

CHEMOTHERAPY BEFORE SURGERY CUTS RISK OF COLON CANCER RETURNING, TRIAL FINDS

- The Cancer Research UK-funded FOxTROT trial, led from the Universities of Birmingham and Leeds and involving 1,053 patients at 85 hospitals, found that patients with early stage colon cancer benefit from 6 weeks of chemotherapy before surgery.
- Giving the first 6 weeks of chemotherapy to colon cancer patients before, instead of after surgery, cuts their risk of cancer coming back within 2 years by 28%.
- 6 weeks of chemotherapy before surgery could be used to treat at least 5,000 patients in the UK every year. Worldwide, researchers predict it could be used to treat hundreds of thousands more.

Giving colon cancer patients chemotherapy before surgery cuts their risk of the disease coming back, according to the results of a Cancer Research UK-funded clinical trial.

The FOxTROT trial showed that giving colon cancer patients chemotherapy before rather than after surgery reduced the chance of cancer returning within 2 years by 28%.

1,053 colon cancer patients from 85 hospitals in the UK, Denmark and Sweden were involved in the study, led by scientists at the University of Birmingham and the University of Leeds.

Colon cancer patients were divided into two groups in the study. The first group received 6 weeks of chemotherapy, followed by surgery, then 18 weeks of chemotherapy. The second group had standard treatment for colon cancer, which was surgery first followed by 24 weeks of chemotherapy.

Through follow-up assessments, the scientists found that patients who had chemotherapy before surgery were significantly less likely to see their cancer come back, compared with those who got all their chemotherapy after surgery.

The scientists believe that giving chemotherapy to bowel cancer patients before surgery could be easily adopted by the NHS and other health systems across the world. At least 5,000 colon cancer patients in the UK, and hundreds of thousands of patients worldwide, could benefit from this treatment every year.

Associate Professor at the Birmingham Clinical Trials Unit at the University of Birmingham, Dr Laura Magill, said:

“Up to 1 in 3 colon cancer patients can see their cancer come back after surgery. That figure is far too high and we need new treatment strategies to stop colon cancer coming back.

“The standard approach has been to give chemotherapy after surgery to eradicate any cancer cells that might have spread before surgery. But our research shows that giving some of that chemotherapy before surgery increases the chances that all cancer cells will be killed.

“A growing body of evidence is showing the value of pre-operative chemotherapy in several other cancers, and we believe that our results could transform how we approach colon cancer in the clinic.”

In total, 699 patients on the trial received chemotherapy before surgery. **Geoff Hoggard from Leeds was diagnosed with colon cancer in 2016 and took part in the trial.**

“I had noticed blood in my poo a few times and initially I had felt quite embarrassed about it. But I ended up being diagnosed with colon cancer, which was a massive wake-up call. Doctors saw the cancer very clearly with a colonoscopy and I was told that it needed urgent treatment, which came as a huge shock.

“I was willing to take any opportunity to get the most effective treatment. The FOxTROT trial felt like the best way to do that, and I was happy to sign up when my consultant offered to put me on it.

“I got six weeks of chemotherapy before surgery and 18 weeks after, which was hard going. Brain fog and severe tiredness took its toll on me. I kept going, thanks to the support of friends, family and my local church, who were a constant source of strength.

“Eventually, it was all worth it. I’ve had no complications since the surgery, and there were no signs of cancer in the months and years after. 6 years on, I’m back living life to the full.

“I have no regrets at all about taking part in the FOxTROT trial. I hope that many others will live longer, free from cancer, because of the developing science that underpins this new approach and which worked so well in my case.”

Professor of Gastrointestinal Cancer Research at the University of Leeds, Professor Matthew Seymour, said:

“Timing is everything when it comes to treating colon cancer. The simple act of bringing forward chemotherapy, giving it before instead of after surgery, delivers some remarkable results.

“Delivering chemotherapy before surgery could prevent recurrences of cancer without the need for expensive new drugs or technologies. It was especially encouraging to find that patients who had chemotherapy before their surgery suffered fewer surgical complications.

“Scaling up this treatment worldwide, including in low and middle income countries, could transform cancer care and save many thousands of lives.”

The scientists are now undertaking two further clinical trials, FOXTROT-2 and FOXTROT-3, to investigate whether older patients also benefit from chemotherapy before surgery and to investigate if adding in more chemotherapy drugs before surgery further reduces the chances of cancer coming back. If these trials are successful, patients could receive more tailored cancer treatments, with new types and combinations of chemotherapy offered to different patients based on how likely they are to benefit from it.

Professor of Surgery at the University of Birmingham, Professor Dion Morton, said:

“In many parts of the world cancer treatments can be prohibitively expensive. We wanted to go in the opposite direction, testing a treatment that could be used on the widest possible group of patients.

“Thanks to funding from Cancer Research UK, doctors in countries around the world will now be able to put these findings into clinical practice, saving many thousands of lives.”

The paper, titled “Preoperative chemotherapy for operable colon cancer: mature results of an international randomised controlled trial”, was published today (19th January) in the *Journal of Clinical Oncology*.

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Notes to editor:

The paper will be available from <https://ascopubs.org/doi/abs/10.1200/JCO.22.00046> when the embargo lifts. Please contact the press office for an embargoed copy of the manuscript.

About Cancer Research UK

- Cancer Research UK is the world’s leading cancer charity dedicated to saving lives through research, influence and information.

- Cancer Research UK's pioneering work into the prevention, diagnosis and treatment of cancer has helped save millions of lives.
- Cancer Research UK has been at the heart of the progress that has already seen survival in the UK double in the last 40 years.
- Today, 2 in 4 people survive their cancer for at least 10 years. Cancer Research UK wants to accelerate progress and see 3 in 4 people surviving their cancer by 2034.
- Cancer Research UK supports research into the prevention and treatment of cancer through the work of over 4,000 scientists, doctors and nurses.
- Together with its partners and supporters, Cancer Research UK is working towards a world where people can live longer, better lives, free from the fear of cancer.

For further information about Cancer Research UK's work or to find out how to support the charity, please call 0300 123 1022 or visit www.cancerresearchuk.org. Follow us on [Twitter](#) and [Facebook](#).