

The TaqMan Human Cytokine Card: A Novel Array of Quantitative Gene Expression Assays

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The TaqMan Human Cytokine Card is a novel consumable with dried TaqMan probes and primers that advances gene expression studies on the ABI PRISM 7700. The system utilizes universal primer and probe design, master mix, and thermal cycling protocol to quantify gene expression in a 96 well array. Gene expression data can be compared between samples loaded in separate cards. All 96 wells of a Card are filled simultaneously with a mixture of cDNA and TaqMan Universal PCR Master Mix through a single port via a channel system. The reaction volume of each well is 1 ul, and the total volume required to fill a Card is 250 ul. The Card has been used to quantify relative gene expression levels for 24 human cytokines in cDNA samples. The TaqMan Human Cytokine Card can be used to rapidly generate gene expression profiles and study the kinetics of gene expression while significantly reducing the use of reagents, samples, and labor. The universal quantitative PCR assays present in the taxman Human Cytosine Card are also available as taxman Pre-Developed Assay Reagents (PDARs).