

# Carbon and Sulfur in Metals

## Steel Ring Standards for Carbon/Sulfur

Part No#	Size	% Carbon	Std Deviation	Expanded Deviation	% Sulfur	Std Deviation	Expanded Deviation	Lot #	Weight
<a href="#">AR868</a>	1g	0.102	0.001	0.003	0.0053	0.0003	0.0008	818A	454g
<a href="#">AR869</a>	1g	0.016	0.002	0.004	0.0030	0.0002	0.004	316B	454g
<a href="#">AR870</a>	1g	0.027	0.002	0.005	0.0249	0.0018	0.0036	1216A	454g
<a href="#">AR871</a>	1g	0.037	0.001	0.003	0.017	0.001	0.002	119A	454g
<a href="#">AR872</a>	1g	0.170	0.003	0.007	0.0069	0.0006	0.0016	420W	454g
<a href="#">AR873</a>	1g	0.429	0.002	0.005	0.0097	0.0005	0.0012	619G	454g
<a href="#">AR874</a>	1g	0.658	0.004	0.008	0.0109	0.0005	0.0011	115D	454g
<a href="#">AR875</a>	1g	0.799	0.004	0.008	0.012	0.001	0.002	119D	454g
<a href="#">AR876</a>	1g	Sold	Out	And	Discontinued	Until	Further	Notice	454g
<a href="#">AR878</a>	1g	0.272	0.003	0.006	0.0215	0.0008	0.0016	417A	454g

## Steel Pin Standards for Carbon/Sulfur

Part #	Size	% Carbon	Standard Deviation	Expanded Deviation	% Sulfur	Standard Deviation	Expanded Deviation	Lot #	Weight
<a href="#">AR510</a>	0.5g	2.41	0.05	0.11	0.091	0.004	0.008	513A	250g
<a href="#">AR511</a>	0.5g	0.064	0.002	0.004	0.272	0.003	0.008	519A	250g
<a href="#">AR512</a>	0.5g	0.016	0.002	0.004	0.262	0.006	0.012	814G	250g
<a href="#">AR513</a>	0.5g	0.021	0.002	0.004	0.387	0.005	0.010	1216D	250g
<a href="#">AR514</a>	0.5g	0.087	0.003	0.008	0.335	0.009	0.020	518D	250g
<a href="#">AR881</a>	1g	0.015	0.001	0.002	0.0015	0.0002	0.0005	819C	454g
<a href="#">AR882</a>	1g	0.0531	0.0008	0.0016	0.0344	0.0005	0.0012	519D	454g
<a href="#">AR883</a>	1g	0.216	0.003	0.006	0.0183	0.0003	0.0010	719C	454g
<a href="#">AR884</a>	1g	0.472	0.007	0.015	0.0121	0.0005	0.0011	420U	454g
<a href="#">AR885</a>	1g	0.820	0.005	0.010	0.0055	0.0002	0.0004	520Z	454g
<a href="#">AR886</a>	1g	0.729	0.005	0.011	0.022	0.001	0.002	319H	454g
<a href="#">AR888</a>	1g	0.134	0.002	0.006	0.229	0.007	0.015	119E	454g
<a href="#">AR889</a>	1g	0.928	0.008	0.018	0.0020	0.0002	0.0005	419J	454g
<a href="#">AR890</a>	1g	0.110	0.001	0.003	0.0046	0.0003	0.0006	320M	454g
<a href="#">AR891</a>	1g	0.0236	0.0014	0.0028	0.0246	0.0007	0.0014	817E	454g

Part #	Size	% Carbon	Standard Deviation	Expanded Deviation	% Sulfur	Standard Deviation	Expanded Deviation	Lot #	Weight
<a href="#">AR892</a>	1g	0.0057	0.0003	0.0008	0.0028	0.0003	0.0007	120E	454g
<a href="#">AR893</a>	1g	1.62	0.03	0.06	0.0010	0.0002	0.0005	615A	454g
<a href="#">AR894</a>	1g	0.544	0.007	0.014	0.0103	0.0005	0.0010	416B	454g
<a href="#">AR895</a>	1g	0.275	0.003	0.006	0.022	0.001	0.002	414B	454g
<a href="#">AR896</a>	1g	0.168	0.002	0.004	0.090	0.001	0.003	619D	454g

### Chip/Powder Standards for Carbon / Sulfur / Nitrogen

Part #	%C	Standard Deviation	Expanded Deviation	%S	Standard Deviation	Expanded Deviation	%N	Standard Deviation	Expanded Deviation	Lot #	Wgt
<a href="#">AR945</a>	0.017	0.001	0.002	0.0004	0.0001	0.0004	0.341	0.007	0.018	418A	150g
<a href="#">AR946</a>	0.0051	0.0004	0.0008	0.0083	0.0004	0.0009	0.0049	0.0003	0.0006	619C	150g
<a href="#">AR947</a>	0.389	0.008	0.016	0.117	0.002	0.004	0.0090	0.0004	0.0008	1114B	150g
<a href="#">AR948</a>	0.498	0.005	0.010	0.0780	0.0011	0.0025	0.0090	0.0003	0.0008	817D	150g
<a href="#">AR949</a>	0.0178	0.0007	0.0016	0.0266	0.0011	0.0025	0.0364	0.0009	0.0019	317D	150g
<a href="#">AR950</a>	0.054	0.001	0.003	0.011	0.001	0.002	0.0034	0.0002	0.0004	1118B	150g
<a href="#">AR951</a>	0.161	0.002	0.005	0.0221	0.0013	0.0031	0.0073	0.0005	0.0012	918C	150g
<a href="#">AR952</a>	0.482	0.003	0.006	0.020	0.001	0.002	0.0114	0.0005	0.0010	914A	150g

Part #	%C	Standard Deviation	Expanded Deviation	%S	Standard Deviation	Expanded Deviation	%N	Standard Deviation	Expanded Deviation	Lot #	Wgt
<a href="#">AR953</a>	0.953	0.006	0.012	0.0026	0.0002	0.0005	0.0081	0.0006	0.0013	1118C	150g
<a href="#">AR954</a>	0.417	0.003	0.007	0.027	0.001	0.003	0.0083	0.0003	0.0008	218B	150g
<a href="#">AR955</a>	0.201	0.002	0.004	0.025	0.001	0.03	0.0071	0.0003	0.0009	719F	150g
<a href="#">AR956</a>	0.401	0.005	0.010	0.256	0.006	0.0014	0.0067	0.0002	0.0006	817A	150g
<a href="#">AR957</a>	0.182	0.002	0.004	0.107	0.003	0.007	0.0086	0.0003	0.0007	219E	150g
<a href="#">AR958</a>	0.015	0.001	0.002	0.023	0.002	0.004	0.068	0.002	0.004	212A	150g
<a href="#">AR960</a>	0.121	0.003	0.006	0.0221	0.0009	0.0018	0.036	0.001	0.002	814B	150g
<a href="#">AR961</a>	0.0242	0.0005	0.0014	0.0100	0.0004	0.0010	0.046	0.001	0.003	719B	150g

## Tungsten Carbide Standard for Carbon/Sulfur

Part #	% Carbon	Standard Deviation	Expanded Deviation	% Sulfur	Standard Deviation	Expanded Deviation	Lot #	Weight
<a href="#">AR307</a>	6.17	0.02	0.05	0.0050	0.0009	0.0019	518C	100g

## ✓ Cast Iron thru Wrought Iron Standards for Carbon/Sulfur



Part #	% Carbon	Standard Deviation	Expanded Deviation	% Sulfur	Standard Deviation	Expanded Deviation	Lot #	Weight
<a href="#">AR299</a>	0.97	0.01	0.02	0.0102	0.0015	0.0030	614B	150g
<a href="#">AR300</a>	3.26	0.04	0.08	0.021	0.001	0.002	1012A	150g
<a href="#">AR301</a>	2.01	0.02	0.04	0.0172	0.0005	0.0013	1018D	150g
<a href="#">AR302</a>	3.29	0.035	0.070	0.0592	0.0026	0.0052	517D	150g
<a href="#">AR303</a>	3.86	0.02	0.05	0.0210	0.0013	0.0028	218A	150g
<a href="#">AR304</a>	4.22	0.3	0.7	0.0215	0.0004	0.0009	120B	150g
<a href="#">AR305</a>	2.79	0.03	0.06	0.012	0.001	0.002	90701	150g
<a href="#">AR306</a>	3.48	0.03	0.06	0.0202	0.0006	0.0013	817B	150g
<a href="#">AR308</a>	9.17	0.14	0.33	0.018	0.002	0.005	619B	100g
<a href="#">AR309</a>	3.62	0.03	0.07	0.0191	0.0011	0.0025	219D	150g
<a href="#">AR310</a>	3.41	0.04	0.08	0.083	0.003	0.006	120C	150g
<a href="#">AR315</a>	3.08	0.03	0.07	0.108	0.004	0.010	220H	150g
<a href="#">AR318</a>	2.95	0.03	0.06	0.042	0.003	0.006	1015C	150g
<a href="#">AR319</a>	3.28	0.03	0.06	0.055	0.003	0.006	113001	150g
<a href="#">AR322</a>	3.32	0.03	0.06	0.034	0.001	0.003	919A	250g

Part #	% Carbon	Standard Deviation	Expanded Deviation	% Sulfur	Standard Deviation	Expanded Deviation	Lot #	Weight
<a href="#">AR323</a>	3.92	0.05	0.10	0.075	0.005	0.01	1212D	250g
<a href="#">AR673</a>	0.0006	0.0002	0.0003	0.0016	0.0002	0.0004	120F	454g

## Titanium and Zirconium Pin CRM's for Hydrogen/Carbon

Part #	Size	Matrix	%H	Standard Deviation	Expanded Deviation	%C	Standard Deviation	Expanded Deviation	Lot#	Pieces per Bottle
<a href="#">AR585</a>	0.25g	Ti	0.0064	0.0006	0.0012	0.008	0.001	0.002	117B	100
<a href="#">AR586</a>	0.25g	Ti	0.0019	0.0002	0.0005	0.020	0.001	0.003	120D	100
<a href="#">AR587</a>	0.25g	Ti	0.0111	0.0009	0.0018	0.008	0.001	0.002	215B	100
<a href="#">AR588</a>	0.25g	Ti	0.0137	0.0004	0.0008	0.008	0.0015	0.0030	714E	100
<a href="#">AR589</a>	0.25g	Ti	0.0207	0.0008	0.0017	0.0083	0.0006	0.0012	519B	100
<a href="#">AR590</a>	0.25	Zr	0.0010	0.0002	0.0004	0.016	0.001	0.002	815C	100
<a href="#">AR591</a>	0.25	Ti	0.0017	0.0002	0.0004	*0.047	0.0006	0.0012	1216C	100
<a href="#">AR592</a>	0.25g	Ti	*0.0290	0.0015	0.0030	0.0072	0.0006	0.0012	616A	100

## Copper Pins CRM's for Sulfur/Oxygen

Part #	Size	% Oxygen	Standard Deviation	Expanded Uncertainty	% Sulfur	Standard Deviation	Expanded Uncertainty	Lot #	Pieces per Bottle
<a href="#">AR146</a>	1g	0.0235	0.0006	0.0014	0.0014	0.0002	0.0004	318C	100
<a href="#">AR147</a>	1g	0.0007	0.0001	0.0003	0.0010	0.0002	0.0004	918B	100
<a href="#">AR148</a>	1g	0.0493	0.0009	0.0020	0.0013	0.0002	0.0005	518B	100
<a href="#">AR149</a>	1g	0.0312	0.0005	0.0012	0.0005	0.0001	0.0002	619F	100