

## APPENDIX A : COMPLETE SIMS DATA FOR SAMPLES ANALYSED BY SIMS.

Au/0.1mol%PO<sub>4</sub><sup>3-</sup>-TiO<sub>2</sub>

Possible Combinations x

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
47.94794	Ti	73.800%	21.842

          

Possible Combinations x

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
62.96359	PO_2	99.524%	8.055

Possible Combinations ✕

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
63.94286	TiO	73.624%	18.162

          

Possible Combinations ✕

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
79.93777	TiO_2	73.449%	17.830

**Possible Combinations** ✕

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
196.96656	Au	100.000%	3.216

          

**Possible Combinations** ✕

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
276.90433	TiAuO_2	73.449%	12.532

Au/0.1mol%K<sup>+</sup>-TiO<sub>2</sub>

Possible Combinations

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
38.96370	K	93.258%	2.325

          

Possible Combinations

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
47.94794	Ti	73.800%	23.911

Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
63.94286	TiO	73.624%	16.611

Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
70.95353	KO_2	92.814%	84.076

Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
79.93777	TiO <sub>2</sub>	73.449%	17.830

Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
196.96656	Au	100.000%	0.269

Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
276.90433	TiAuO_2	73.449%	5.259

Au/0.1mol%Na<sup>+</sup>-TiO<sub>2</sub>

Possible Combinations

1 combinations      Act. mass 22.989599

Mass	Substance	Abundance	Deviation (ppm)
22.98976	Na	100.000%	7.415

22.98976 Na

Add selected to mass list      Cancel      OK

Possible Combinations

1 combinations      Act. mass 47.946800

Mass	Substance	Abundance	Deviation (ppm)
47.94794	Ti	73.800%	23.911

47.94794 Ti

Add selected to mass list      Cancel      OK



Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
63.94286	TiO	73.624%	18.162

Possible Combinations ✕

1 combinations Act. mass

Mass	Substance	Abundance	Deviation (ppm)
79.93777	TiO_2	73.449%	19.071

**Possible Combinations** [X]

1 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
196.96656	Au	100.000%	0.269

          

**Possible Combinations** [X]

2 combinations      Act. mass

Mass	Substance	Abundance	Deviation (ppm)
276.90319	Na_30_13	96.949%	19.171
276.90433	TiAuO_2	73.449%	15.067