

Page URL: https://www.bionews.org.uk/page_143534

[Breast cancer risk increased by IVF in women over 40](#)

24 June 2019

By [Shaoni Bhattacharya](#)

Reporting from the European Society for Human Reproduction and Embryology's 2019 annual meeting in Vienna

Appeared in BioNews [1003](#)

Older women undergoing fertility treatment have an increased risk of breast cancer, suggests a large study.

'We see a stepwise increase in risk; especially among women who are 40 plus,' said [Ditte Vassard](#) at the University of Copenhagen in Denmark. She presented the findings at the European Society for Human Reproduction and Embryology annual conference in Vienna, Austria.

The study looked at over 660,000 women in Denmark who had never had cancer. It used data from Danish fertility clinics and the Danish population register to match each of 60,000 women who had fertility treatment from 1994-2015 with ten others from the general population who had not received treatment. They were matched for factors such as age, education level and whether their mothers had had breast cancer.

The researchers tracked the women until the end of 2015 and found 6044 were diagnosed with cancer. The proportion of cancer cases was 'slightly higher' said Vassard, in those who had received fertility treatment.

The team found a 14 percent increase in breast cancer risk compared with women who had not undergone fertility treatment, after adjusting for confounding factors.

Previous studies investigated the relationship between breast cancer and fertility treatment because ovarian stimulation is thought to raise estrogen levels, which have a known association with breast cancer. However, these studies concluded there was no risk.

There had also been indications of increased risk of breast cancer among older fertility patients said Vassard, and the new study agreed.

The risk of breast cancer increased to 31 percent in women who were over 40 when they started fertility treatment, despite adjusting for nulliparity (not having had children) which is a known risk factor for breast cancer.

The study seemed to be 'well-performed' said [Professor Willem Ombelet](#) from Genk, Belgium, who is coordinator of ESHRE's [special interest group on global and sociocultural aspects of infertility](#).

'If other people find the same findings an important message we have to tell our patients is: an additional reason to come early [for treatment] is the later you come, the more risks you have for the increased risk of cancer,' he told BioNews.

'It's a surprise,' [Dr Melanie Davies](#) a consultant gynaecologist at University College London Hospitals told BioNews 'My feeling is that we shouldn't get too hung up about breast cancer as associated with IVF.'

She noted that women undergoing IVF often have other risk factors for breast cancer, though she acknowledged that the 'beautifully-designed' study had tried to account for these. Davies was a co-author on a 2018 study in the [BMJ](#) that investigated the same association and found no overall increased risk of breast cancer.

'Their risk ratio was not that dramatic. It was 1.14 which is statistically significant, but if you look at absolute numbers it's not that massive because breast cancer is not a common disease,' Davies added. 'It's going to be small numbers of women.'

SOURCES & REFERENCES

RELATED ARTICLES FROM THE BIONEWS ARCHIVE

[Call for genetic testing for all women with breast cancer](#)

7 October 2019 - by [Dr Loredana Guglielmi](#)

Multigene testing for all women diagnosed with breast cancer would save thousands of lives each year in the UK and USA, suggests new research...

[Liquid biopsy could detect breast cancer recurrence earlier than scan](#)

5 August 2019 - by [Dr Molly Godfrey](#)

A newly developed blood test can spot breast cancer relapses almost a year before they are clinically detectable...

[NHS approves earlier use of 'game-changing' ovarian cancer drug](#)

29 July 2019 - by [Dr Nicoletta Charolidi](#)

Women in England with advanced ovarian cancer will now have access to a drug that could help halt the progression of their disease much earlier in their course of treatment...

[Gene behind major cause of women's infertility found](#)

7 May 2019 - by [Jakki Magowan](#)

A gene that plays a key role in causing polycystic ovary syndrome (PCOS) has been discovered, and could lead to better disease prediction and treatment...

[Three patients die from breast cancer through organ donation](#)

17 September 2018 - by [Charlott Repschlager](#)

Four organ recipients developed cancer after doctors did not detect breast cancer in an organ donor...

[Fertility treatment doesn't boost womb or breast cancer risk](#)

16 July 2018 - by [Charlott Repschlager](#)

Assisted reproduction techniques such as IVF do not increase a woman's risk of developing womb or breast cancer, a new study has found...