

Free PSA: A better molecular marker than total PSA for breast cancer

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Serum total PSA (prostate specific antigen) has been considered since some time for diagnosis or prognosis of breast cancer. PSA is present both as free and complexed form. Many researchers have shown total PSA increases in all forms of breast disease, whether cancerous or benign lesions. Few scientists have demonstrated that the free form of PSA is predominant form in breast cancer.^{1,2} Also the observation that there is a marginal reduction in total PSA after surgery in comparison to a remarkable decrease in free PSA is a strong indicator that a large portion of total PSA is produced by normal tissue and that free PSA produced by breast tumors.³⁻⁵ Moreover free PSA as the predominant form was found to be highly specific for breast cancer when compared to benign and normal tissues.³ In India, *Dash et al.*, (2011) in their study in Indian population observed similar results using total and free PSA in patients of breast tumors⁵ augmenting the its role as a prognostic marker.

With a heterogeneous study population in India where breast cancer is commonly encountered, population based studies are essential to study the molecular forms of PSA with respect to the disease process like relapse or metastasis and therefore with future treatment.

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