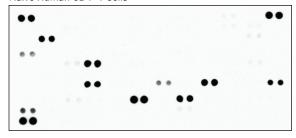
Characterization of Cytokine Secretion by Multiplexing

The culture medium from CD4⁺ T cell differentiation procedures should be tested to confirm that the cells are secreting cytokines relevant to the desired cell subset. Multi-analyte detection techniques enable efficient screening for many cytokines simultaneously. Both Proteome Profiler™ Antibody Arrays and Luminex®-based Flow Cytometry Assays are optimized for maximum specificity and sensitivity of analyte detection.

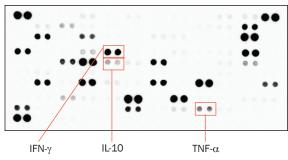
Proteome Profiler Antibody Arrays

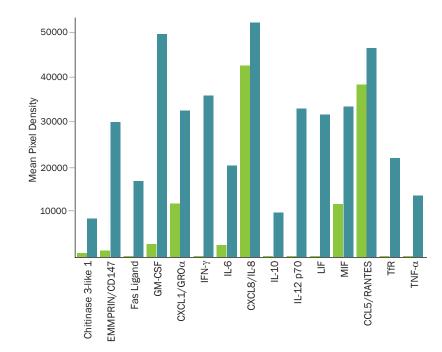
Proteome Profiler Antibody Arrays allow for the measurement of up to 111 proteins in a single sample. These arrays do not require specialized equipment and eliminate the need for multiple Western blot experiments. Antibody array kits contain buffers, detection antibodies, and membranes spotted in duplicate with high-quality capture antibodies. The arrays utilize chemiluminescence for detection, and membranes can be assessed for protein levels in the same manner as traditional Western blots. Select arrays are also suitable for use with the LI-COR® detection system.

Naïve Human CD4+ T Cells



Th1-Polarized Human CD4+ T Cells





Detection of Cytokines Secreted by Th1-Polarized Human CD4* T Cells Using the Proteome Profiler XL Cytokine Array. Naïve T cells were isolated from human PBMCs using the MagCellect Human Naïve CD4* T Cell Isolation Kit (Catalog # MAGH115). These cells were either untreated or treated with CellXVivo Human Th1 Cell Differentiation Kit (Catalog #

CDK001) reagents. Array images show the detection of secreted cytokines. The densitometric profile of other cytokines before (green bars) and after (blue bars) Th1 polarization is shown in the histogram.

Proteome Profiler Antibody Arrays

Cytokine Array	Analytes	Catalog #	LI-COR	Chemiluminescence
Human Cytokine Array Kit, Panel A	36	ARY005	✓	1
Mouse Cytokine Array Kit, Panel A	40	ARY006	/	✓
Rat Cytokine Array Kit	29	ARY008	/	✓
Proteome Profiler Mouse XL Cytokine Array Kit	111	ARY028	/	✓
Proteome Profiler Human XL Cytokine Array Kit	102	ARY022	/	1