

## Breast Cancer Staging “T1N0” : Not Always a Good Prognosis

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### 1. Short Communication

According to the classic prognostic criteria based on the “TNM” staging system, it has been accepted that small tumors (T1) without lymph node involvement (N0) are always “good news”, and this is based on the benefits of mammographic screening.

However, advances in molecular biology and genetics, with the emergence of gene expression platforms, have come to question it. Some authors [1] find between 19% and 34% of high risk tumors (MammaPrint®) among the cancers detected in prevalent and incident round, respectively.

On the other hand, the presence of circulating tumor cells in the blood and bone marrow of patients with early breast tumors seems to be proven (which seems to reinforce the Fisherian theory of dissemination), although the true meaning and final destination of such cells is unknown [2].

This, however, does not invalidate the benefit of screening, since the percentage of high-risk tumors increases to 47% in interval cancers. On the other hand, small tumors allow less aggressive surgical strategies and facilitate locoregional control of the disease [3].

The appearance of surrogate molecular subtypes, based on immunohistochemical determinations, helped to better understand the biological behavior of breast cancer [4]. However, there were soon clear discrepancies between subrogated subtypes and those determined by “microarray” techniques [5].

So, there is no complete correlation between the classical evaluation of clinical risk and the evaluation of genomic risk by means of expression platforms such as MammaPrint®, which may lead to overtreatment or undertreatment among patients with early breast cancer [6].

The information provided by the gene expression platforms has already been included in the latest edition of the TNM prognostic staging system [7], and it is very possible that it will be necessary to resort them in almost all cases of invasive breast cancer, before plan a systemic therapy.

Another question would be to determine what type of platform would be most suitable for it. But that is another story.

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