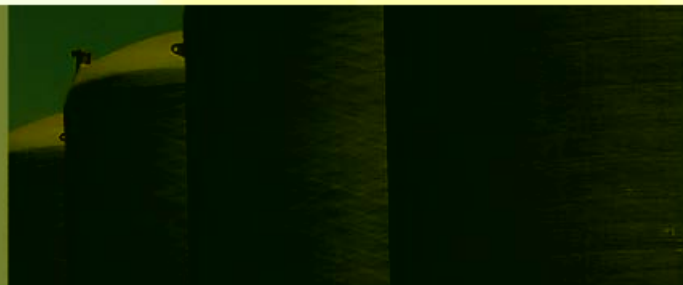


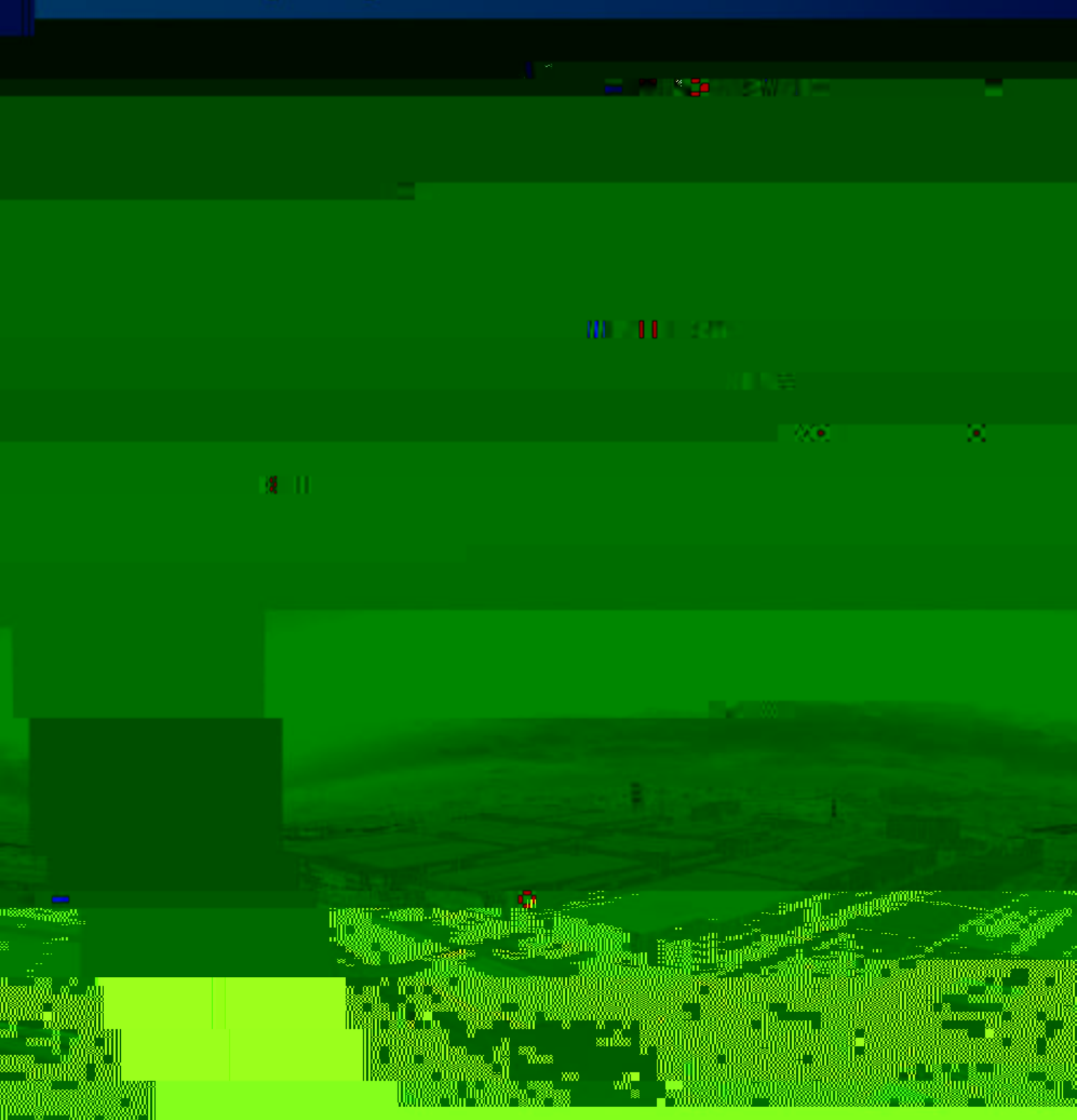
E6-CK Glass Fiber

Best Corrosion Resistance Solution for High-Performance Composite Materials



Boron-Free Fluorine-Free Glass Fiber

Company Profile



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Best Corrosion Resistance Solution for
High-Performance Composite Materials

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E6-CR GLASS FIBER

Excellent Corrosion
Resistance



Compared with typical

Material	Corrosion Resistance	Strength	Modulus	Weight	Cost
E6-CR Glass Fiber	Excellent	High	High	Low	Low
Carbon Fiber	Good	Very High	Very High	High	High
Fiberglass	Good	Medium	Medium	Low	Low
Kevlar	Good	High	High	Medium	Medium
Carbon Fiber	Good	Very High	Very High	High	High

Material	Corrosion Resistance	Strength	Modulus	Weight	Cost
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Kevlar	Good	High	High	Medium	Medium
Carbon Fiber	Good	Very High	Very High	High	High

E6-CR REINFORCEMENTS

Excellent Environment Durability

In the future, end-use composite products will operate in even harsher environments and the end-users will expect enhanced durability. Compared with E6® glass fiber, **E6-CR enhanced glass fiber** reinforced composite materials offer better corrosion resistance and temperature endurance, making composite parts more reliable and cost effective.

Superior Mechanical Properties

Test Sample	Property	Standard	E	E6®	E6-CR
Tensile property of impregnated roving, Epoxy resin	Tensile strength (MPa)	ASTM D2343	1900~2000	2500~2700	2500~2700
	Tensile modulus (MPa)	ASTM D2343	73~75	81~83	81~84
1200 g/m ² UD fabric, (tested in 0° direction), Infusion process, Epoxy resin	Tensile strength (MPa)	ISO 527-5	/	1120.6	1125.0
	Tensile modulus (MPa)	ISO 527-5	/	42.6	42.9
	Fiber Volume Content (%)	ISO 1172	/	53.6	54.0
	Tensile strength (MPa)	ISO 14126	/	805.5	810.5
	ensile modulus (GPa)	ISO 14126	/	42.9	43.1
	Fiber Volume Content (%)	ISO 1172	/	54.3	54.4

Chemical Stability

Degradation (% Loss) after boiling in water for 7 days

Sample	Property	Standard	E6®	E6-CR
800g/m ² woven roving	Glass content (%)	ISO 1172	57	57
	Tensile strength (MPa)	GB/T 1447	38.1%	11.4%
Unsaturated polyester	Tensile modulus (GPa)	GB/T 1447	2.8%	1.9%
Hand laid laminates	Flexural strength (MPa)	GB/T 1449	29.5%	22.3%
	Flexural modulus (GPa)	GB/T 1449	2.6%	1.8%

Temperature Resistance

Glass fiber reinforced composites are increasingly used in harsh environments, such as pipes used in oil-field processing or in treatment of high temperature waste gases. Drastic changes in ambient temperature reduce the strength and thus shorten the operating life of composite materials.

The composite samples tested below were dried for 10 days at 180, and then put in an -60 environment for another 10 days. The relative loss of properties after the exposure is shown in the table below.

Sample	Property	Standard	E6®	E6-CR
100g/m ² woven roving	Glass content (%)	ISO 1172	58	58
	Tensile strength (MPa)	GB/T 1447	4.9%	4.5%
Unsaturated polyester	Tensile modulus (GPa)	GB/T 1447	6.6%	6.1%
Hand laid laminates	Flexural strength (MPa)	GB/T 1449	17.0%	15.4%
	Flexural modulus (GPa)	B/T 1449	14.0%	12.8%

ENVIRONMENTAL PROTECTION

Become a Model for Clean Production

China Jushi is committed to improving our environmental footprint. We have invested heavily in the most modern technologies available to reduce pollutant emissions into our environment. Improved oxygen firing technology reduced total waste gas emissions from the furnace by 80% and the nitrogen oxide emissions by over 90%. State of the art glass recycling technology ensures zero discharge of process waste glass fiber. Modern waste purification technology enables zero discharge of industrial waste water from our production process. E6-CR glass fiber is produced by more scientific production technology and process which not only improve the product performances, but also control air pollutants at source. The development of E6-CR glass fiber is consistent with our constant commitment to social responsibility and sustainability. Not only have we achieved the goal of improving our glass fiber products, but we also have improved our environmental footprint at the same time.





CUSTOMER AND TECHNICAL SUPPORT ORGANIZATION

Offer Best Technical Support

China Jushi possesses world class core technologies and advanced testing and analysis capabilities for glass, organic chemistry, fiberglass and composites. We have established a global network of marketing and technical support.





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