Zeta-Probe® GT Membranes

The Zeta-Probe GT (genomic tested) membrane is a pretested positively charged nylon membrane. The unique binding and handling properties of this membrane make it ideally suited for nucleic acid blotting applications.

The Zeta-Probe GT membrane quality-control test consists of human DNA digested with Bgl I. After agarose electrophoresis, the DNA is transferred onto the Zeta-Probe GT membrane by Southern and alkaline Southern procedures. We use a labeled p8C plasmid (probe C factor VIII:C)* that contains a 1.8 kb cDNA insert from the human factor VIII:C gene. Our specifications require a clearly visible 5 kb Bgl I fragment in the 5 µg total DNA lane (representing 3 pg of target DNA) after an overnight exposure. In addition, these blots must not have membrane background.

Zeta-Probe GT membranes possess a high tensile strength. They will not shrink, tear or become brittle during transfer, baking, hybridization or reprobing. Zeta-Probe GT membranes are heat resistant, nonflammable and autoclavable. These membranes are naturally hydrophilic with no added wetting agents and are resistant to a wide variety of chemicals, including 100% formamide, 2 M NaOH, 4 M HCl, acetone, most alcohols, DMSO, DMF, and chlorinated aliphatic hydrocarbons. The nominal porosity of Zeta-Probe GT membrane is 0.45 µm. When stored at 23–25 °C, Zeta-Probe GT membranes are stable for at least 1 year.