

## PRODUCT TEST CERTIFICATE

Product Name	Spherical Tungsten Powder	Type	0-20 $\mu$ m		
Lot No.	20220815-W	Quantity	100Kg		
<b>Chemical Composition</b>					
Element	Value (%)	Test Method	Element	Value (%)	Test Method
W	$\geq 99.9$	—	Sn	<0.001	ICP-AES
Al	<0.002	ICP-AES	Sb	<0.001	ICP-AES
Si	<0.001	ICP-AES	Cu	<0.001	ICP-AES
Mg	<0.001	ICP-AES	Ca	<0.001	ICP-AES
Mn	<0.001	ICP-AES	Mo	<0.001	ICP-AES
Ni	<0.001	ICP-AES	K+Na	<0.001	ICP-AES
<b>Gas Impurities</b>					
Element	Value (%)		Element	Value (%)	
C	0.002		O	0.018	
N	0.003		P	0.002	
<b>Density</b>			<b>Hall Flow Rate</b>		
Apparent Density (g/cm <sup>3</sup> )	Tap Density (g/cm <sup>3</sup> )		Value(s/50g)		
10.47	11.50		7.5		
SEM					