



Aerospace Industry Copper Nickel Alloy Monel 400 Wire With High Temperature Resistance

Our Product Introduction

for more products please visit us on victory-alloy.com

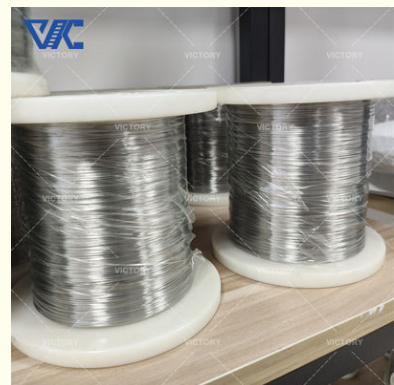
Basic Information

- Place of Origin: China
- Brand Name: Victory
- Certification: CE,ROHS,ISO 9001
- Model Number: Monel 400
- Minimum Order Quantity: 5 Kg
- Price: Negotiable
- Packaging Details: Special packaging requirements can also be accommodated. OEM is also acceptable.
- Delivery Time: 5-21 days
- Payment Terms: L/C, T/T, Western Union, MoneyGram
- Supply Ability: 300 tons per month



Product Specification

- Product Name: Monel 400 Wire
- Material: Nickel Base Alloy
- Nickel(Min): 67%
- Density: 8.83 G/cm3
- Melting Point: 1300-1350°C
- Thermal Conductivity: 21.8 Watts/meter Kelvin
- Linear Expansion Coefficient: 13.0×10^{-6} /degrees Celsius
- Yield Strength: 240 MPa
- Tensile Strength: 520 MPa
- Elongation (\geq %): 40%
- Sureface: Bright,Oxided
- Highlight: **Monel Nickel Alloy Wire,
Nickel Based Monel Wire,
Corrosion Resistant Monel Wire**



More Images



Product Description

Introduction:

Monel 400 yarn plays an important role in the aerospace industry. As a high-performance nickel-copper alloy wire, it has excellent corrosion resistance and high temperature performance, and can meet the strict requirements for material strength, corrosion resistance and reliability in the aerospace field.

In the aerospace industry, materials need to be able to withstand extreme environmental conditions, including high and low temperatures, high pressures and highly corrosive media. Monel 400 wire has excellent corrosion resistance and can resist the erosion of acidic, alkaline and salty media, including aviation fuel, liquid oxygen and other chemicals. This makes it ideal for manufacturing aircraft engines, fuel systems, aerospace components and spacecraft components.

In addition, Monel 400 wire also has good high temperature performance. It can maintain stable mechanical properties and creep resistance in high-temperature environments, providing reliable solutions for high-temperature applications in the aerospace industry. Its high strength and heat resistance make it suitable for the manufacture of key components such as jet engine turbine blades, combustion chamber components and thermal protection layers for aerospace materials.

Parameter:

Item	Ni	Cu	Fe	Mn	C	Si	S
Monel 400	≥63	28-34	≤2.5	≤2	≤0.3	≤0.5	≤0.025

Item	Density	Melting point	Tensile Strength	Yield Strength	Elongation	HB
Monel 400	8.83 g/cm ³	1300-1390°C	480	170	35%	≥331

Monel 400	Bar/Rod	Forging	Pipe	Sheet/Strip	Welding Wire
Standard	ASTM B164	ASTM B564	ASTM B165	ASTM B127	ErNiCu-7

AMS Number	Alloy	Type	UNS	Cross Ref. Spec	Misc./Shape
AMS 4544 Plate	Monel 400	Nickel Copper	N04400	QQ-N-281	Plate
AMS 4544 Sheet	Monel 400	Nickel Copper	N04400	QQ-N-281	Sheet
AMS 4544 Strip	Monel 400	Nickel Copper	N04400	QQ-N-281	Strip
AMS 4574	Monel 400	Nickel Copper	N04400	-	Tubing
AMS 4675 Bar	Monel 400	Nickel Copper	N04400	ASTM B 164	Bar
AMS 4730	Monel 400	Nickel Copper	N04400	QQ-N-281	Wire
AMS 4731 Ribbon	Monel 400	Nickel Copper	N04400	-	Ribbon
AMS 4731 Wire	Monel 400	Nickel Copper	N04400	-	Wire



Shape	Size(mm)
Wire	0.15-7.5
Rod/Bar	8.0-200
Strip	(0.5-2.5)*(5-180)
Plate	custom made

Characteristic:

Corrosion resistance: Monel 400 alloy wire has excellent corrosion resistance and can resist many corrosive media, including seawater, salt water, acidic and alkaline media, etc.

High strength: It has high tensile strength and yield strength, ensuring structural strength and reliability in aerospace applications.

Good mechanical properties: Monel 400 alloy wire has good plasticity and processability, making it easy to manufacture parts with complex shapes.

High temperature resistance: It has good high temperature stability and can maintain stable performance in high temperature

environments.

Advantage:

Corrosion resistance: The corrosion resistance of Monel 400 alloy wire in the aerospace industry enables it to resist corrosion in marine environments and is suitable for applications such as marine aircraft and aerospace engine parts.

High strength and lightweight: Monel 400 alloy wire has high strength and relatively low density, which helps realize lightweight design of aerospace vehicles and improves fuel efficiency and load capacity.

Good high-temperature performance: Monel 400 alloy wire can maintain stable performance in high-temperature environments and is suitable for applications such as aerospace engines, gas turbines, and high-temperature components.

Wear resistance: It has good wear resistance and can maintain stable performance under high-speed flight and complex working conditions of the spacecraft.

Application:

Aeroengine: Monel 400 alloy wire can be used to manufacture aeroengine parts, such as nozzles, turbine blades and combustion chambers, to provide excellent corrosion resistance and high temperature performance.

Aircraft structure: Suitable for structural components of spacecraft, such as bolts, springs, connectors and brackets, etc., to provide high strength and lightweight design.

Gas turbine: Suitable for high-temperature components of gas turbines, such as combustion chambers, turbines and blades, to provide high temperature resistance and corrosion resistance.

Spacecraft propulsion system: Can be used to manufacture components of spacecraft propulsion systems, such as nozzles and thrust regulators.

Overall, the specific parameters, characteristics, advantages and applications of Monel400 alloy wire in the aerospace industry are introduced as above. This alloy wire plays an important role in the aerospace field due to its corrosion resistance, high strength, good mechanical properties and high temperature resistance, and is widely used in aerospace engines, spacecraft structures, gas turbines and spacecraft propulsion systems. aspect.

contact us

email:victory@dlx-alloy.com

Oem service:

Welcome customized size

We are experience factory for OEM&ODM service



Q&A:

Q: How is Monel 400 wire typically packaged for shipment?

A: Monel 400 wire is typically packaged in coils, spools, or straight lengths, depending on the customer's needs.

Q: What are the common shipping options for Monel 400 wire?

A: Common shipping options for Monel 400 wire include air freight, sea freight, and truck transportation. Air freight is often chosen for time-sensitive deliveries or international shipments.



Changzhou Victory Technology Co., Ltd



+8619906119641



victory@dlx-alloy.com



victory-alloy.com

NO.32 West Taihu Road, Xinbei District, Changzhou, Jiangsu