

# Suppression of Ovarian Function Trial

<b>Submission date</b> 12/05/2010	<b>Recruitment status</b> No longer recruiting	<input type="checkbox"/> Prospectively registered <input checked="" type="checkbox"/> Protocol
<b>Registration date</b> 12/05/2010	<b>Overall study status</b> Completed	<input type="checkbox"/> Statistical analysis plan <input checked="" type="checkbox"/> Results
<b>Last Edited</b> 20/05/2024	<b>Condition category</b> Cancer	<input type="checkbox"/> Individual participant data

**Plain English summary of protocol**  
Not provided at time of registration

## Contact information

**Type(s)**  
Scientific

**Contact name**  
Mr Mark Webster-Smith

**Contact details**  
Clinical Trials & Statistics Unit (ICR-CTSU)  
Section of Clinical Trials  
Brookes Lawley Building  
15 Cotswold Road  
Sutton  
United Kingdom  
SM2 5NG

## Additional identifiers

**ClinicalTrials.gov (NCT)**  
NCT00066690

**Clinical Trials Information System (CTIS)**  
2004-000166-13

**Protocol serial number**  
1305

## Study information

## Scientific Title

A multicentre randomised interventional trial on the benefits of ovarian function suppression in pre-menopausal women with oestrogen receptor positive breast cancer

## Acronym

SOFT

## Study objectives

Chemotherapy (CT), tamoxifen, and ovarian function suppression (OFS) are individually effective adjuvant treatment modalities in women under 50 with oestrogen receptor (ER) positive (tumours expressing the oestrogen receptor) breast cancer. Chemotherapy plus 5 years tamoxifen (a widely used treatment which blocks the action of oestrogen on the tumour) is more effective than chemotherapy alone, however it is unclear whether any additional benefit is derived from ovarian function suppression as no trial has addressed this question to date.

This trial aims to focus the OFS question on the subset of women who biologically would be most likely to benefit. These are women with oestrogen receptor positive breast cancer who remain pre-menopausal following either surgery alone or after completion of chemotherapy. The majority of pre-menopausal women with breast cancer are at least 40, and more than 80% will develop amenorrhoea following 6 cycles of cyclophosphamide, methotrexate and fluorouracil 5FU (CMF) chemotherapy. By contrast, less than half of pre-menopausal women under the age of 40 develop amenorrhoea with CMF. The prognosis of women who develop amenorrhoea tends to be better than those who continue to menstruate. Consequently the women in this trial will generally be younger than the median age for pre-menopausal breast cancer and will most likely be under 40.

## Ethics approval required

Old ethics approval format

## Ethics approval(s)

South West Multi-centre Research Ethics Committee, 04/08/2004, ref: 04/Q1605/20

## Study design

Multicentre randomized interventional treatment trial

## Primary study design

Interventional

## Study type(s)

Treatment

## Health condition(s) or problem(s) studied

Topic: National Cancer Research Network; Subtopic: Breast Cancer; Disease: Breast

## Interventions

1. Tamoxifen for 5 years
  2. OFS\*\* plus tamoxifen for 5 years
  3. OFS\*\* plus exemestane for 5 years
- (\*\* OFS = ovarian function suppression (triptorelin for 5 years OR surgical oophorectomy OR ovarian irradiation))

## Radiotherapy:

Radiation therapy to the conserved breast is required. Radiation therapy to the chest wall following mastectomy is optional (if given, it may also include nodal fields). Radiation therapy may be given either after all chemotherapy or integrated into chemotherapy.

Follow up length: 120 months

Study entry: registration and one or more randomisations

## Intervention Type

Drug

## Phase

Phase III

## Drug/device/biological/vaccine name(s)

Tamoxifen, exemestane, triptorelin

## Primary outcome(s)

To compare ovarian function suppression (OFS: GnRH analogue or oophorectomy)

## Key secondary outcome(s)

1. Overall survival
2. Systemic disease-free survival
3. Quality of life
4. Sites of first treatment failure

## Completion date

21/02/2024

## Eligibility

### Key inclusion criteria

1. Pre-menopausal women (estradiol [E2] levels in the pre-menopausal range) either after chemotherapy or without chemotherapy
2. Randomisation within an 8-month evaluation period after end of CT, or within 12 weeks after definitive surgery for patients with no CT. Patients with temporary chemotherapy-induced amenorrhoea who regain pre-menopausal status within 6 months of the final chemotherapy dose are eligible.
3. Histologically proven, resected breast cancer. Pathology material available for submission for central review.
4. Hormone receptor (HR) positive tumour. HR must be determined using immunohistochemistry (IHC): ER and/or progesterone receptor (PgR) greater than or equal to 10%
5. Tumour confined to the breast and axillary nodes without detected metastases elsewhere with the exception of tumour detected in the internal mammary chain nodes by sentinel node procedure
6. Proper surgery (total mastectomy or breast conserving procedure plus radiation) for primary disease with no known clinical residual disease
7. Axillary lymph node dissection or negative axillary sent

## Participant type(s)

Patient

**Healthy volunteers allowed**

No

**Age group**

Adult

**Sex**

Female

**Total final enrolment**

3066

**Key exclusion criteria**

1. Post-menopausal
2. Distant metastatic disease
3. Locally advanced inoperable breast cancer
4. Bilateral invasive breast cancer
5. Positive final margins
6. Clinically detectable residual axillary disease
7. History of previous ipsilateral or contralateral invasive breast cancer
8. Previous or concomitant malignancy except adequately treated basal/squamous cell carcinoma of the skin, in-situ carcinoma of the cervix or bladder, contralateral or ipsilateral in-situ breast cancer
9. Other non-malignant systemic diseases that would prevent prolonged follow-up
10. Patients who have had a bilateral oophorectomy or ovarian irradiation or are planning oophorectomy within 5 years
11. History of noncompliance to medical regimens or considered potentially unreliable
12. Patients who are pregnant or lactating at randomisation or who desire a pregnancy within 5 years. Patients planning to use additional hormone therapy (including contraceptives) during the next 5 years
13. Previous endocrine therapy (neoadjuvant/adjuvant)

**Date of first enrolment**

17/12/2003

**Date of final enrolment**

30/04/2010

**Locations**

**Countries of recruitment**

United Kingdom

England

Australia

Belgium

Canada

Egypt

Germany

Hungary

India

Italy

New Zealand

Peru

Slovenia

South Africa

Sweden

Switzerland

United States of America

**Study participating centre**  
**Clinical Trials & Statistics Unit (ICR-CTSU)**  
Sutton  
United Kingdom  
SM2 5NG

## **Sponsor information**

**Organisation**  
European Institute of Oncology (IEO) (Italy)

**ROR**  
<https://ror.org/02vr0ne26>

## **Funder(s)**

**Funder type**  
Charity

## Funder Name

Cancer Research UK (CRUK) (UK) (ref: C2232/A4595)

## Alternative Name(s)

CR\_UK, Cancer Research UK - London, Cancer Research UK (CRUK), CRUK

## Funding Body Type

Private sector organisation

## Funding Body Subtype

Other non-profit organizations

## Location

United Kingdom

## Funder Name

International Breast Cancer Study Group (IBCSG) (UK)

# Results and Publications

## Individual participant data (IPD) sharing plan

### IPD sharing plan summary

#### Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
<a href="#">Results article</a>	results	01/09/2017	28/02/2019	Yes	No
<a href="#">Results article</a>	results	01/07/2015	28/02/2019	Yes	No
<a href="#">Results article</a>	results	01/07/2016	28/02/2019	Yes	No
<a href="#">Results article</a>	results	10/07/2014	28/02/2019	Yes	No
<a href="#">Results article</a>	results	10/05/2016	28/02/2019	Yes	No
<a href="#">Results article</a>	results	12/07/2018	28/02/2019	Yes	No
<a href="#">Results article</a>	results	29/01/2015	28/02/2019	Yes	No
<a href="#">Protocol article</a>	protocol	01/12/2013	28/02/2019	Yes	No
<a href="#">Plain English results</a>				No	Yes
<a href="#">Study website</a>	Study website	11/11/2025	11/11/2025	No	Yes