



24<sup>ο</sup> ΕΩΠΕ

18<sup>ο</sup> ΕΕΑΟ

[www.eso2018.gr](http://www.eso2018.gr)

# **radiotherapy techniques and indications in the era of molecular oncology and functional imaging**

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## δήλωση συμφερόντων

- I do not have any conflicts of interest to declare

# outline

- general facts
- molecular oncology by radiotherapy perspective
- functional imaging in breast cancer
- new radiotherapy techniques
- guidelines & clinical practice

general facts

# RT & DCIS

## EBCTCG meta analysis

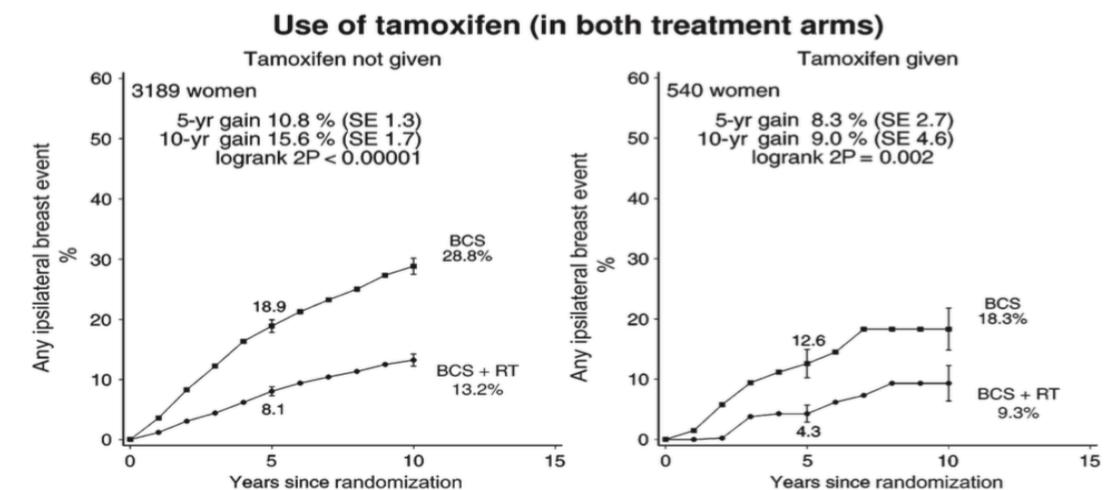
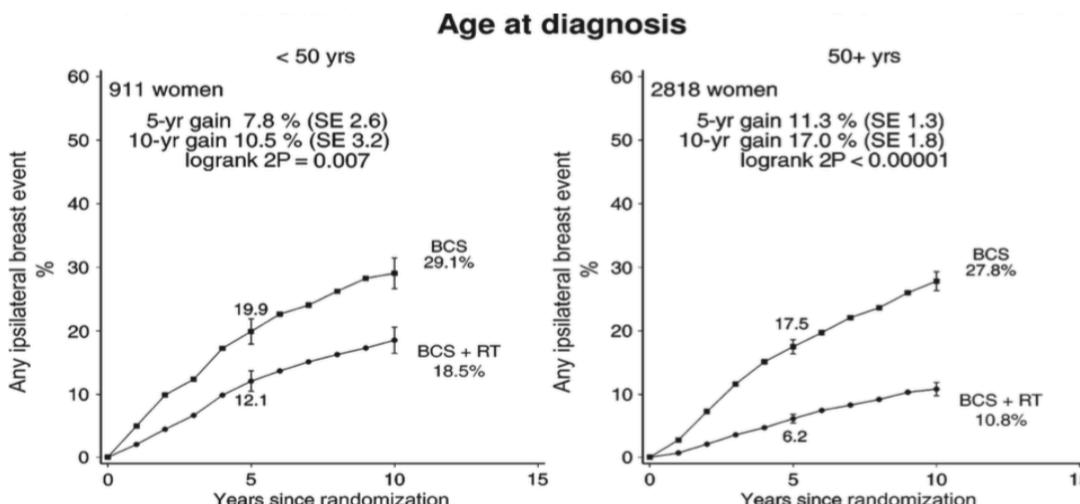
JNCI MONOGRAPHS

### Overview of the Randomized Trials of Radiotherapy in Ductal Carcinoma In Situ of the Breast

Early Breast Cancer Trialists' Collaborative Group (EBCTCG)

J Natl Cancer Inst Monogr 2010;41:162–177

- 4 randomized trials
- 3729 pts



# RT & BCT EBCTCG meta analysis

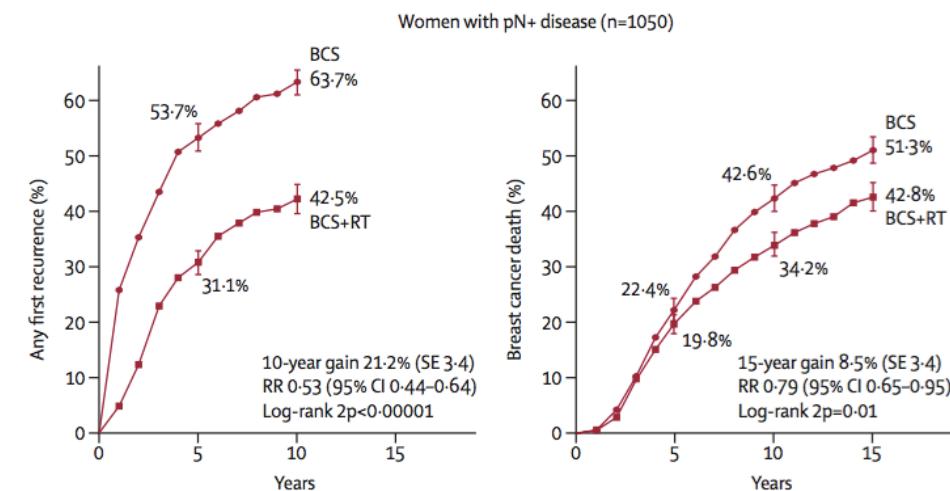
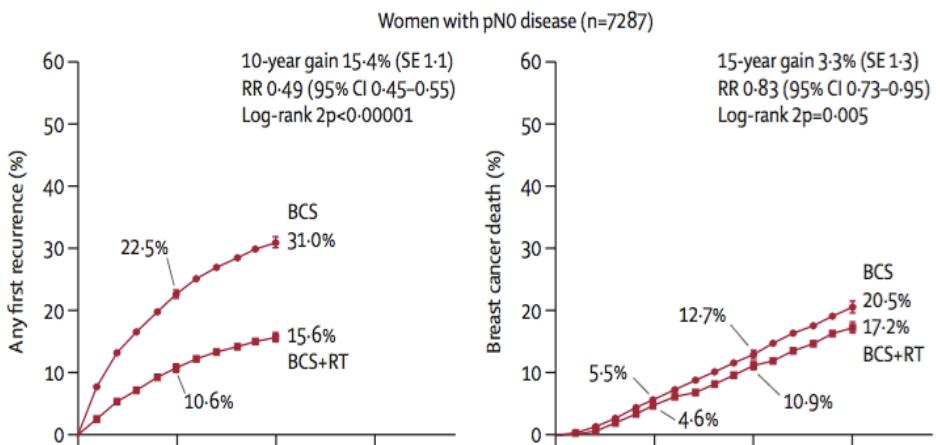
Articles



## Effect of radiotherapy after breast-conserving surgery on 10-year recurrence and 15-year breast cancer death: meta-analysis of individual patient data for 10 801 women in 17 randomised trials

Early Breast Cancer Trialists' Collaborative Group (EBCTCG)\*  
*Lancet* 2011; 378: 1707–16

- 17 randomized trials
- 10801 pts



# RT & mastectomy EBCTCG meta analysis

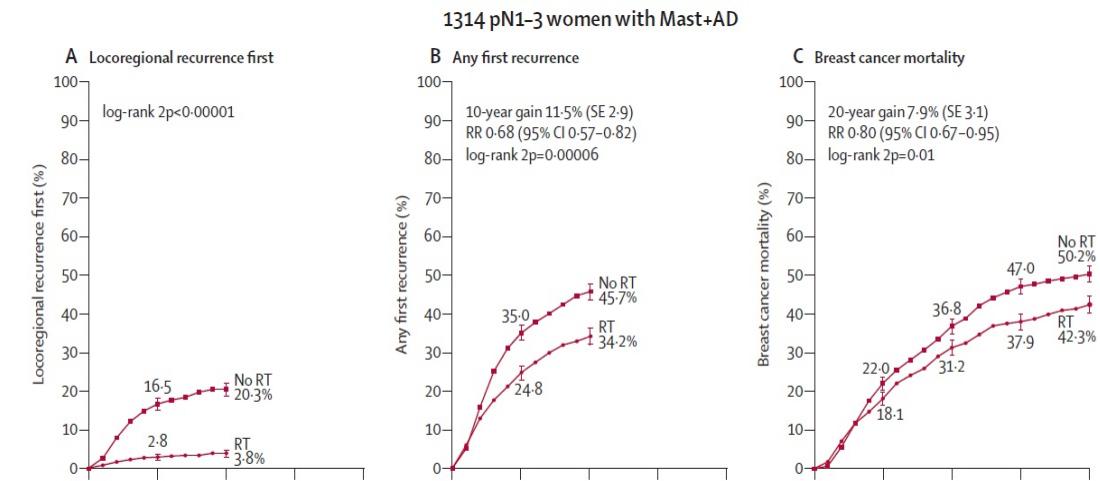
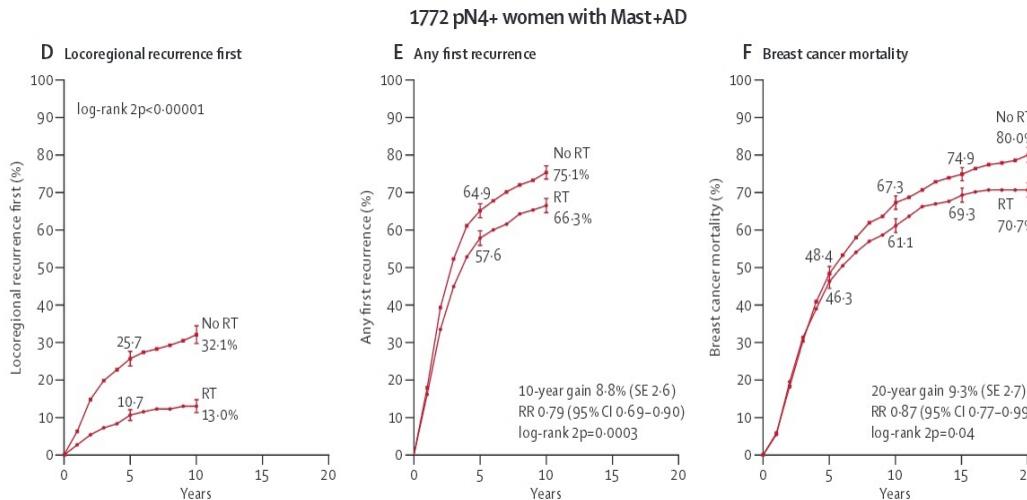
Articles

**Effect of radiotherapy after mastectomy and axillary surgery on 10-year recurrence and 20-year breast cancer mortality: meta-analysis of individual patient data for 8135 women in 22 randomised trials**



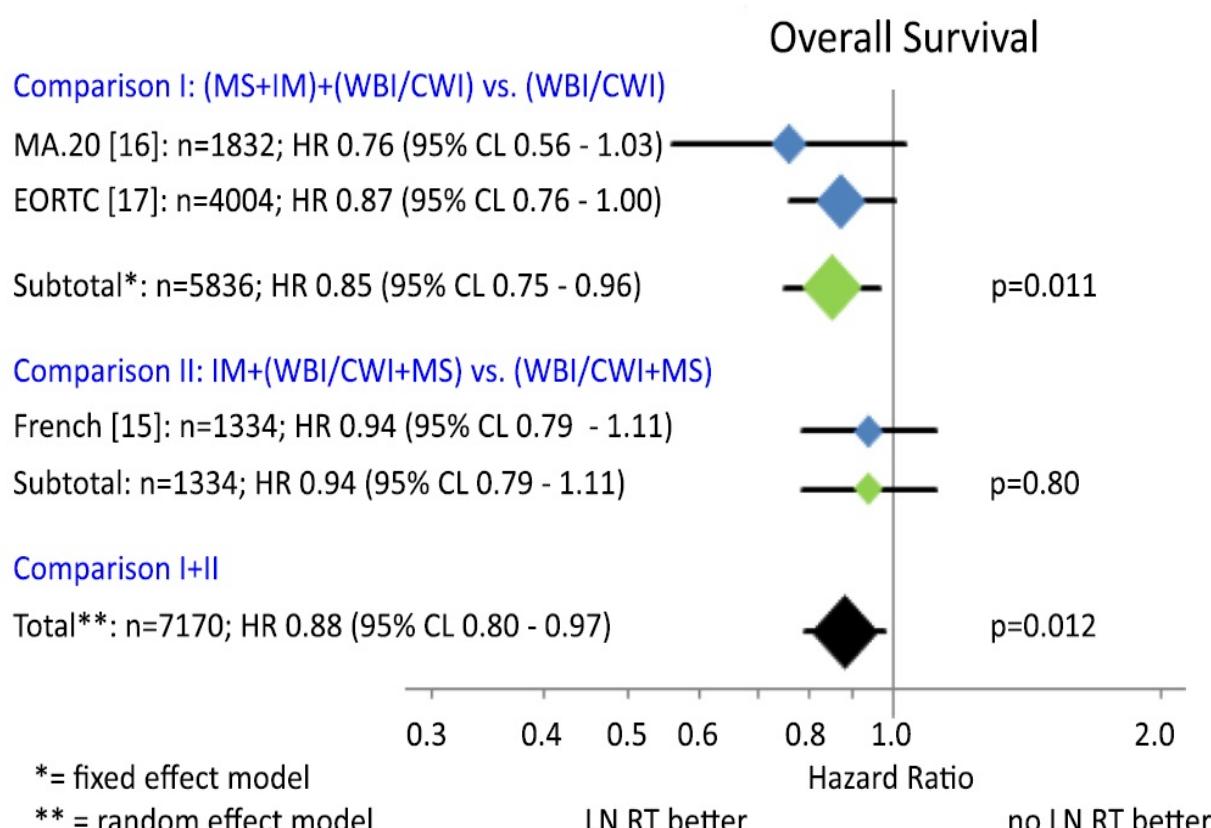
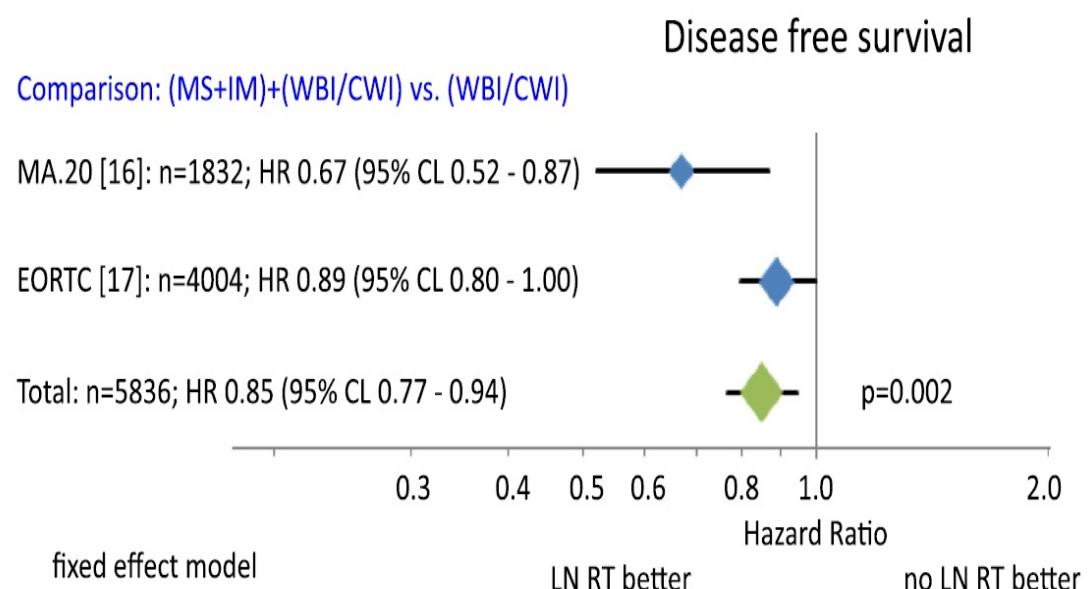
EBCTCG (Early Breast Cancer Trialists' Collaborative Group)\*  
*Lancet* 2014; 383: 2127–35

- 22 randomized trials
- 8135 pts

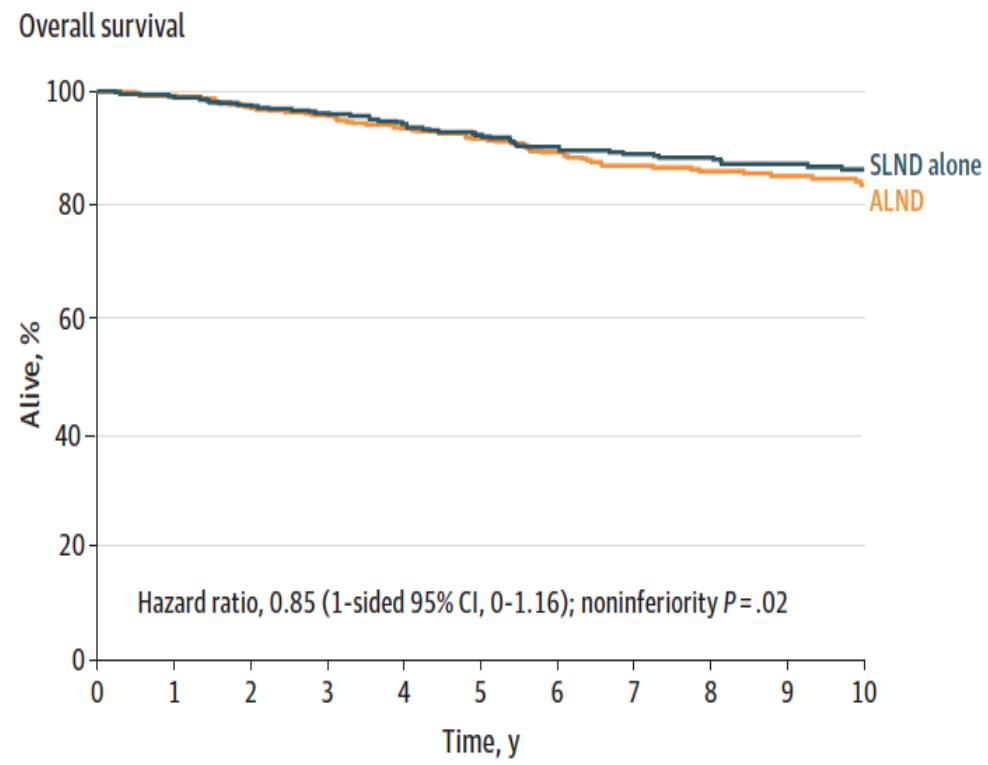
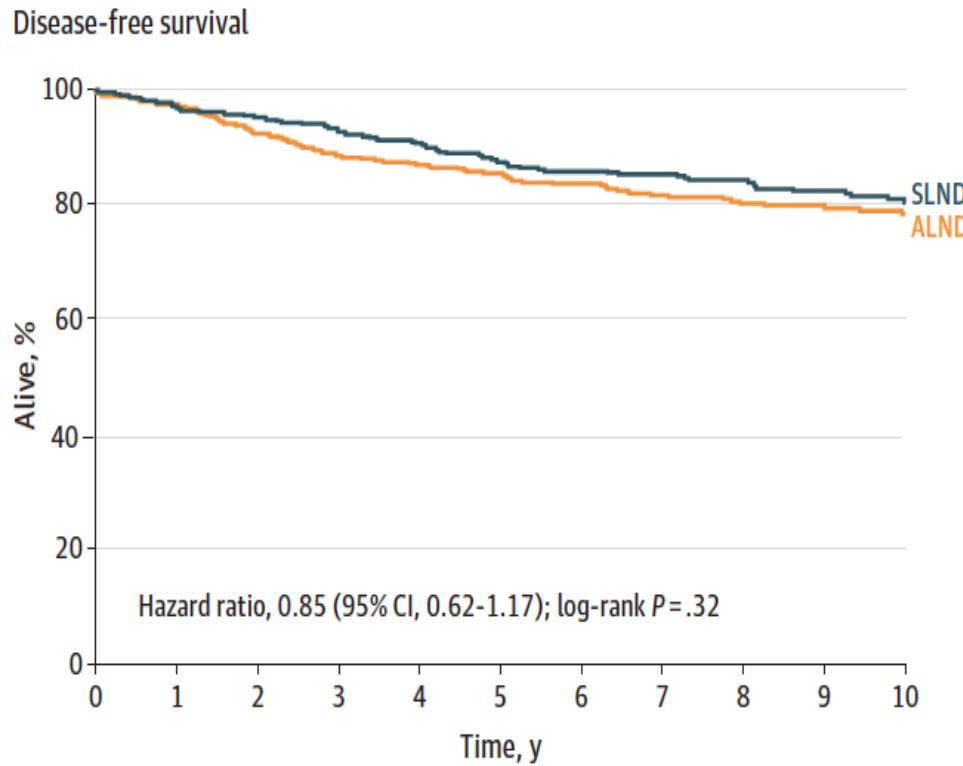


# Regional Nodal Irradiation (RNI) meta analysis

- 3 randomized trials
  - MA.20 (n=1832)
  - French trial (n=1334)
  - EORTC 22922-10925 (n=4004)
- 7170 pts



# ACOSOG Z0011 trial



# 10981/AMAROS

## after mapping of the axilla: RNI or Surgery?

