Note: Performing your original search, *Breast cancer recurrence menstrual cycle*, in PubMed will retrieve 63 citations.

**Effect of menstrual phase on surgical treatment of breast cancer.**


Istituto Nazionale per lo Studio e la Cura del Tumori, Milano, Italy.

1175 premenopausal women whose date of last menstrual period was known were followed up for up to 20 years (average 8 years) after surgery for breast cancer. 525 patients were in the follicular phase and 650 in the luteal phase. We observed 192 unfavourable events among patients operated on during the follicular phase (36.6%) and 192 among patients operated on during the luteal phase (29.6%). The effect of phase was restricted to patients with positive axillary nodes. The 5-year relapse-free survival was 75.5% in 246 node-positive patients operated on during the luteal phase and 63.3% in 190 node-positive patients who had surgery during the follicular phase. The hazard ratio at Cox multivariate analysis was 1.329 for all patients (p = 0.006) and 1.431 for node-positive patients (p = 0.03). In our study, premenopausal patients with breast cancer and positive axillary nodes operated on during the luteal phase had a significantly better prognosis than patients operated on during the follicular phase. It may be that the
processes of cell metastases, such as loss of adhesiveness, may be enhanced by high concentrations of unopposed oestrogens or by reduced activity of natural killer cells during the first half of the menstrual cycle.

Publication Types:
- Clinical Trial

MeSH Terms:
- Adult
- Antineoplastic Agents/therapeutic use
- Axilla
- Breast Neoplasms/mortality
- Breast Neoplasms/surgery*
- Combined Modality Therapy
- Comparative Study
- Female
- Follicular Phase*
- Follow-Up Studies
- Humans
- Luteal Phase*
- Lymph Nodes/pathology
- Middle Aged
- Neoplasm Recurrence, Local
- Premenopause
- Prognosis
- Proportional Hazards Models
- Retrospective Studies
- Survival Rate

Substances:
- Antineoplastic Agents

PMID: 7911875 [PubMed - indexed for MEDLINE]