

X-MET5100

Typical Performance for different types of Alloys Alloy FP

Cobalt alloys											
Element	Cr	Ni	Mo	Nb	W	Co	Fe	Mn			
Range	19.2 - 30.5	0.2 - 35.2	0 - 9.6	0 - 2.5	0 - 15.4	33.5 - 68.5	0.3 - 3.1	0 - 1.9			
Error, wt. %	1.3	0.18	0.08	0.03	0.66	0.94	0.21	0.12			
Copper alloys											
Element	Cu	Ni	Zn	Pb	Sn	Mn	Fe				
Range	58.7 - 100	0 - 29.6	0 - 39.3	0 - 9.2	0 - 9.7	0 - 2.9	0 - 4.0				
Error, wt. %	1.42	0.11	0.18	0.10	0.23	0.03	0.16				
Low alloy steels											
Element	V	Cr	Mn	Fe	Ni	Cu	Mo				
Range	0 - 0.15	0 - 8.8	0 - 0.9	89.4 - 100	0 - 1.7	0 - 0.22	0 - 0.94				
Error, wt. %	0.02	0.21	0.19	0.75	0.12	0.07	0.03				
Nickel alloys											
Element	Ti	Cr	Mn	Fe	Co	Ni	Cu	Nb	Mo	W	
Range	0 - 2.9	0 - 29.9	0 - 1.5	0 - 47.8	0 - 12.9	30.7 - 99.5	0 - 32.3	0 - 5.2	0 - 26.6	0 - 14.2	
Error, wt. %	0.07	0.41	0.07	0.26	0.09	1.18	0.16	0.09	0.21	0.28	
Stainless steels											
Element	Ti	V	Cr	Mn	Fe	Co	Ni	Cu	Nb	Mo	W
Range	0 - 2.0	0 - 0.28	11.4 - 24.0	0 - 9.3	30.6 - 86.2	0 - 18.0	0.1 - 35.8	0 - 3.7	0 - 0.65	0 - 6.2	0 - 3.5
Error, wt. %	0.05	0.06	0.38	0.12	1.19	0.10	0.29	0.15	0.02	0.04	0.09
Tool steels											
Element	Cr	Ni	Mo	W	Co	V	Mn	Fe			
Range	0.1 - 12.5	0 - 1.3	0.09 - 4.8	0 - 18.2	0 - 5.1	0 - 1.8	0.2 - 2.0	69.4 - 96.1			
Error, wt. %	0.25	0.12	0.06	0.21	0.07	0.06	0.22	1.92			

Error %:

Typical difference between measured value and certified reference value when large set of test samples is measured using 5s measuring time with multiple production instruments. Note that performance of individual instruments may differ slightly.

Range:

Concentration range of the measured test samples (calibration range is 0-100% for all measured element in AlloyFP).