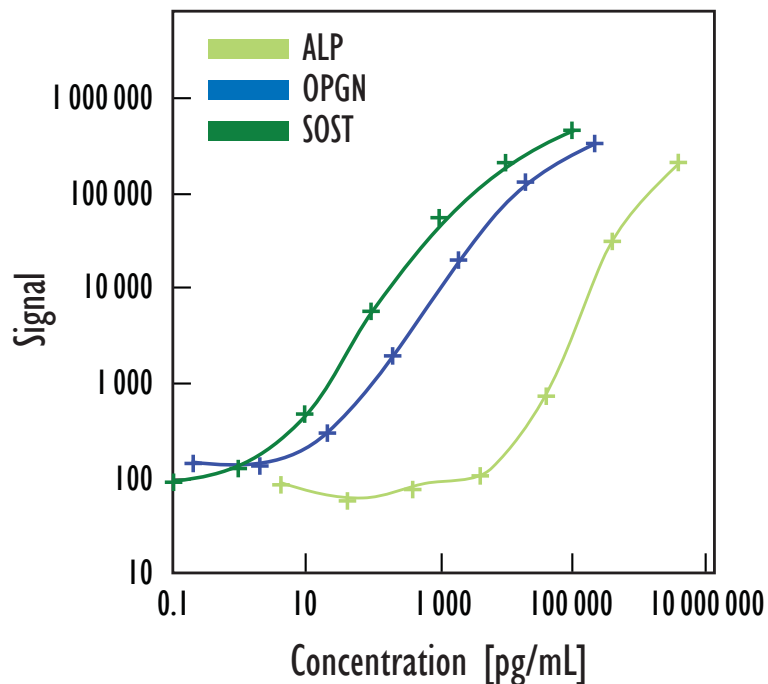


MULTI-SPOT[®] Human Bone Panel I Assay

Detection of Osteoprotegerin, Sclerostin, Bone Alkaline Phosphatase in Human Serum Samples



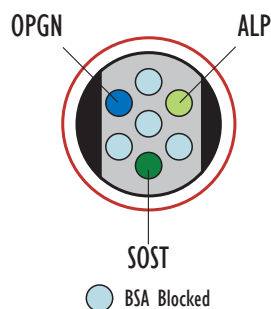
ALP		OPGN		SOST	
Concentration (pg/mL)	Mean Signal	Concentration (pg/mL)	Mean Signal	Concentration (pg/mL)	Mean Signal
0	53	0	92	0	59
4	86	0.2	139	0.1	85
40	58	2	133	1	122
400	80	20	297	10	460
4000	109	200	1965	100	5471
40000	749	2000	19206	1000	53028
400000	32821	20000	127501	10000	198679
4 000000	209879	200000	325614	100000	429081

ALP Avg% CV 6

OPGN Avg% CV 4

SOST Avg% CV 4

Standard curve data is from a representative experiment
Avg % CV is the average of CV's from calibrator levels above LLOD



	ALP	OPGN	SOST
LLOD (pg/mL)	8300	5.9	1.1

LLOD is defined as 2.5x stdev above the background

Kit Size	SI2400	SI6000
1 plate	K15146C-1	K11146C-1
5 plates	K15146C-2	K11146C-2
20 plates	K15146C-3	K11146C-3
20 plates (Base)	K15146A-3	K11146A-3

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Endogenous Analyte Levels in Samples

- 4-5 normal human donors; matched sera and plasmas
- Detected level was above LLOQ for all analytes in all samples

		ALP (ng/mL)	OPGN (pg/mL)	SOST (pg/mL)
Serum	Mean	52	275	85
	Median	57	227	60
	Range	32 - 60	184 - 549	18 - 156
EDTA Plasma	Mean	51	299	162
	Median	53	243	157
	Range	36 - 57	186 - 579	101-258
Heparin Plasma	Mean	54	282	186
	Median	57	236	155
	Range	38 - 61	174 - 476	66 - 309

Dilution Linearity

- Measured endogenous analyte levels in samples diluted as shown

$$\% \text{ recovery} = \frac{(\text{measured value} * \text{dilution factor} * 100)}{\text{predicted value}}$$

	Dilution Factor	ALP	OPGN	SOST
Serum	3/4	106	89	91
	1/2	115	76	97
	1/4	143	85	95
EDTA Plasma	3/4	115	94	93
	1/2	116	101	105
	1/4	148	122	109
Heparin Plasma	3/4	108	88	101
	1/2	110	85	103
	1/4	151	103	118

Values presented are averages across 2-3 individual samples

Spike Recovery

- Measured analyte spiked into human samples

$$\% \text{ recovery} = \frac{(\text{measured value} * 100)}{\text{expected value (average from 5-6 samples each)}}$$

	Spike Level (ng/mL)	Serum	EDTA Plasma	Heparin Plasma
ALP	100	90%	86%	98%
OPGN	5	93%	90%	106%
SOST	2.5	92%	86%	83%