Nanostring Data Characteristics Dataset X

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What are the characteristics of the samples?

Basic Setup

##		${\tt RNA.Solution}$	${\tt Tumor}$	Fraction	${\tt Treatment}$	Amount.of.Material.Provide
##	1	RNAlater	P0003	large fragments	None	500µL
##	2	RNAlater	P0003	single cell flow	None	500µL
##	3	RNAlater	P0004	large fragments	None	500µL
##	4	RNAlater	P0004	None	None	500µL
##	5	RNAlater	P0004	single cell flow	None	500µL
##	6	RNAdvance	P0010	None	IFNy	200µL
##	7	RNAdvance	P0010	None	IgG	200µL
##	8	RNAlater	P0010	large fragments	None	500µL
##	9	RNAlater	P0010	None	None	500µL
##	10	RNAdvance	P0010	None	aPD1	200µL
##	11	RNAlater	P0011	large fragments	None	500µL
##	12	RNAlater	P0011	None	None	500µL

What comparisons can be made?

Fraction	n
large fragments	4
None	6
single cell flow	2

RNA.Solution	n
RNAdvance RNAlater	

Tumor	n
P0003	2
P0004	3
P0010	5
P0011	2

Treatment	n
aPD1	1
IFNy	1
IgG	1
None	9

What Do The Nanostring Probes Quantify?

What Gene functions are being quantified?

Lists the number of functions that Nanostring has indicated the genes represent

x
Gene
Cell.Type
Adaptive.Immunity
Apoptosis
Cell.Cycle
Cellular.Stress
Complement.System
Death.Receptor.Signaling
Extracellular.matrix.organization
Fc.Receptor.Signaling
Innate.Immunity
Interferon. Signaling
Interleukin.Signaling
NF.kB
MAPK.Signaling
Metabolism
TLR.Signaling
VEGF. Signaling
Wnt.Signaling

How many genes represent each function type Information?

- means the number of genes that ARE labelled as being associated with a function
- means the number of genes that ARE NOT labelled as being associated with a function

n
712
4
1
2
8
4
4
2
2
3

Cell.Type	n
NK CD56dim cells	3
NK cells	2
T-cells	5
Th1 cells	1
Treg	1

Cellular.Stress	n
-	723
+	31

Complement.System	n
-	720
+	34

Death.Receptor.Signaling	n
-	736
+	18

Extracellular.matrix.organization	n
-	714
+	40

Fc.Receptor.Signaling	n
-	681
+	73

Innate.Immunity	n
-	733
+	21

Interferon.Signaling	n
-	664 90

Interleukin.Signaling	n
-	631
+	123

NF.kB	n
-	709
+	45

MAPK.Signaling	n
-	689
+	65

Metabolism	n
_	712
+	42

n
686
68

$$\begin{array}{c|c} VEGF.Signaling & n \\ \hline - & 698 \\ + & 56 \end{array}$$