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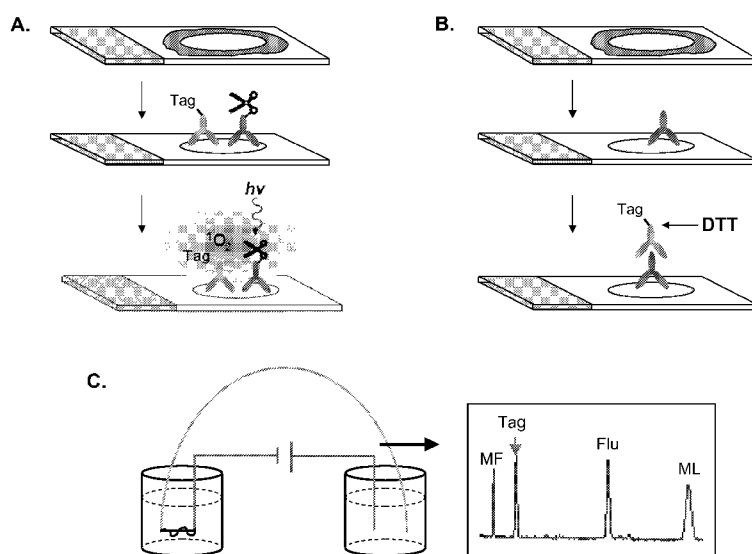


FIGURE 1

(57) Abstract: The present invention relates generally to methods of accurately quantifying total HER2 or p95 expression in patients with advanced breast cancer and correlating HER2 or p95 expression with the risk of brain relapse and time to brain metastasis (TTBM) in such patients. Embodiments of the invention described herein include methods that utilize VeraTag® technology to accurately quantify total HER2 and p95 protein expression in tumor 30 samples and correlate HER2 level and the risk of brain relapse in HER2-positive advanced breast cancer patients, including patients that received treatment, such as trastuzumab. Embodiments of the invention include a novel assay that precisely quantifies total HER2 expression (H2T), p95 and HER2 homodimers (H2D) in biological samples.