

# Specpure® Analytical Standards

**Alfa Aesar®**  
A Johnson Matthey Company

**Specpure®** is the registered tradename for Alfa Aesar's comprehensive offering of Spectrochemical Analytical Standard Solutions.

**Specpure®** standards are unsurpassed in accuracy, purity and quality. Each product is guaranteed for one year from ship date. Alfa Aesar's atomic absorption standards solutions are accurate to  $\pm 1.0\%$  and the Plasma solutions to  $\pm 0.3\%$ .



## **Specpure® Atomic Absorption Standards**

These solutions are intended for use with either flame or furnace absorption spectroscopy. AA is the most frequently used instrumental technique for elemental analysis.

Alfa Aesar offers **70 single-element** aqueous solutions at 1,000 $\mu\text{g/ml}$  in both 100ml and 500ml sizes.

## **Specpure® Plasma Standards**

These solutions are intended ICP, DCP or MS-ICP. These techniques are capable of determining the concentrations of many elements quickly, either simultaneously or sequentially.

Alfa Aesar's high purity starting materials, years of manufacturing experience and ISO certified quality systems ensure a dependable analytical product.

## **Features of Specpure® Analytical Standards**

- A NIST-traceable Certificate of Analysis is included with each standard solution.
- Expiration date stickers are included with each standard solution.
- Guaranteed for one year from date of shipment.
- Certified accuracy of  $\pm 1.0$  for atomic absorption standards and  $\pm 0.3\%$  for plasma solutions from the stated concentration.

Further details and prices are available in the main Alfa Aesar Catalog or via the website ([www.alfa.com](http://www.alfa.com)).



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[www.alfa.com](http://www.alfa.com)

# Specpure<sup>®</sup> Analytical Standards

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Stock Number	AAS Standard	Plasma Standard	Plasma Standard	Stock Number	AAS Standard	Plasma Standard	Plasma Standard
Element, matrix	1,000ppm	1,000 ppm	10,000 ppm	Element, matrix	1,000ppm	1,000 ppm	10,000 ppm
Aluminium, HCl	33557	13856	14405	Molybdenum, NH <sub>4</sub> OH	-	38719	38726
Aluminium, HNO <sub>3</sub>		38727	38721	Neodymium, HNO <sub>3</sub>	88081	13882	14431
Antimony, HCl	33558	13818	14387	Nickel, HNO <sub>3</sub>	88082	13839	14414
Antimony, H <sub>2</sub> O/tartaric acid/tr. HNO <sub>3</sub>	-	41682	41683	Niobium, HF	88083	13831	14396
Arsenic, HNO <sub>3</sub>	33559	13836	14369	Niobium, H <sub>2</sub> O/tr.F <sup>-</sup>	-	42244	42245
Barium, HNO <sub>3</sub>	88052	13876	14423	Osmium, HCl	42239	13871	-
Beryllium, HNO <sub>3</sub>	88053	13848	14406	Palladium, HCl	88085	13833	11432
Bismuth, HNO <sub>3</sub>	88054	13822	14388	Phosphorus, HNO <sub>3</sub>	89887	13862	14415
Boron, NH <sub>4</sub> OH	-	13859	14370	Platinum, HCl	88086	13827	14397
Boron, H <sub>2</sub> O	88055	39147	-	Potassium, HNO <sub>3</sub>	88087	13866	14379
Cadmium, HNO <sub>3</sub>	88056	13813	14424	Praeseodymium, HNO <sub>3</sub>	88088	13812	14433
Calcium, HNO <sub>3</sub>	88057	13852	14407	Rhenium, HNO <sub>3</sub>	88089	13817	14416
Carbon, H <sub>2</sub> O	-	13844	14389	Rhodium, HCl	88090	35754	35763
Cerium, HNO <sub>3</sub>	30520	13815	14371	Rubidium, HNO <sub>3</sub>	88091	13872	14380
Cesium, HNO <sub>3</sub>	88058	13825	14425	Ruthenium, HCl	89117	35767	35773
Chromium, HCl	88059	13864	14408	Samarium, HNO <sub>3</sub>	88092	13854	14417
Chromium, HNO <sub>3</sub>	-	38728	38722	Scandium, HNO <sub>3</sub>	88093	35769	35755
Cobalt, HNO <sub>3</sub>	88060	13828	14390	Selenium, HNO <sub>3</sub>	88094	13845	14381
Copper, HNO <sub>3</sub>	88061	13867	14372	Silicon, HNO <sub>3</sub> /tr. HF	88095	13814	14435
Dysprosium, HNO <sub>3</sub>	88062	13838	14426	Silicon, H <sub>2</sub> O/tr.F <sup>-</sup>	-	38717	38723
Erbium, HNO <sub>3</sub>	88063	13877	14409	Silver, HNO <sub>3</sub>	88096	13849	14418
Europium, HNO <sub>3</sub>	88064	35753	35761	Sodium, HNO <sub>3</sub>	88097	13832	14400
Gadolinium, HNO <sub>3</sub>	88065	13829	14373	Strontium, HNO <sub>3</sub>	88098	13874	14382
Gallium, HNO <sub>3</sub> /tr. HF	88066	13869	14427	Sulfur, HNO <sub>3</sub>	22958	13842	14436
Germanium, HNO <sub>3</sub> /tr. HF	88067	13841	14410	Tantalum, HF	89888	13840	14419
Germanium, H <sub>2</sub> O	-	42242	42243	Tantalum, H <sub>2</sub> O/tr.F <sup>-</sup>	-	42246	42247
Gold, HCl	88068	13881	14392	Tellurium, HCl	88099	13879	14401
Hafnium, HCl	88069	13843	14374	Terbium, HNO <sub>3</sub>	88110	13860	14383
Holmium, HNO <sub>3</sub>	88070	35756	35762	Thallium, HNO <sub>3</sub>	88111	13851	14437
Indium, HNO <sub>3</sub>	88071	13846	14411	Thulium, HNO <sub>3</sub>	89889	13824	14402
Iridium, HCl	88072	35751	35752	Tin, HCl	88112	13863	14384
Iron, HNO <sub>3</sub>	88073	13830	14375	Titanium, HNO <sub>3</sub> /tr. HF	35771	35768	35759
Lanthanum, HNO <sub>3</sub>	88074	13870	14429	Titanium, H <sub>2</sub> O/tr.F <sup>-</sup>	-	38720	38725
Lead, HNO <sub>3</sub>	88075	13853	14412	Tungsten, HNO <sub>3</sub> /tr. HF	35760	35770	35772
Lithium, HNO <sub>3</sub>	88076	13821	14394	Tungsten, H <sub>2</sub> O	-	42248	42249
Lutetium, HNO <sub>3</sub>	89886	35765	35757	Vanadium, HNO <sub>3</sub>	88116	13850	14385
Magnesium, HNO <sub>3</sub>	88077	13861	14430	Ytterbium, HNO <sub>3</sub>	89890	13819	14439
Manganese, HNO <sub>3</sub>	88078	13826	14413	Yttrium, HNO <sub>3</sub>	88117	13855	14422
Mercury, HNO <sub>3</sub>	88079	13865	14395	Zinc, HNO <sub>3</sub>	88118	13835	14404
Molybdenum, HNO <sub>3</sub> /tr.HF	35764	35758	35766	Zirconium, HCl	88119	13875	14386

Most are available in 50ml / 100ml or 500ml sizes

## Alfa Aesar Worldwide Sales Offices

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