Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)												Unit Size (in g)
		C	Si	Mn	P	S	Cr	Cu	Al	Ca	Fe			
NCS HC 11601a	Ferro Silicon	0.073	73.75	0.26	0.023	0.003	0.085	0.031	1.14	0.34				100
NCS HC 11602a	High Carbon Ferromanganese	6.69	0.08	68.94	0.143	0.005								70
NCS HC 11602b	High Carbon Ferromanganese	6.82	0.111	75.41	0.134	0.005								70
NCS HC 11602c	High Carbon Ferromanganese	6.15	1.88	66.2	0.11	0.013								70
NCS HC 11603a	Mn-Si Alloy	1.33	17.49	65.67	0.065	0.011								100
NCS HC 11603b	Mn-Si Alloy	1.34	17.63	66.37	0.065	0.008								100
NCS HC 11603c	Mn-Si Alloy	1.26	18.45	66.65	0.115	0.018								70
NCS HC 11604a	Si-Ca Alloy	0.94	56.02	0.037	0.054	0.073			1.97	30.45	6.93			50
NCS HC 11606	High Carbon Ferrochromium	6.37	4.29	0.32	0.023	0.013	64.17							100

Number	Name	Chemical Composition(Percent)												Unit Size (in g)
		C	Si	Mn	P	S	V	As	Cu	Ni	Al	Ta	Ti	Nb	
NCS HC 11605	Si-Ca-Ba-Sr	0.385	53.46	0.075	0.014	0.039			0.079	0.023	2.34				60
NCS HC 11607	Ferro Vanadium	0.235	1.67	0.321	0.121	0.01	49.4	0.021	0.022						70
NCS HC 11608	Ferro Vanadium	0.109	0.653	0.106	0.021	0.035	79.27	0.0024	0.0089	0.01	1.41				70
NCS HC 11609	Ferro Niobium	0.114	1.34	0.37	0.172	0.014			0.059		0.711	0.087	0.87	64.89	70
NCS HC 11610	Nitride Ferrochrome	0.04	0.525	0.313	0.02	0.042									70
NCS HC 11611	Ferrosilicon	0.035	74.03	0.25	0.02	0.0023					1.41				60
NCS HC 11612	Ferroboron	0.086	0.353	0.305	0.02	0.0018		20.82			0.018				70
NCS HC 11613	Ferroboron	0.181	0.549	0.35	0.03	0.0023		17.65			0.035				70
NCS HC 11614	Ferro Phosphorus	0.032	0.6	0.638	25.81	0.0038							2.14		70
NCS HC 11615	Ferro Phosphorus	0.13	0.382	1.07	21.49	0.061							0.62		70
NCS HC 11616	Ferro Nickel	2.12	3.25	0.051	0.039	0.283			0.022	13.34					60
NCS HC 11617	Ferro Nickel	1.85	3.11	0.041	0.037	0.213			0.021	16.45					60
NCS HC 11618	Ferro Nickel	1.65	2.54	0.053	0.032	0.211			0.021	10.7					60
NCS HC 11619	Si-Ca Alloy	0.55	61.11	0.053	0.048	0.029					2.15				50

		Cr	N	Ca	B	Co	Fe	Mg	Ba	TFe	Sr
NCS HC 11605	Si-Ca-Ba-Sr	0.054		13.22				0.022	14.02	13.57	0.235
NCS HC 11610	Nitride Ferrochrome	58.83	4.76								
NCS HC 11611	Ferrosilicon	0.063		0.208							
NCS HC 11612	Ferroboron				20.82						
NCS HC 11613	Ferroboron				17.65						
NCS HC 11616	Ferro Nickel	1.98				0.247					
NCS HC 11617	Ferro Nickel	1.87				0.241					
NCS HC 11618	Ferro Nickel	1.56				0.198					
NCS HC 11619	Si-Ca Alloy			27.15			6.61				

Number	Name	Chemical Composition(Percent)									Unit Size (in g)
		Si	Ca	Ba	Al	Mn	P	C	S	Fe	
NCS HC 13602	Si-Al-Ba-Alloy	32.01	1.17	7.41	32.55	0.197	0.017	0.27	0.0096	20.59	0.85	50

Number	Name	Chemical Composition(Percent)												Unit Size (in g)
		C	Si	Mn	P	S	Cr	Cu	Al	Ca	Fe	Ni	Ba	
NCS HC 14602	Si-Al-Ba	0.14	19.21	0.25	0.015	0.013	0.017	0.137	32.82	0.85	38.09	0.014	6.52	70
NCS HC 14603	Si-Al-Ba	0.13	24.12	0.14	0.015	0.015	0.085	0.061	32.84	0.71	33.54	0.042	7.57	70
NCS HC 14604	Si-Al-Ba	0.24	19.21	0.25	0.011	0.011	0.053	0.172	25.44	0.44	49.14	0.018	2.64	70
NCS HC 14605	Si-Al-Ba	0.13	25.94	0.12	0.018	0.012	0.152	0.045	36.67	1.35	24.97	0.167	9.12	60
NCS HC 14608	Si-Al-Ca-Ba Alloy	0.13	0.021	0.17	0.022	0.021	0.021	0.176	9.14	8.28	14.22	0.0061	12.39	60
NCS HC 14609	Si-Al-Ca-Ba Alloy	0.22	33.41	0.33	0.018	0.017	0.116	0.32	14.46	5.74	35.46	0.016	7.72	60
NCS HC 14610	Si-Al-Ca-Ba Alloy	0.24	40.58	0.23	0.021	0.025	0.032	0.29	13.47	8.25	23.25	0.012	10.70	60
NCS HC 14611	Si-Al-Ca-Ba Alloy	1.56	56.74	0.065	0.016	0.14	0.0044	0.0097	1.47	13.61	5.77	0.0020	17.00	60

		Co	Ti	Mg	Sr
NCS HC 14608	Si-Al-Ca-Ba Alloy	0.0022	0.084	0.21	0.132
NCS HC 14609	Si-Al-Ca-Ba Alloy		0.055	0.18	0.092
NCS HC 14610	Si-Al-Ca-Ba Alloy		0.124	0.12	0.094
NCS HC 14611	Si-Al-Ca-Ba Alloy		0.126	0.045	0.22

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)													Unit Size (in g)
		C	Si	Mn	P	S	Cr	Ni	Cu	Al	Ca	Ba	Co	Ti	
NCS HC 14612	Ferro Silicon	0.016	77.49	0.02	0.0074	0.003	0.0044	0.016	0.011	0.0074	0.0067	22.12	0.0012	0.011	60
NCS HC 14613	High Carbon Ferrochromium	7.56	2.58	0.18	0.02	0.032	54.04								50
NCS HC 14615	High Carbon Ferrochromium	8.07	2.3	0.23	0.017	0.045	56.16								50
NCS HC 14615a	High Carbon Ferrochromium	8.00	1.96	0.24	0.017	0.015	57.44	0.23							

		B	V	Fe
NCS HC 14612	Ferro Silicon	0.0022		
NCS HC 14615a	High Carbon Ferrochromium		0.28	31.46

Number	Name	Chemical Composition(Percent)													Unit Size (in g)
		C	Si	Mn	P	S	Cr	Cu	Al	Ca	Ti	Nb	Ta	V	
NCS HC 18601	Ferro Silicon	0.19	72.44	0.205	0.019	0.010	0.109		2.16	0.64					50
NCS HC 18603	Si-Mn alloy	1.70	17.21	66.70	0.183	0.025									50
NCS HC 18604	Ferro Titanium	0.065	4.68	2.67	0.043	0.013		0.117	5.38		27.93				50
NCS HC 18606	Ferro Niobium	0.070	1.09	0.29	0.159	0.008			1.35		0.78	66.24	0.084		50
NCS HC 18608	Ferro Vanadium	0.403	0.76	0.26	0.049	0.043			0.158					48.93	50

Number	Name	Chemical Composition(Percent)									Unit Size (in g)
		Mn	C	Si	Fe	S	P	Cr	Ni	Cu	
NCS HC15603a	Manganese Metal	97.43	0.081	0.27	2.04	0.0089	0.017	0.01	0.002	0.0049	50g
NCS HC15604a	Manganese Metal	93.65	0.062	0.31	5.07	0.02	0.0044	0.0056	0.0042	0.0032	50g

Number	Name	Chemical Composition(Percent)													Unit Size (in g)
		C	Si	Mn	P	S	Cr	Ni	Cu	Ti	Al	Fe	Mo	Al	
NCS HC11620	Ferro Phosphorus	0.034	1.77	1.36	25.7	0.0018	0.216	0.081	0.11	2.14					50
NCS HC11621	AlMnFe	0.093	0.185	4.54	0.012	0.0026	0.034		0.0061		56.32	36.45			50
NCS HC11622	AlFe	0.027	0.056	0.301	0.014	0.0024	0.036	0.015	0.0084				0.061	46.3	50

Number	Name	Chemical Composition(Percent)													Unit Size (in g)
		C	Si	Mn	P	S	Cr	Ni	Cu	Mo	As	Fe	Sn	Sb	
NCS HC11623	Ferro Molybdenum	0.022	0.21	0.017	0.031	0.112	0.13	0.07	2.37	52.99	0.015	44.26	0.0046	0.0043	50
NCS HC11624	Ferro Niobium	0.149	3.57	0.302	0.13	0.019	0.047	0.016	0.077				0.061		50
NCS HC11625	Ferroboron	0.172	0.62	0.273	0.027	0.0026	0.044	0.013	0.011						50
NCS HC11626	Ferro Titanium	0.041	4.89	2.15	0.031	0.01			0.125						50
NCS HC11627	Ferro Titanium	0.036	3.99	1.23	0.063	0.014			0.22						50
NCS HC11628	Ferro Titanium	0.071	0.094	0.074	0.0085	0.0091			0.052						50

		Ti	Nb	V	Ta	Al	W	B	Ca	N
NCS HC11624	Ferro Niobium	0.155	63.72	0.016	0.046	(0.076)	(0.007)			
NCS HC11625	Ferroboron	0.053				0.027		17.41		
NCS HC11626	Ferro Titanium	28.88				6.18		0.003	(0.0002)	0.009
NCS HC11627	Ferro Titanium	40.41				7.19		0.0025	(0.0003)	0.022
NCS HC11628	Ferro Titanium	69.84				2.78		0.001	0.014	

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)												Unit Size (in g)
		C	Si	Mn	P	Cr	Al	Ca	Fe	S	V	Sn	Ti	
NCS HC 19604	Ferro Titanium	0.041	3.46	1.59	0.051		10.64			0.011	0.158	0.056	43.82	100
NCS HC 19605	Ferro Titanium	0.032	4.20	0.81	0.032		8.58			0.009	0.303	0.061	38.78	100
NCS HC 19606	Ferro Vanadium	0.565	0.68	0.43	0.087	0.32	0.084			0.010	51.14			50
NCS HC 19606a	Ferrovanadium	0.171	0.901	0.39	0.042	0.194	0.70			0.028	54.68		0.079	100
NCS HC 19607	Silicon Manganese Alloy	1.56	18.41	66.2	0.126					0.022				50
NCS HC 19608	Ferro Molybdenum	0.042	0.32		0.032					0.073				50
NCS HC 19609	Ferro Molybdenum	0.039	0.039*		0.041					0.085				25
NCS HC 19610	Vanadium pentoxide		0.40		0.007	0.099			0.43	0.014				50
NCS HC 19611	Vanadium pentoxide		0.102		0.010	0.018			0.061	0.011				50
NCS HC 19612	Ferrovanadium	0.151	0.68	0.12	0.025	0.146	1.26			0.041	80.10		0.025	100

		Cu	V_2O_5	K_2O	Na_2	As	Mo	Ni
NCS HC 19606a	Ferrovanadium						0.0026	0.015
NCS HC 19608	Ferro Molybdenum	0.134					61.20	
NCS HC 19609	Ferro Molybdenum	0.36					58.13	
NCS HC 19610	Vanadium pentoxide		96.68	0.18	0.96	<0.001		
NCS HC 19611	Vanadium pentoxide		98.80	0.14	1.03	<0.001		
NCS HC 19612	Ferrovanadium						0.0016	0.008

Number	Name	Chemical Composition(Percent)										Unit Size (in g)
		TV	Si	P	S	Mn	Fe	Cr	Ti	K	Na	
NCS HC19613	Vanadium Pentoxide	54.40	0.137	0.0078	0.192	0.055	0.30	0.128	0.063	0.11	0.31	25
NCS HC19613a	Vanadium Pentoxide	54.60	0.120	0.0065	0.160	0.030	0.183	0.133	0.042	0.11	0.27	25
NCS HC19613b	Vanadium Pentoxide	54.39	0.112	0.0074	0.172	0.018	0.119	0.147	0.022	0.11	0.25	25

Number	Name	Chemical Composition(Percent)												Unit Size (in g)
		C	Si	Mn	P	S	Cr	Cu	Al	Ti	W	B	Ca	
NCS HC 25602a	Ferromolybdenum	0.020	0.20		0.031	0.042		0.159						50
NCS HC 25603b	High Carbon Ferro Chrome	7.37	1.27	0.31	0.020	0.015	65.27			0.104				50
NCS HC 25605a	Si-Mn alloy	1.09	18.28	66.3	0.145	0.0104				0.18		0.0063		50
NCS HC 25605b	Si-Mn Alloy		14.20	69.77	0.153	0.0052							2.21	50
NCS HC 25605c	Si-Mn Alloy	0.456	21.87	67.2	0.132	0.0076	0.029	0.019		0.175		0.010		50
NCS HC 25606	Ferro Tungsten	0.055	0.34	0.12	(0.028)	0.048		0.043			76.66			50
NCS HC 25606a	Ferro Tungsten	0.036	0.34	0.102	0.033	0.052		0.079			76.24			50
NCS HC 25616	Ferro Silicon	0.081	76.74	0.17	0.02	0.004	0.14		1.80				0.30	50
NCS HC 25618	Ferro Silicon	0.066	76.42	0.14	0.025	0.003	0.097		0.78				0.19	50
NCS HC 25619a	Medium Carbon Ferro Manganese	1.18	0.75	81.95	0.163	0.0018								50
NCS HC 25619b	Medium Carbon Ferro Manganese	1.2	0.75	81.74	0.163	0.0018								50
NCS HC 25620	Medium Carbon Ferro Manganese	1.50	0.94	80.48	0.153	0.0030								50
NCS HC 25621	Medium Carbon Ferro Manganese	1.40	1.51	79.44	0.344	0.0029								50
NCS HC 25627	Ferro Silicon	0.081	76.74	0.172	0.023	0.004	0.140		1.80				0.30	50
NCS HC 25629	Low Carbon Ferro Manganese	0.300	0.63	84.28	0.196	0.0018								50
NCS HC 25629a	Low Carbon Ferro Manganese	0.31	1.06	81.68	0.196	0.0022								50
NCS HC 25629b	Low Carbon Ferro Manganese	0.560	0.96	80.79	0.169	0.0024								50

		Co	Ni	V	Fe	Sn	As	Mo
NCS HC 25602a	Ferromolybdenum							62.19
NCS HC 25603b	High Carbon Ferro Chrome	0.044	0.39	0.138	24.90			
NCS HC 25605c	Si-Mn Alloy	0.020	0.013	0.040	10.01			
NCS HC 25606a	Ferro Tungsten					0.041	0.041	

Number	Name	Chemical Composition(Percent)								Unit Size (in g)
		Cr	Si	P	C	S	Mn	V	Ni	
NCS HC25636b	Low Carbon Ferro Chrome	67.76	0.28	0.026	0.048	0.0044	0.298		0.331	50
NCS HC25651a	Medium Carbon Ferrochromium	61.07	1.25	0.028	0.81	0.0028	0.83	0.11		50

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)												Unit Size
		Cr	Si	Mn	P	C	S	Al	Ca	Cu	Ni	B	Ti	N	(in g)
NCS HC 25632	High Carbon Ferro Manganese		0.69	78.41	0.204	6.68	0.0086								50
NCS HC 25633	Silicon chrome Alloy	33.90	44.06	0.29	0.013	0.045	0.002	1.00							50
NCS HC 25635a	Low Carbon Ferro Chrome	63.44	1.07	0.44	0.035	0.218	0.0033								50
NCS HC 25636a	Extra Low Carbon Ferro Chrome	62.81	0.32	0.39	0.028	0.028	0.028			0.032	0.34				50
NCS HC 25640a	Si-Mn Alloy		24.47	65.50	0.117	0.197	0.0079								50
NCS HC 25641	Silicox Manganese		27.88	60.29	0.078	0.082	0.0069				0.30	0.021	0.11		50
NCS HC 25642	Nitrided Ferro Manganese		1.70	71.02	0.183	1.11	0.0065							1.92	50
NCS HC 25643	Silicon chrome	32.62	19.17	0.129	0.0083	0.018	0.0025	1.24							50
NCS HC 25644	High nitrogen Fe-Cr	62.57	0.75		0.024	0.0064	0.029							8.69	50
NCS HC 25646	Si-Mn alloy		32.90	59.34	0.043	0.018	0.0034					0.048	0.24		50
NCS HC 25647	Low carbon Fe-Si	0.010	77.42	0.074	0.012	0.0068	0.003	0.011	0.003				0.043		50
NCS HC 25648	Silicon				0.0065			0.026	0.055				0.023		50
NCS HC 25649	Silicon				0.0067			0.032	0.06				0.026		50
NCS HC 25650	Ferro niobium				0.085	0.074	0.028	0.89		0.023			0.49		50
NCS HC 25652	Nitride Fe-Si		51.85		0.014	0.35	0.003						0.052	28.15	50
NCS HC 25653	High carbon Fe-Cr	62.49	0.15	0.11	0.025	8.70	0.024						0.016		50
NCS HC 25654	Silicon manganese		19.26	65.29	0.109	0.876	0.0122					0.022	0.19		50
NCS HC 25656	Ferro nickel	3.63	1.04		0.039	3.06	0.246				12.16				50
NCS HC 25657	Si-Mn alloy		25.03	67.96	0.065	0.58	0.011						0.18		50
NCS HC 25658	Ferro boron		1.68		0.017	0.022	0.016	0.99				20.58			50

		Co	V	Fe
NCS HC 25635a	Low Carbon Ferro Chrome		0.093	
NCS HC 25636a	Extra Low Carbon Ferro Chrome	0.16	0.098	35.56

Number	Name	Chemical Composition(Percent)													Unit Size
		Cr	Si	Mn	P	C	S	Al*	Mo	Cu	Ni	V	Ti	Zn*	(in g)
NCS HC 26607b	High Carbon Ferrochrome	65.86	2.18	0.38	0.017	7.23	0.020				0.29		0.15		50
NCS HC 26608b	Ferro Vanadium	0.70	0.84	1.64	0.051	0.22	0.0044	0.002				50.57		0.0024	50
NCS HC 26608c	Ferro Vanadium	0.71	0.81	2.00	0.043	0.17	0.0040	0.0025				53.78		0.004	50
NCS HC 26610b	Ferro Molybdenum		1.54		0.036	0.042	0.059		61.85	0.29					50
NCS HC 26611b	Silicon Manganese Alloy		18.24	67.44	0.080	1.24	0.009								50
NCS HC 26620	Silicon Manganese Alloy		19.15	54.97	0.060	0.40	0.011						0.24		50
NCS HC 26621	Silicon Manganese Alloy		27.49	61.49	0.072	0.039	0.009						0.24		50

		Pb	Sn	Sb	As	W
NCS HC 26610a	Ferro Molybdenum	(0.002)	(0.002)	(0.01)	0.015	0.011
NCS HC 26610b	Ferro Molybdenum		(0.008)	(0.002)	0.008	0.060

Number	Name	Chemical Composition(Percent)											Unit Size
		Si	Mn	Al	Cr	P	Ca	C	S	Ti	Ni	Mo*	(in g)
NCS HC 25627a	Ferrosilicon	74.58	0.179	0.74	0.48	0.023	0.056	0.075	0.0038				50
NCS HC 26607c	High-Carbon Ferro Chromium	0.2	0.19		69.53	0.011		8.28	0.024	0.039	0.25		50
NCS HC 26621a	Silicon Manganese Alloy	23.02	63.94	0.003		0.06		0.29	0.01	0.34		0.0008	50

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		C	Si	Mn	P	S	Cu	Ti	Fe	V	Alt	Als	
NCS HC 26613	Ferro Titanium	0.019	1.84	1.11	0.020	0.013	0.005	30.24		0.20	8.16	8.10	50
NCS HC 26615	Nitride manganese		0.0086	91.56		0.031	0.0071		0.038				50
Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		Cr_2O_3	SiO_2	Fe_2O_3	Crs	T.C	T.S	As	ZrO_2	Al_2O_3	CaO	MgO	TiO_2
NCS HC 26617	Chrome oxide	96.19	0.26	0.054	1.34	0.006	0.002	(0.0001)					20
NCS HC 26618	Zirconium dioxide		0.11	0.054					99.48	0.009	0.17	0.093	20
NCS HC 26619	Titanium dioxide			0.006	1.34	0.011	0.006			0.65			98.21	20
Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		Si	Mn	Ti	Fe	Ca	Mg	RE	P	C	S	Cr	
NCS HC 28609	R_E-Mg Alloy	43.90	0.70	0.54	(31.67)	1.01	10.20	8.66					80
NCS HC 28611	R_E-Mg Alloy	43.22	0.55	0.362	(40.7)	0.84	5.70	5.10					80
NCS HC 28612	R_E-Mg Alloy	43.44	0.63	0.435	(36.43)	0.90	8.25	6.42					80
NCS HC 28615	Rare-earth Ferro Silicon	41.02	0.390	0.235		5.60		20.00					100
NCS HC 28616a	Silicon Manganese Alloy	14.33	62.530	0.222	20.000				0.205	2.28	0.020	0.060	50
NCS HC 28616b	Silicon Manganese Alloy	17.590	64.970	0.221	15.160				0.127	1.570	0.018	0.055	50
NCS HC 28618	Silicon Manganese Alloy	19.340	67.400	0.255	11.650				0.107	1.050	0.017	0.045	50
NCS HC 28619	High-Carbon Ferro Chromium	4.250	0.300	0.412	30.220				0.023	7.280	0.024	56.760	50
NCS HC 28620	High-Carbon Ferro Chromium	3.950	0.382	0.423	31.410				0.022	7.600	0.031	55.770	50
NCS HC 28621	High-Carbon Ferro Chromium	1.450	0.307	0.166	27.090				0.026	7.780	0.033	62.540	50
NCS HC 28622	High-Carbon Ferro Chromium	2.430	0.340	0.261	28.65				0.025	7.720	0.033	60.000	50
NCS HC 28624	Ferro Molybdenum	0.367	0.039		37.220				0.044	0.019	0.078	0.052	50
NCS HC 28625	HighCarbon Ferro Manganese	0.525	65.98	0.081	26.420		0.0006		0.805	6.140	0.0034	0.014	50
NCS HC 28626	HighCarbon Ferro Manganese	0.073	66.44	0.0035	26.620		0.0054		0.268	6.260	0.0014	0.032	50
NCS HC 28627	HighCarbon Ferro Manganese	0.208	66.27	0.027	26.600		0.004		0.428	6.230	0.0023	0.026	50
NCS HC 28628	Medium Carbon Ferromanganese	1.840	76.55	0.0065	17.860		0.0036		0.265	1.840	0.017	0.124	50
NCS HC 28629	Low Carbon Ferromanganese	0.475	82.61		16.470		0.0012		0.080	0.296	0.0022	0.033	50
NCS HC 28631	Ferroboron	0.180	0.310	0.017					0.025	0.400	0.0023	0.025	50
NCS HC 28632	Ferroboron	0.650	0.575	0.030					0.027	0.190	0.002	0.260	50
NCS HC 28633	Ferrovanadium	0.682	0.663				0.022		0.056	0.285	0.0044	0.110	50
NCS HC 28634	Ferrovanadium	1.890	0.365				0.115		0.093	0.475	0.014	0.289	50
NCS HC 28635	SiCaAl	43.60	0.095		17.53		15.18		0.051	1.000	0.040	0.054	50
NCS HC 28636	SiBaAl	50.36	0.110		16.68		1.44		0.016	0.34	0.038	0.083	50
NCS HC 28638	Ferro Titanium	4.51	0.362	27.34					0.015	0.033	0.0048	0.055	50

Section 3 Ferroalloy(Powder)

		Chemical Composition(Percent)												
		Ni	Cu	V	Co	As	Sb	Pb	W	Mo	Sn	Zn	Al	B
NCS HC 28616a	Silicon Manganese Alloy	0.167	0.080	0.095	0.048	0.015	0.003	0.001						
NCS HC 28616b	Silicon Manganese Alloy	0.092	0.096	0.060	0.035	0.010	0.001	0.001						
NCS HC 28618	Silicon Manganese Alloy	0.036	0.051	0.063	0.017	0.0099	0.0004	0.0001						
NCS HC 28619	High-Carbon Ferro Chromium			0.203										
NCS HC 28620	High-Carbon Ferro Chromium			0.175										
NCS HC 28621	High-Carbon Ferro Chromium			0.138										
NCS HC 28622	High-Carbon Ferro Chromium			0.153										
NCS HC 28624	Ferro Molybdenum	0.144	1.070			0.0078	0.0059	0.0022	0.047	61.00	0.0026			
NCS HC 28625	High Carbon Ferro Manganese	0.032	0.065	0.055		0.0047		0.0092				0.0082		
NCS HC 28626	High Carbon Ferro Manganese	0.109	0.072	0.133		0.0015		0.106				0.026		
NCS HC 28627	High Carbon Ferro Manganese	0.087	0.070	0.110		0.055		0.077				0.022		
NCS HC 28628	Medium Carbon Ferromanganese	0.132	0.152	0.100		0.055		1.300				0.0017		
NCS HC 28629	Low Carbon Ferromanganese	0.0032	0.127	0.041		0.017		0.126				0.011		
NCS HC 28631	Ferroboron	0.013	0.015	0.009									0.036	18.92
NCS HC 28632	Ferroboron	0.056	0.050	0.010									0.185	19.33
NCS HC 28633	Ferrovanadium	0.011	0.054	54.02		0.0017		0.0001					0.0026	
NCS HC 28634	Ferrovanadium	0.067	0.064	47.32		0.024		0.0004					0.0061	
NCS HC 28635	SiCaAl	0.026	0.046										16.63	
NCS HC 28636	SiBaAl	0.021	0.032										4.07	
NCS HC 28638	Ferro Titanium			0.15									7.82	

		Ba	Sr
NCS HC 28635	SiCaAl	1.640	0.022
NCS HC 28636	SiBaAl	24.260	0.095

Number	Name	Chemical Composition(Percent)												Unit Size
		C	N	V	Si	Mn	P	S	Cr	Fe	Ca	Al	As	O*	(in g)
NCS HC 28639	Vanadium Nitrogen Alloy	9.22	9.44	77.58	0.4	0.0091	0.147	0.0025	0.0032	1.95	0.066	0.24	0.0074	0.5	25
NCS HC 28640	Vanadium Nitrogen Alloy	6.01	13.31	76.73	0.4	0.0045	0.142	0.0019	0.019	1.76	0.1	0.28	0.012	0.7	25
NCS HC 28641	Vanadium Nitrogen Alloy	5.71	14.13	78.04	0.26	0.0065	0.012	0.0013	0.082	0.65	0.064	0.26	0.0014	0.6	25
NCS HC 28642	Vanadium Nitrogen Alloy	3.39	16.64	77.73	0.23	0.005	0.01	0.0016	0.082	0.57	0.044	0.24	0.0012	0.6	25

Number	Name	Chemical Composition(Percent)								Unit Size
		V_2O_5	Si	P	Fe	K_2O	Na_2O	S	As	(in g)
NCS HC 28643	Vanadium Pentoxide	98.44	0.054	0.0056	0.23	0.14	0.81	0.011	0.0013	25

Number	Name	Chemical Composition(Percent)												Unit Size
		Mo	C	Si	Mn	P	S	Cr	Ni	Cu	W	Sn	As	Sb	(in g)
NCS HC 28644	Ferro Molybdenum	59.36	0.017	0.11	0.004	0.037	0.127	0.0072	0.016	0.133	0.144	0.04	0.116	0.017	50
NCS HC 28645	Ferro Molybdenum	57.44	0.014	0.033	0.003	0.047	0.11	0.0065	0.017	0.167	0.164	0.049	0.152	0.013	50

		Pb	Fe
NCS HC 28644	Ferro Molybdenum	0.0015	39.87
NCS HC 28645	Ferro Molybdenum	0.0017	41.78

Number	Name	Chemical Composition(Percent)										Unit Size
		Si	Ca	P	Al	C	S	O	Fe*	Cr	Mn	Ni	(in g)
NCS HC35610	Si-Ca Alloy	61.36	31.28	0.022	1.22	0.31	0.025	0.88	3.68				50
NCS HC35611	Si-Ca Alloy	64.82	27.98	0.021	1.13	0.23	0.011	0.78	4.18				50
NCS HC37622	Middle-Carbon Ferro Chromium	0.642		0.016		2.74	0.031			63.75	0.119	0.217	50

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		Mn	Si	P	C	S	N	Cr	V_2O_5	Fe	Na_2O	K_2O	
NCS HC 35601	Medium Carbon Ferromanganese	77.7	0.91	0.169	1.81	0.0022							50
NCS HC 35602	Medium Carbon Ferromanganese	79.4	1.26	0.159	1.36	0.0022							50
NCS HC 35603	Medium Carbon Ferromanganese	83.92	1.08	0.153	0.61	0.0024							50
NCS HC 35604	Silicon Manganese Alloy	62.42	27.2	0.07	0.076	0.0096							50
NCS HC 35605	Silicon Manganese Alloy	66.93	18.7	0.142	1.13	0.014							50
NCS HC 35606	Nitrided Ferro Manganese	75.78	1.25	0.147	0.8	0.0082	5.63						50
NCS HC 35607	High-Carbon FerroChromium	0.22	1.18	0.037	8.12	0.022		56.54					50
NCS HC 35608	Vanadium Pentoxide		0.18	0.03					98.05	0.12	0.42	0.17	50
NCS HC 35609	Ferro Nickel	0.16	2.3	0.054	2.58	0.288		2.25					50
		As	S*	Cu	Co	Ni							
NCS HC 35608	Vanadium Pentoxide	0.0011	0.0009										
NCS HC35609	Ferro Nickel			0.023	0.29	10.01							

Number	Name	Chemical Composition(Percent)							Unit Size (in g)
		Si	Mn	P	Cr	Al	Fe	Ca	
NCS HC 37601	Ferro Silicon	68.91	0.177	0.024	0.142	2.18	26.88		80
NCS HC 37602	Ferro Silicon	73.29	0.140	0.022		2.74	21.37	0.616	80

Number	Name	Chemical Composition(Percent)							Unit Size (in g)
		Ca	Si	Mn	Ti	Fe	RE	Mg	
NCS HC 39601	R_E-Mg Alloy	3.21	40.31	2.72	1.50	20.81	20.09	9.50	75

Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		C	Si	Mn	P	S	Cr	Ni	Cu	V	Co	Sn	
NCS HC 41601	Ferro Manganese	0.86	0.948	83.35	0.180	0.003	0.335	0.080	0.107	0.03	0.145	0.0019	150
		As	Sb	Pb	N	Zn	Fe	Bi					
NCS HC 41601	Ferro Manganese	0.048	0.015	0.068	0.018	0.12	13.48	0.00005					

Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		C	Si	P	S	Cu	Mo	Mn	Ti	Cr	B	V	Al	
NCS HC 37603	Ferro Molybdenum	0.054	0.30	0.046	0.071	0.126	61.41							50
NCS HC 37604	Ferro Molybdenum	0.044	0.71	0.046	0.069	0.117	57.65							50
NCS HC 37605	Si-Mn Alloy	1.55	17.67	0.14	0.024			65.64						50
NCS HC 37606b	Silicon Manganese Alloy	2.26	13.87	0.42	0.040			60.13	0.25					50
NCS HC 37607	Low carbon ferro Chrome	0.086	1.39	0.034	0.005			0.35		64.32				40
NCS HC 37608	Low carbon ferro Chrome	0.243	0.99	0.039	0.019			0.34		64.06				40
NCS HC 37609	High carbon ferro Chrome	8.49	2.15	0.024	0.015			0.20	0.24	61.54				50
NCS HC 37611	High Carbon Ferro manganese	6.57	0.64	0.382	0.009			65.75						50
NCS HC 37612	Silicon Manganese Alloy	1.1	18.96	0.178	0.016			67.02	0.276					50
NCS HC 37614	Ferro Manganese	0.939	1.71	0.130				81.11				0.075		100
NCS HC 37615	High Carbon Ferrochrome	8.78	0.78	0.023	0.025				0.097	63.50				50
NCS HC 37616	Ferro Vanadium	0.081	0.50	0.016	0.012			0.58				49.72	5.18	50
NCS HC 37617	High Carbon Ferrochrome	8.32	1.91	0.021	0.040					59.35				50
NCS HC 37618	High Carbon Ferrochrome	8.44	0.30	0.026	0.026					69.12				50
NCS HC 37619	Carbon Chromium Alloy	12.53	0.22		0.008					83.83				50
NCS HC 37620	Si-Ca Alloy	0.68	60.09	0.017	0.033									50
NCS HC 37621	Si-Ca Alloy	0.71	60.19	0.031	0.020									50
		Ca	Als											
NCS HC 37620	Si-Ca Alloy	30.70	1.09											
NCS HC 37621	Si-Ca Alloy	25.25	1.55											

Number	Name	Chemical Composition(%)											Unit Size (in g)
		C	S	Si	Mn	P	Cr	Ni	Cu	Al	Fe	Ca	Ti	
NCS HC 93616	Ferrosilicon	0.208	0.0033	73.61	0.237	0.023	0.022	0.0069	0.019	2.14	21.06	2.05	0.121	50
NCS HC 93617	Ferrosilicon	0.220	0.0039	76.34	0.237	0.025	0.027	0.0056	0.015	1.75	19.43	1.31	0.119	50

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)												Unit Size (in g)
		C	S	Si	Mn	P	Cr	Al	Ca	Fe	Cu	Ni	Ti	
NCS HC 93601	Ferrosilicon	0.148	0.0026	75.46	0.588	0.021	0.044	1.4	1.15	20.23	0.019	0.0093	0.097	50
NCS HC 93602	Ferrosilicon	0.196	0.0052	74.8	11.09	0.024	0.052	1.28	0.986	20.96	0.013	0.0071	0.106	50
NCS HC 93603	Ferrosilicon	0.095	0.0023	76.53	0.281	0.019	0.043	1.52	1.373	19.07	0.025	0.012	0.085	50
NCS HC 93604	Micro Carbon Ferrochrome	0.038	0.015	0.466	0.103	0.022	68.13					0.26	0.016	50
NCS HC 93605	High Carbon Ferrochromium	8	0.037	2.94	0.308	0.037	59.71					0.312	0.41	50
NCS HC 93606	Ferro Molybdenum	0.073	0.044	0.19		0.037					0.494			50
NCS HC 93607	Ferro Niobium	0.101	0.013	1.04		0.194		1.5			0.038		0.585	50
NCS HC 93608	Ferro Titanium	0.095	0.015	0.3	0.255	0.014		3			0.281		32.22	50
NCS HC 93609	High Carbon Ferrochromium	8.36	0.068	1.15	0.207	0.023	58.28							50
NCS HC 93610	High Carbon Ferrochromium	7.99	0.03	0.26	0.225	0.018	70.15							50
NCS HC 93611	High Carbon Ferrochromium	8.13	0.059	0.92	0.21	0.022	60.42							50
NCS HC 93612	Si-Ca Alloy	2.44	0.1325	5.31		0.019		1.88	28.25	6.08				50
NCS HC 93613	Si-Ca Alloy	1.30	0.088	56.2		0.018		1.77	31.67	5.58				50
NCS HC 93622	Ferro Phosphorus	0.228	0.017	0.156	0.70	27.50	0.226						0.53	50
NCS HC 93623	Ferroboron	0.45	0.0044	0.44		0.025		0.083					0.019	50
NCS HC 93624	Silicon Manganese Alloy	1.79	0.024	16.87	64.86	0.120								50
NCS HC 93625	Silicon Manganese Alloy	1.66	0.026	17.19	65.74	0.151								50
NCS HC 93626	Silicon Manganese Alloy	1.91	0.020	16.42	63.80	0.097								50
NCS HC 93627	Si-Ca Alloy	1.02	0.045	57.43		0.030		1.76	28.02	6.94				50
NCS HC 93628	Ferro Vanadium	0.130	0.016	0.730	0.474	0.042		6.10						30
NCS HC 93628a	Ferro Vanadium	0.152	0.017	0.730	0.475	0.043		6.03						30
NCS HC 93629	Ferro Vanadium	0.032	0.014	0.86	0.046	0.036		1.33						25
NCS HC 93630a	Vanadium Nitride Alloy	4.17	0.0084	0.16	0.015	0.064		0.19						25
NCS HC 93630b	Vanadium Nitride Alloy	7.06	0.0018	0.103	0.057	0.0083		0.22						25
NCS HC 93631	Si-Ca-Ba-Al Alloy	0.78	0.044	37.19	0.43	0.032		13.46	5.16	27.56				50
NCS HC 93632	Si-Ba Alloy	0.99	0.13	47.56	0.16	0.024		2.78		11.75				50
NCS HC 93633	Si-Al Alloy	0.45	0.022	28.31	0.426	0.023		29.67		37.44				50
NCS HC 93634	Si-Ba-Ca Alloy	0.64	0.204	52.62	0.104	0.022		1.82	14.08	12.97				50
NCS HC 93636	SiAlFe	0.11	0.0071	26.11	1.70	0.021		36.22						50
NCS HC 93638	Ferrosilicon	0.9	0.037	65.74	0.182	0.025	0.099	1.27	3.15	18.67	0.054	0.029	0.131	50
NCS HC 93639	Ferrosilicon	0.73	0.01	41.29	0.256	0.03	0.11	2.4	0.28	52.26	0.132	0.056	0.209	50
NCS HC 93640	Ferrosilicon	1.12	0.055	63.21	0.15	0.022	0.088	1.33	4.4	16.85	0.069	0.024	0.125	50
NCS HC 93641	Ferrosilicon	0.44	0.013	71.2	0.242	0.028	0.089	1.21	1.26	22.07	0.033	0.035	0.137	50
NCS HC 93642	Ferrosilicon	0.56	0.013	73.39	0.216	0.032	0.084	1.12	1.14	18.96	0.032	0.046	0.135	50
NCS HC 93643	Nitrided Ferro Silicon	0.52	0.019	49.67		0.018		0.72	0.45	15.08			0.071	50

		Mo	Sb	Nb	Ta	B	V	N	Ba	Mg	Sr	Si_3N_4
NCS HC 93606	Ferro Molybdenum	56.12	0.036									
NCS HC 93607	Ferro Niobium			64.6	0.097							
NCS HC 93623	Ferroboron					18.69						
NCS HC 93628	Ferro Vanadium						50.24					
NCS HC 93628a	Ferro Vanadium						50.09					
NCS HC 93629	Ferro Vanadium						80.90					
NCS HC 93630a	Vanadium Nitride Alloy						76.54	15.23				
NCS HC 93630b							77.74	13.14				
NCS HC 93631	Si-Ca-Ba-Al Alloy								10.00	0.098		
NCS HC 93632	Si-Ba Alloy								27.54			
NCS HC 93634	Si-Ba-Ca Alloy								14.14	0.051	0.063	
NCS HC 93643	Nitrided Ferro Silicon											29.65

Number	Name	Chemical Composition(%)			Unit Size (in g)
		Si	Al	Fe	
NCS HC 93614	SiAlFe	33.75	31.91	27.84	50
NCS HC 93615	SiAlFe	29.87	34.80	30.47	50

Section 3 Ferroalloy(Powder)

Number	Name	Chemical Composition(Percent)											Unit Size (in g)
		C	Si	Mn	P	S	Cr	Al	Ca	Mo	As	Cu	
NCS HC93644	High-Carbon Ferro Chromium	8.15	2.65	0.267	0.023	0.023	55.31						50
NCS HC93645	High-Carbon Ferro Manganese	6.24	0.68	64.42	0.209	0.014							50
NCS HC93646	Middle-Carbon Ferro Manganese	1.79	1.75	76.82	0.207	0.014							50
NCS HC93647	Mn-Si Alloy	1.65	17.3	66.65	0.135	0.015							50
NCS HC93648	Ferrosilicon	0.083	72.31		0.019	0.0021	0.165	1.37	1.28				50
NCS HC93649	Ferro Molybdenum	0.066	0.12		0.026	0.137				54.37	0.12	0.309	50

Number	Name	Chemical Composition(Percent)									Unit Size (in g)
		Cr	C	Si	Mn	P	S	Ti	V	Fe	
NCS HC28646	High-Carbon Ferro Chromium	53.32	7.22	1.34	0.225	0.044	0.075	0.189	0.306	36.62	50g
NCS HC28647	High-Carbon Ferro Chromium	54.25	7.33	3.8	0.299	0.04	0.026	0.491	0.267	32.76	50g
NCS HC28648	High-Carbon Ferro Chromium	53.45	7.69	2.56	0.24	0.033	0.02	0.339	0.287	34.91	50g
NCS HC28649	High-Carbon Ferro Chromium	68.53	9.22	0.12	0.104	0.026	0.034	0.016	0.098	21.62	50g
NCS HC28650	High-Carbon Ferro Chromium	71.76	8.17	0.214	0.093	0.017	0.026	0.02	0.099	19.18	50g

Number	Name	Chemical Composition(%)											Unit Size (in g)
		Cr	C	S	Si	Mn	P	V	Ni	Cu	Zn	As	Sb	
NCS HC28651	Low Carbon Ferrochrome	54.72	0.175	0.0049	0.78	0.159	0.029	0.229	0.278	0.0097	0.015	0.0014	0.0003	50g

Number	Name	Chemical Composition(%)									Unit Size (in g)
		SiC	SiO_2	F.Si	F.C	T.C	Fe_2O_3	Al_2O_3	CaO	MgO	
NCS HC28652	Silicon Carbide	98.69	0.32	0.19	-0.01	29.57	0.62	0.04	0.031	0.002	50g
NCS HC28653	Silicon Carbide	95.02	2.35	0.25	0.43	29.07	1.16	0.27	0.13	0.018	50g
NCS HC28654	Silicon Carbide	93.45	2.28	0.31	1.58	29.44	1.34	0.56	0.21	0.015	50g
NCS HC28655	Silicon Carbide	72.02	5.6	0.41	2.31	23.91	1.22	9.2	1.18	0.2	50g
NCS HC28656	Silicon Carbide	83.09	4.09	0.33	1.35	26.34	1.17	4.83	0.63	0.11	50g
NCS HC28657	Silicon Carbide	73.04	6.8	0.1	8.18	30.21	3.34	5.97	1.16	0.13	50g
NCS HC28658	Silicon Carbide	71.88	7.38	0.12	6.94	28.77	3.39	6.95	2.2	0.12	50g
NCS HC28659	Silicon Carbide	81.12	4.49	0.06	4.84	29.43	3.16	3.98	1.82	0.065	50g
NCS HC28660	Silicon Carbide	92.14	1.66	0.08	1.36	29.21	1.83	1.77	0.13	0.012	50g

Number	Name	Chemical Composition(%)												Unit Size (in g)
		Cr	C	S	Si	Mn	P	V	Ni	Cu	Zn	As	Sb	
NCS HC28661	Low Carbon Ferrochrome	55.11	0.148	0.004	0.712	0.155	0.025	0.226	0.262	0.0094	0.014	-0.001	0.0002	50g
NCS HC28662	Low Carbon Ferrochrome	58.56	0.121	0.0051	0.543	0.167	0.028	0.195	0.294	0.011	0.012	0.002	0.0005	50g
NCS HC28663	Low Carbon Ferrochrome	55.26	0.066	0.0029	1.5	0.164	0.022	0.281	0.226	0.011	0.016	0.0062	0.0002	50g
NCS HC28664	Low Carbon Ferrochrome	54.38	0.071	0.003	0.527	0.164	0.033	0.246	0.257	0.018	0.015	0.0046	0.0002	50g
NCS HC28665	Low Carbon Ferrochrome	54.99	0.077	0.0033	1.47	0.164	0.025	0.28	0.236	0.012	0.016	0.0062	0.0002	50g
NCS HC28666	Low Carbon Ferrochrome	55.06	0.246	0.0031	0.418	0.211	0.025	0.24	0.216	0.01	0.0065	0.0017	0.0002	50g
NCS HC28667	Low Carbon Ferrochrome	58.13	0.11	0.0044	1.84	0.24	0.027	0.157	0.288	0.0073	0.0079	(0.001)	(0.0001)	50g
NCS HC28668	Low Carbon Ferrochrome	64.23	0.182	0.0028	1.53	0.337	0.031	0.102	0.284	0.03	0.0056	0.0031	0.0005	50g

Number	Name	Chemical Composition(%)											Unit Size (in g)
		Cr	Si	Ti	P	C	S	Mn	Ni	Cu	O	N	V	
NCS HC37623	High Carbon Ferrochrome	49.71	4.06	0.501	0.01	7.1	0.015	0.42	0.254	0.029	0.09	(0.01)	0.324	50g
		Nb	Co	Fe										
NCS HC37623	High Carbon Ferrochrome	0.029	0.05	37.3										