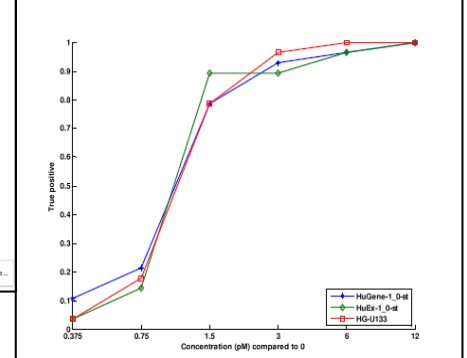
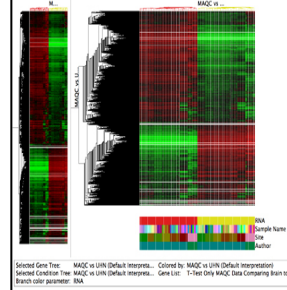


AFFYMETRIX SERVICES

Authorised Service Provider

- Affymetrix GeneChip® Technology enabling whole genome discovery
- Gene expression profiling at the gene, exon and whole-genome levels
- Alternative splicing
- CustomExpress® array solutions
- Genome-Wide Human SNP arrays
- Tiling arrays
- Biomarker research
- Value-added services
 - Bioinformatics consulting
 - Customised project and protocol development
 - Experimental design and pilot studies
 - 3 different labelling protocols to accommodate RNAs of varying quality
 - Quality check at various steps to ensure successful sample labelling and hybridisation
 - Data warehousing, analysis and mining



Performance Comparison among:

- Human Gene 1.0 ST Array
- Human Exon 1.0 ST Array
- Human Genome U133 Array

Comparison of Standard Expression, Exon 1.0 ST and Gene 1.0ST Arrays

	3' Expression Arrays	Exon 1.0 ST Arrays	Gene 1.0 ST Arrays
Probe set per array	> 54,000	> 1.4M (4 probes/exon)	> 760K (~2.5 probes/exon)
Labelling method	Oligo-T7 priming from 3'-end	Random priming	Random priming
Target orientation	Anti-sense target	Sense target	Sense target
Nucleic acids hybridised	cRNA	cDNA	cDNA
Background detection	Perfect and mismatch probes	Surrogate probes	Perfect match probes only
Probe location	Biased at 3'-end of transcript	Over entire transcript length	Over entire transcript length

Selection of Labelling Method Based on Various Qualities of RNA

Labelling Method	Quality of RNA starting material	Total RNA Required	RIN
Affymetrix 3'IVT Express Kit	Good, free of DNA contamination and degradation	100 ng	> 8
NuGen Ovation® Amp V2	Good, free of DNA contamination and degradation	20 ng	> 7
NuGen WT-Ovation™ Pico	Good, free of DNA contamination and degradation	500 pg - 2 ng	> 7
NuGen WT-Ovation™ Pico	Somewhat degraded and limited amounts	5-8 ng	> 6
NuGen WT-Ovation™ Pico	Severely degraded with contaminated RNA	50 ng	0 - 4

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 Toronto Medical Discovery Tower, Rm 9-301
 Toronto, Ontario, M5G 1L7
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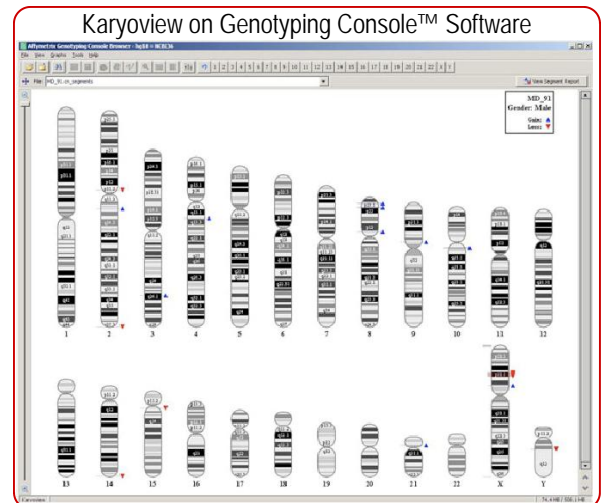
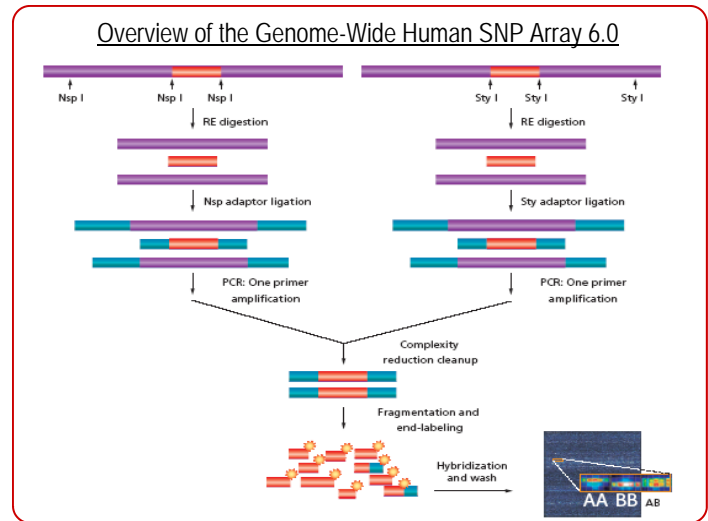


AFFYMETRIX SERVICES

Genome-Wide Analysis

Human SNP Array 6.0

- Affymetrix GeneChip® Technology enabling whole genome discovery
- Genome-wide Association Studies
- More than 906K SNPs
 - Unbiased selection of 482K SNPs
 - Selection of additional 424K SNPs
 - Tag SNPs
 - SNPs from chromosomes X and Y
 - Mitochondrial SNPs
 - New SNPs added to the dbSNP database
 - SNPs in recombination hotspots
- More than 946K copy number probes
 - 202,000 probes targeting 5,677 CNV regions
 - 744,000 probes, evenly spaced along the genome
 - Detected 10 times more copy number changes than other SNP/CN platforms
 - Three times more coverage of CNPs; only platform with non-polymorphic probes
 - Analysis software leverages new, high-resolution reference map and CNP calling algorithm



GeneChip® Tiling Arrays

- High resolution tiling arrays for mapping of protein/DNA interactions and novel transcript discovery
- Selection of coverage over human whole genome or selected chromosomes
 - Human Promoter and Tiling Arrays
 - Mouse Promoter and Tiling Arrays
 - ENCODE Array
 - Human Chromosome 21/22 2.0R Array
- Tiling Arrays for other organisms
 - Arabidopsis, *C. elegans*, *Drosophila*, *S. cerevisiae*, *S. pombe*

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