

INLAND ATOMIZE METAL POWDER LLP

Survey No. 230/2, Por-Manglej Road, Village - Manglej, Ta. KARJAN, Vadodara - 391243

Email: Info@Inlandatomizemetalpowder.com

Mo: +9196623 00876

IAMP NiBraze

Material: Nickel Base Super Alloy

Manufacturing Method: Gas Atomization Process

Ni-Si-P-B brazing alloy is a nickel-based low-melting brazing and infiltration alloy containing controlled additions of silicon, phosphorus, and boron.

Chemical Composition (Weight %)

Grade	C	Si	Cr	B	Mo	P	Ni	Fused Hardness (HRC)
IAMP NiBraze – 15		2.25		0.55		1.95	Bal	12 – 18
IAMP NiBraze – 20		2.25		0.85		1.95	Bal	15 – 22
IAMP NiBraze – 25		2.75		0.95		2.15	Bal	21 – 28
IAMP NiBraze – 30		3.75		1.05		2.05	Bal	27 – 34
IAMP NiBraze – 30Cr		2.75	3.1	0.95		2.05	Bal	24 – 33
IAMP NiBraze – 35	0.12	2.85	4.1	1.05	3.1	2.05	Bal	31 – 37
IAMP NiBraze – 40	0.22	2.90	4.1	1.25	3.1	2.25	Bal	35 – 40

Powder Characteristics & Applications

- Particle Shape: Spherical (high sphericity due to gas atomization)
- Excellent flowability and capillary action
- Good wettability on steel, nickel alloys, and carbide substrates
- Low cracking tendency due to reduced boron content
- Good corrosion resistance in neutral environments
- Brazing of nickel alloys, stainless steels, and tool steels
- Bond coat for hard facing systems
- PTA and laser cladding bonding layers
- Repair and joining of precision components

Particle Size

- Flame Spray: 45 – 106 µm / 20 – 106 µm
- HVOF: 15 – 45 µm
- Laser Cladding: 45 – 150 µm
- Custom made particle size can be made upon request

Packaging:

Powder will be supplied by standard packing in Plastic Jar of 1Kg, 5Kg, and 25Kg or can be supplied as per customer special requirement.

Storage:

- Keep in a cool, dry environment away from humidity
- Tumble container before use to ensure powder homogeneity
- Reseal containers immediately after powder withdrawal
- If moisture pickup occurs, dry at 65–95 °C for 120 Minutes with lid loosened
- Remove Silica Gel pouch before using the powder

Specification is only for Reference purposes, and it varies with application requirements