age. The risk of transfusion was highest during the first two weeks (medical) and one week (surgical) after the abortion.

Conclusion. The risk of post abortion bleeding requiring blood transfusion is 4-5 folds higher after medical induction than after surgical evacuation. The risk of transfusion increases with increasing GA after medical abortions, and with increasing woman's age after surgical abortion.