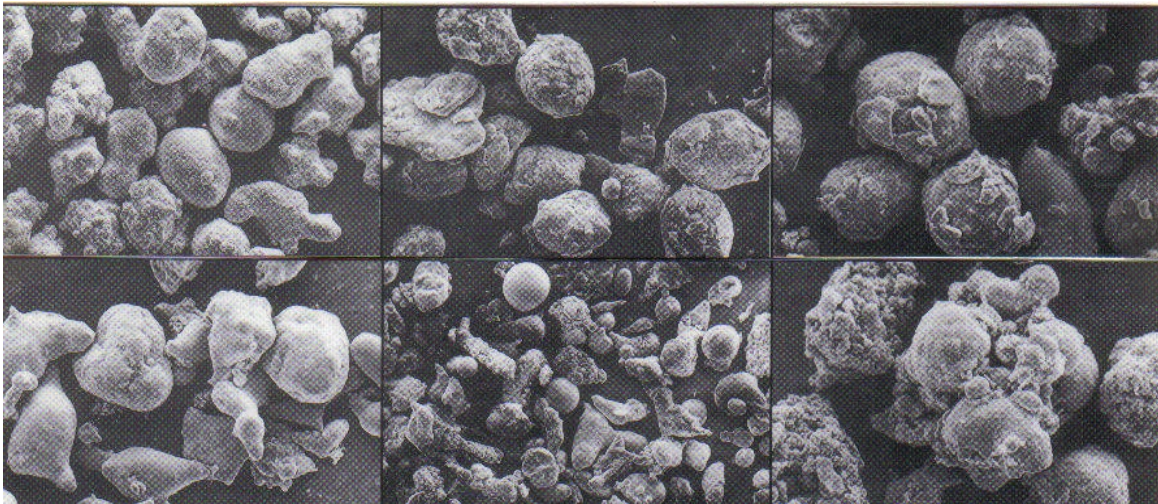


SPECIAL COMPOSITE POWDERS

Composite Powders are essential thermal spraying materials composed of two or more components which can be metals, alloys, ceramics or plastics. Their particles have complicated structures. The coatings formed by these types of powders have various special characteristics because of the different components and particle structures. Special Composite Powders can be used to form various coatings with the properties of wear and corrosion resistance, self-lubrication, electrical conductivity and microwave adsorption, etc. Clients can select powders according to their application requirements.



POWDER	PARTICLE SIZE (MESH)	TYPICAL COMPOSITION (%)	COATING FUNCTION & APPLICATIONS
TS-111 Silver Clad Phosphorus	-140+325	Ni: 80 P: Balance	* Resistant to oxidation and corrosion; * Excellent bonding property
TS-115 Aluminum Silicon -Polyberzolate	-140+325	Al: 52~53 Si: 8~7 PBL: Balance	* Good lubricity, strong bonding; * Useful for seal coating
TS-170 Microwave Absorbing Powder	-140+325	Fe-Cr-Al Fe-Cr-Al-Ni Fe-Cr-Mn Fe-Ni	* Coating absorbing microwave; * Good for electron linear accelerator, high energy physical equipment and radar system
TS-201 High-bonding Iron Base Composite Powder	-140+325	Cu: 5 Cr: 1.0 Ni: 12~14 W: 14 Fe: 50~60 C: 1 Others: Balance	* Sheering strength=6~11kg/mm ² ; * Friction coefficient=0.3~0.5, Rc=33; * Wear resistant, good for friction sheets of tanks, bulldozers & synchromesh gears of automobiles to prolong the service life
TS-210 High-bonding Copper Base Composite Powder	-140+325	Cu: 50~60 Fe: 7 Ni: 12 Cr: 1.5 Al: 4 Others: Balance	* Sheering strength=5~6kg/mm ² ; * Friction coefficient=0.15~0.4, Rc=22; * Its other functions similar to those KF-201

SPECIAL COMPOSITE POWDERS

POWDER	PARTICLE SIZE (MESH)	TYPICAL COMPOSITION (%)	COATING FUNCTION & APPLICATIONS
TS-27 Copper Clad Chromium	-140+325	Cu: 30~70 Cr: Balance	* Resistant to oxidation and wear; * Excellent electric conductivity; * good as electric switch materials
TS-31 Nickel Clad Diatomite	-200	Ni: 75 Diatomite: 25	* Good as high temperature wear-reducing material, abrasion-resistant seal ring coating, low-friction material, movable seal parts & abrasion-resistant seal parts at temperature over 500°C
TS-36 Nickel Clad Molybdenum Disulfide	-200	Ni: 75~80 Impurities < 2 MoS ₂ : Balance	* Good lubricate at over 500°C; * Wear reducing; * Good for movable seal parts, abrasion-resistant seal rings and low friction materials
TS-37 Nickel-Aluminum Molybdenum Disulfide	-140+325	Al: 5 MoS ₂ : 6~8 Ni: Balance	* Self-bonding and self-lubricating wear-reducing coating; * Restoring various axles
TS-38 Nickel Base Alloy-Molybdenum Disulfide	-140+325	Al: 5 MoS ₂ : 6~8 Ni Base Alloy: Bal.	
TS-39 Copper-Aluminum Molybdenum Disulfide	-140+325	Al: 8~10 MoS ₂ : 6~8 Cu: Balance	* Self-bonding and self-lubricating wear-reducing coating; * Restoring various bearings and Cu, Al alloy parts
TS-40 Copper Base Alloy-Molybdenum Disulfide	-140+325	Al: 3~5 MoS ₂ : 6~8 Ni < 10 Cu Base Alloy: Bal.	
TS-51 Nickel Clad Copper	-140+325	Ni: 68~70 Impurity < 1.5 Cu: Balance	* Resistant to wear, corrosion and high temperature, good heat conductivity; * Applied to coat slideway of large machine tools
TS-61 Nickel Clad Chromium	-140+325	Ni: 40~80 Impurity < 1.0 Cr: Balance	* High bonding strength, resistant to corrosion & oxidation; * Good as heat, corrosion and oxidation resistant coating
TS-73 Silver Clad Copper	-170mesh+10μm	Ag: 0.5~4.0 Cu: 60~99.5	* Good as silver-saving braze welding material, electric conductive fillings and coating
TS-76 Nickel Clad PTFE	-140+325	Ni: 60~80 PTFE: Balance	* Good self-lubricate, increasing thermal conductivity of bearings and reducing friction; * Applied as friction parts of mechanical bearings
TS-81 Nickel Clad Nylon	-140+325	Ni: 60~80 Nylon: Balance	* Excellent lubricity; * Good as low-friction material