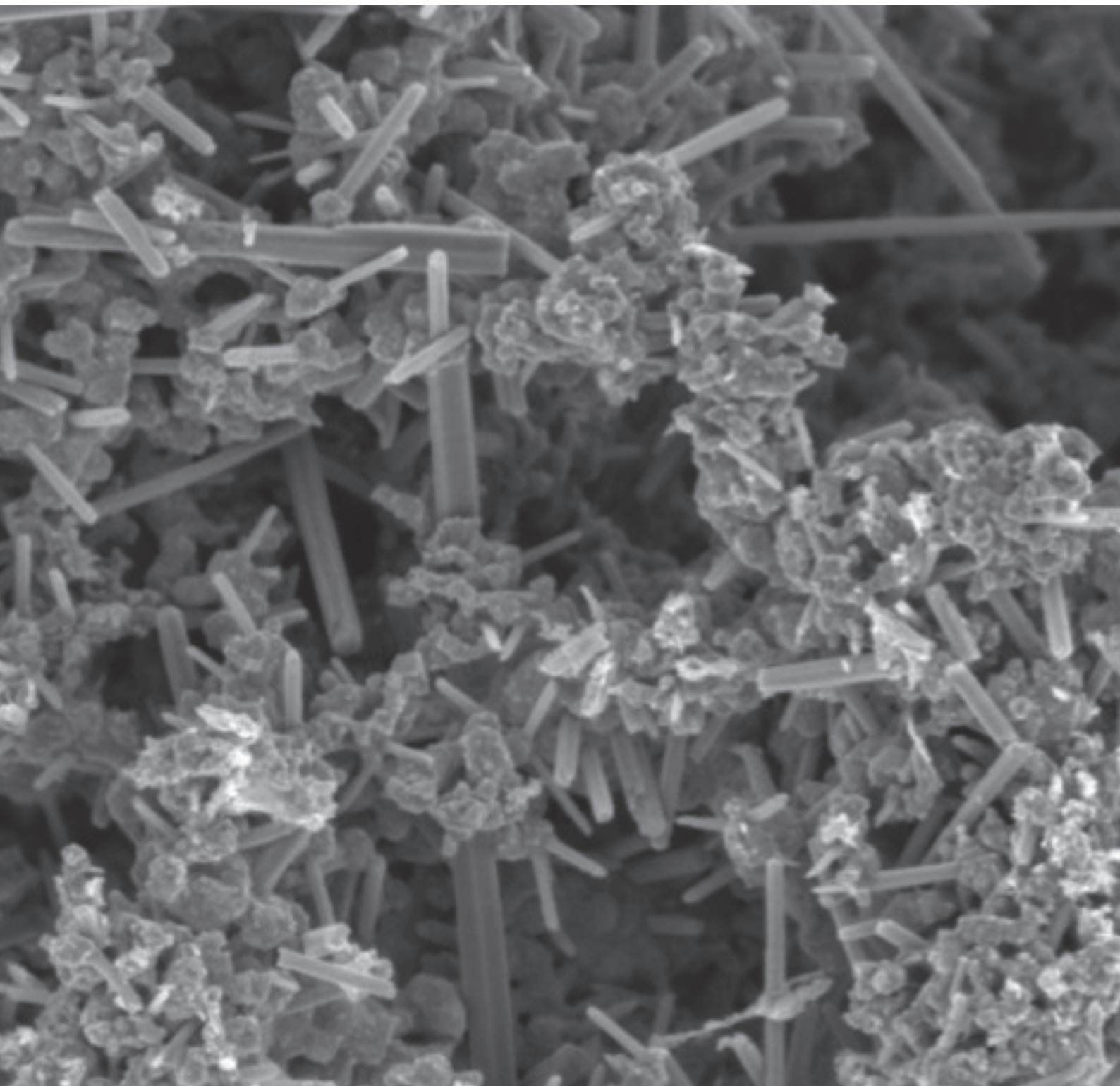




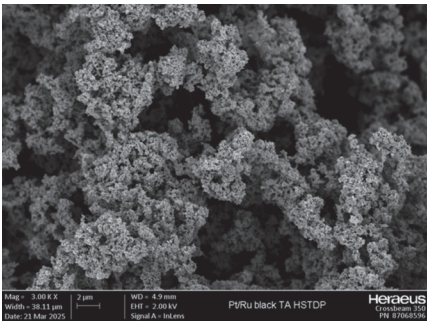
Precious Metal Blacks

Advanced Electrode Materials
for High-Performance Gas Detection

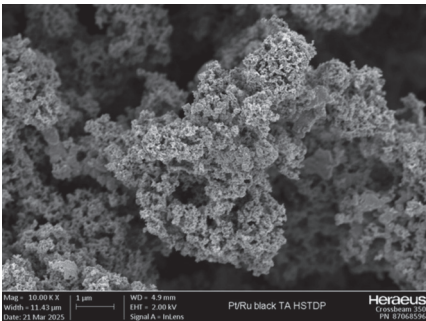


Platinum/Ruthenium Powders

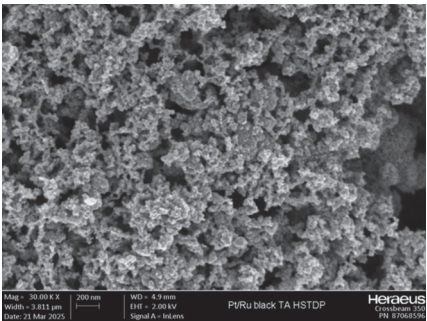
Product	Material Number	Description	PM (%)	Surface Area (m²/g)	Tap Density (g/cc)	Particle Size Distribution (µm)			Applications
						d10	d50	d90	
Platinum/ Ruthenium Black TA HSTD	5089781		25 Pt 75 Ru	12 - 17	0.6 - 1.5	5	8	11	H ₂ S Sensors



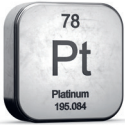
Platinum/Ruthenium Black TA HSTD



Platinum/Ruthenium Black TA HSTD

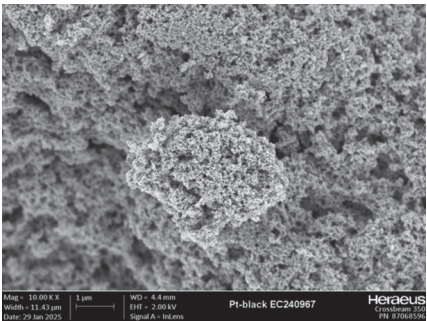


Platinum/Ruthenium Black TA HSTD

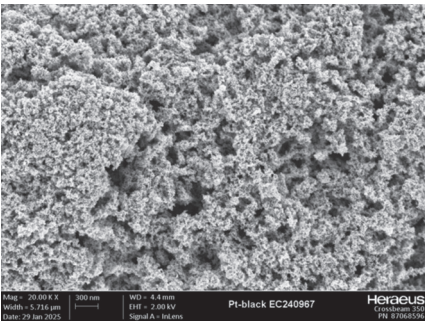


Platinum Powders

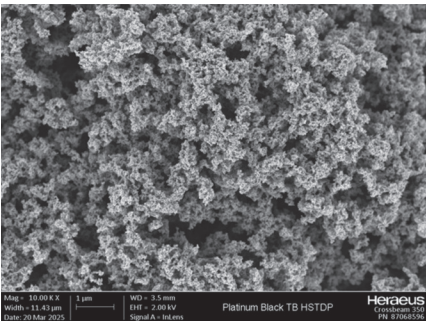
Product	Material Number	Description	PM (%)	Surface Area (m²/g)	Tap Density (g/cc)	Particle Size Distribution (µm)			Applications
						d10	d50	d90	
Platinum Black TA HSTD	5089533	High Surface Area	> 97	25 – 35	0.6 – 1.5	5	7	10	H ₂ and CO Sensors
Platinum Black TB HSTD	5090565	Low Surface Area	> 97	15 – 25	0.6 – 1.5	8	14	23	H ₂ Sensor in CO Environment



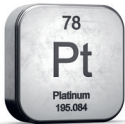
Platinum Black TA HSTD



Platinum Black TA HSTD

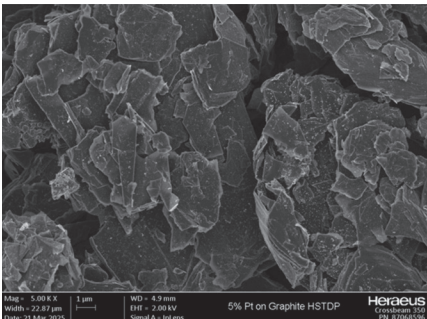


Platinum Black TB HSTD

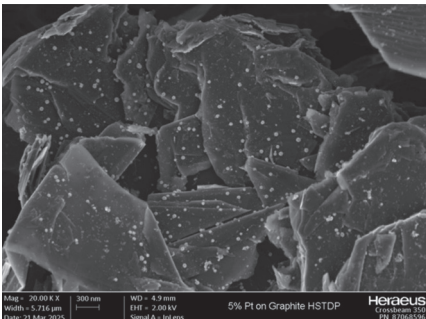


Platinum/Graphite Powders

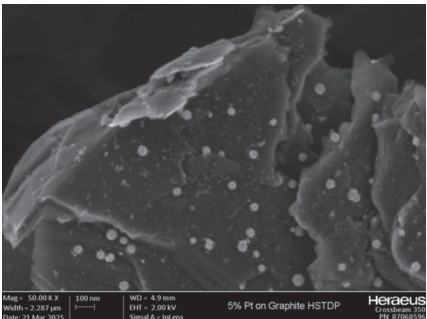
Product	Material Number	Description	PM (%)	Surface Area (m²/g)	Tap Density (g/cc)	Particle Size Distribution (µm)			Applications
						d10	d50	d90	
5% Platinum on Graphite HSTD	5089535	Graphite Powder	5	10 - 15	TBA	9	7	5	NH ₃ Gas Sensors



5% Platinum on Graphite HSTD



5% Platinum on Graphite HSTD

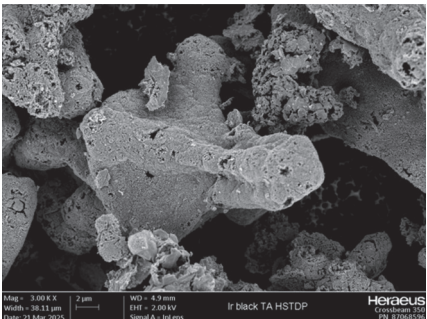


5% Platinum on Graphite HSTD

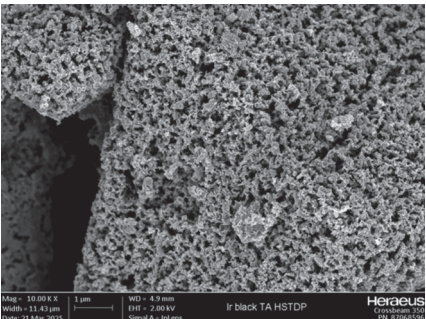


Iridium Powders

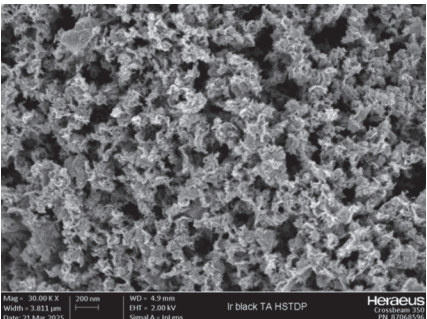
Product	Material Number	Description	PM (%)	Surface Area (m²/g)	Tap Density (g/cc)	Particle Size Distribution (µm)			Applications
						d10	d50	d90	
Iridium Black TA HSTD	5089770	High Surface Area	> 98	20 – 25	0.6 – 1.5	8	12	16	H ₂ S Sensors



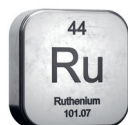
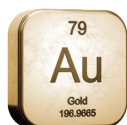
Iridium Black TA HSTD



Iridium Black TA HSTD

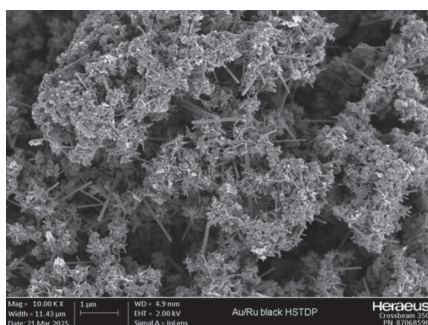


Iridium Black TA HSTD

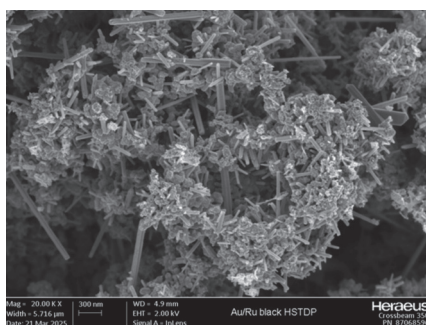


Gold/Ruthenium Powders

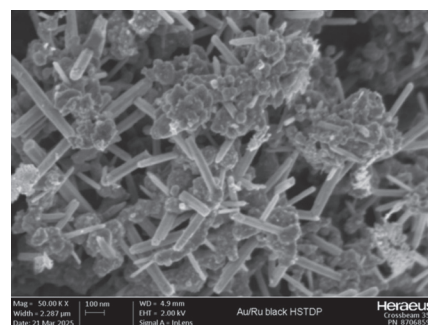
Product	Material Number	Description	PM (%)	Surface Area (m ² /g)	Tap Density (g/cc)	Particle Size Distribution (µm)			Applications
						d10	d50	d90	
Gold/ Ruthenium Black HSTD	5089794	Brown Powder	100	3 - 6	0.6 - 1.5	10	15	20	SO ₂ Sensors



Gold/Ruthenium Black HSTD



Gold/Ruthenium Black HSTD



Gold/Ruthenium Black HSTD

Precious Metal Blacks

Precious metal blacks are very fine powders of precious metals with high catalytic activity and an excellent selectivity towards specific toxic gases. Precious metal blacks are in addition to their use in gas sensors also applied in the dental industry, in proton exchange membranes and in electrodes for electrochemistry.

Heraeus Precious Metals offers high-quality precious metal blacks at different surface areas. Due to Heraeus' broad portfolio, it is possible to manage costs and react to price increases of certain precious metals. For example, the recent price increase for iridium potentially lead to the need of substituting iridium blacks with other products like platinum blacks to ensure a sustainable performance-cost ratio of your products.



Need personal advice?

Contact our experts at Heraeus
heraeus.pm/blacks
chemicals@heraeus.com