

Composite Scrim Product

JRS supply biaxial and multi-axia Fiberglass Laid Scrim and Polyester Laid Scrim, Our products mainly cover the following categories:

1. Non-woven fiberglass laid scrim
2. Non-woven polyester laid scrim
3. Fiberglass tissue/non-woven fabric with Fiberglass/Polyester laid scrim composite product

Each of the above products supports customization, and yarn specifications/tissue specifications/non-woven fabric specifications/mesh size/weight/width and etc. can be matched according to customer needs.



Product Application

Non-woven laid scrim is a cost-effective reinforcing fabric constructed of continuous filament yarn in an open mesh construction, fiberglass tissue/Non-woven fabric with mesh is combined with laid scrim and fiberglass tissue/non-woven fabric, which is widely used in aluminum foil laminated, double sided adhesive tape, medical tissue composite, PVC sports flooring, building material, automotive interior and etc. It can be composite with many materials because of the unique constructions and features.

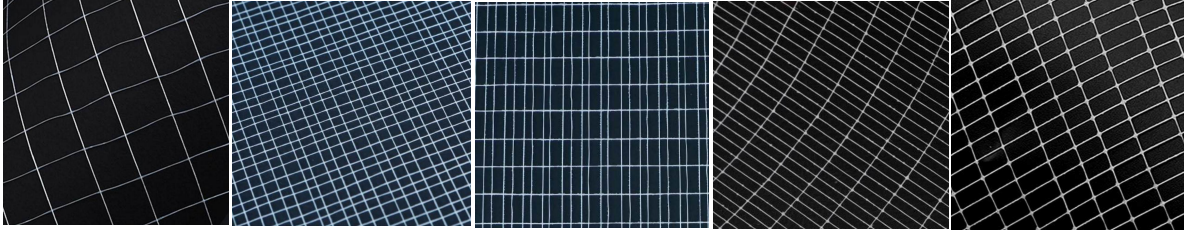


JRS (HangZhou) Performance Material Co, Ltd.

Add: Room 312, 3rd Floor, No. 268 Dagan Road,
Gongshu District, Hangzhou ZHEJIANG PROVINCE, China
<https://www.jrsmaterial.com/>
E-mail: liuqiang@jrsmaterial.com
Tel.: +86 139 6436 0811

⊙ Description

Fiberglass laid scrim is a versatile and high - performance reinforcing non - woven fabric. Made from continuous filament fiberglass yarn, it features an open mesh structure formed by arranging yarn in specific patterns and chemically bonding them.



⊙ Characteristic

High Strength and Stability: It has high tensile strength and tear resistance, can enhance the mechanical strength of products, and its dimensional stability ensures that composite materials maintain shape and performance during use.

Excellent Resistance: It's resistant to alkali, water, fire, and microbes, so it can be used in harsh environments for a long time without degrading.

Lightweight and Easy to Handle: With low unit weight, it's convenient for transportation and operation, and can be easily cut and installed on-site to meet different construction requirements.

Good Compatibility: It can be fully bonded with various materials like nonwovens, films, and foils to create composite products with unique properties.

⊙ Technical Datasheet

结构mm	单位面积质量 (g/m ²)	经纱 (tex fiberglass)	纬纱 (tex fiberglass)	经向强力 (N/50mm)	纬向强力 (N/50mm)	经向延伸率 (%)	纬向延伸率 (%)
5.0 * 5.0	15.5(±8%)	34	34	200	200	2.9	2.9
5.0 * 5.0	31.68(±8%)	68	68	350	350	2.9	2.9
3.0 * 3.0	25(±8%)	34	34	280	280	2.9	2.9
3.0 * 3.0	49.73(±8%)	68	68	775	775	2.9	2.9
3.0 * 10.0	33(±8%)	68	68	360	200	2.9	2.9
3.0 * 12.0	16(±8%)	34	34	300	80	2.9	2.9
6.25 * 6.25	12.4(±8%)	34	34	150	150	2.9	2.9
6.25 * 12.5	9.3(±8%)	34	34	150	70	2.9	2.9
12.5 * 12.5	6.3(±8%)	34	34	80	80	2.9	2.9
10.0 * 10.0	7.78(±8%)	34	34	100	100	2.9	2.9
2.5+10 * 8.0	22(±8%)	68	68	400	320	—	—

⊙ Application

Building and construction: Widely used in roofing membranes, waterproofing materials, vapor barriers, and facade membranes to enhance their mechanical properties and durability.

Flooring industry: Serves as a reinforcement layer in PVC flooring, preventing joints or bulges caused by material expansion and contraction.

Packaging Industry: Used in envelope, cardboard container, and paper tape manufacturing to reinforce packaging products, improving their strength and performance while keeping costs low.

⊙ Advantages

Cost - effective : Offers a relatively low cost while providing significant reinforcement benefits, making it an economical choice for various applications[^12^].

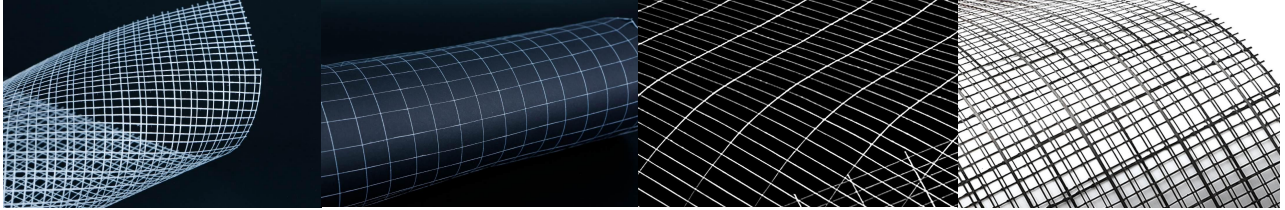
Customizable : Can be customized in terms of fiber direction, mesh size, weight, and adhesive type to meet specific customer requirements and application needs

JRS (HangZhou) Performance Material Co, Ltd.

Add: Room 312, 3rd Floor, No. 268 Dagan Road,
Gongshu District, Hangzhou ZHEJIANG PROVINCE, China
<https://www.jrsmaterial.com/>
E-mail: liujiang@jrsmaterial.com
Tel.: +86 139 6436 0811

⊙Description

Polyester laid scrim is a versatile and cost-effective reinforcing fabric made from continuous polyester filament yarns arranged in an open grid pattern. The manufacturing process involves laying the yarns in biaxial or multi-axial directions and bonding them with adhesives to form a stable structure.



⊙Characteristic

High strength and dimensional stability: Provides excellent tensile strength, tear resistance, and alkali resistance, ensuring the reinforced products maintain their shape and performance under various conditions.

Lightweight and thin: Compared to woven fabrics, it's thinner and lighter, making it suitable for applications where weight is a concern.

Excellent adhesion: Can be fully bonded with a wide range of materials, including PVC, aluminum foils, papers, and nonwovens, ensuring strong interlayer adhesion.

⊙Technical Datasheet

结构mm	单位面积质量 (g/m ²)	经纱 (dtex fiberglass)	纬纱 (dtex fiberglass)	经向强力 (N/50mm)	纬向强力 (N/50mm)	经向延伸率 (%)	纬向延伸率 (%)
2.5 * 5.0	6.5(±8%)	83	83	70	25	21	21
2.5 * 5.0	97(±8%)	550*3+3300	550*3+2200*2	1000	600	2.9	2.9
2.5 * 10.0	6.2(±8%)	83	83	70	15	21	21
3.5 * 5.0	62(±8%)	550*4+2200	550*4+1100	450	180	21	21
8.0 * 12.5	4.7(±8%)	110	110	20	15	21	21
4.0 * 4.0	38.5(±8%)	550	550	350	350	21	21
12.5 * 12.5	1.7(±8%)	83	83	15	15	21	21
4.0 * 6.5	9.6(±8%)	83*2	167	75	45	21	21

⊙Application

Building and construction: Widely used in roofing membranes, waterproofing materials, vapor barriers, and facade membranes to enhance their mechanical properties and durability.

Flooring industry: Serves as a reinforcement layer in PVC flooring, preventing joints or bulges caused by material expansion and contraction.

Packaging Industry: Used in envelope, cardboard container, and paper tape manufacturing to reinforce packaging products, improving their strength and performance while keeping costs low.

⊙Advantages

Cost-effective : Offers a relatively low cost while providing significant reinforcement benefits, making it an economical choice for various applications[^12^].

Customizable : Can be customized in terms of fiber direction, mesh size, weight, and adhesive type to meet specific customer requirements and application needs.

JRS (HangZhou) Performance Material Co., Ltd.

Add: Room 312, 3rd Floor, No. 268 Dagan Road,
Gongshu District, Hangzhou ZHEJIANG PROVINCE, China
<https://www.jrsmaterial.com/>
E-mail: liuqiang@jrsmaterial.com
Tel: +86 139 6436 0811

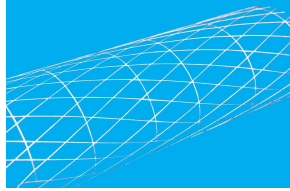
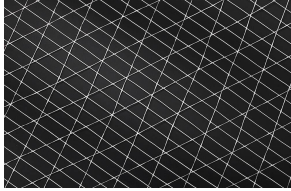
Description

Triaxial Laid Scrim is a special reinforcing fabric widely used in various fields. It consists of three layers of fiber materials arranged at angles of $\pm 60^\circ$ and 0° , forming a stable three-dimensional structure. The material is usually made of polyester or glass fiber.

Polyester Triaxial Laid Scrim features high strength, good chemical and weather resistance, making it ideal for long-term stability-demanding products like construction and packaging materials. Glass fiber Triaxial Laid Scrim, known for its high strength and modulus, offers excellent reinforcement, suitable for applications requiring high stiffness and strength, such as roofing waterproof membranes and geotextiles.

Triaxial Laid Scrim has a wide range of applications. In packaging, it makes heavy-duty bags for cement, sand, etc. In construction, it strengthens roofing waterproof membranes and wallpaper backing, boosting their mechanical strength and dimensional stability. It's also crucial in automotive and aviation seats, enhancing support and safety. In civil engineering, it serves as geotextiles for road construction and hydraulic projects, providing reinforcement and stability.

In summary, Triaxial Laid Scrim, with its unique structure and material properties, plays a vital role in many industries as a multi-functional reinforcement material.



Characteristic

1. Three-layer structure design.
2. High strength and stability.
3. Weather and chemical resistant.
4. Wide-ranging applications.
5. Reinforces and enhances durability.

Technical Datasheet

名称	单位面积质量 (g/m ²)	经纱	纬纱	经向强力 (N/50mm)	纬向强力 (N/50mm)	经向延伸率 (%)	纬向延伸率 (%)
9.0 * 16.0 * 16.0mm	31.6(±8%)	1100 dtex Polyester	1100 dtex Polyester	300	150	21	21
12.5 * 30.0 * 30.0mm	12(±8%)	68 TEX Polyester	68 TEX Polyester	150	80	21	21

Application

1. **Construction industry:** Used for roofing waterproofing reinforcement and wallpaper backing to enhance the tensile strength and dimensional stability of materials.
2. **Packaging industry:** Used to make heavy-duty bags for packing materials like cement and sand, offering high strength and impact resistance.
3. **Automotive and aviation industries:** Used as a seat reinforcement in vehicles and airplanes to improve the support and safety of seats.
4. **Civil engineering:** Used as geotextiles in road construction and hydraulic projects to provide reinforcement and stabilization.
5. **Home furnishings:** Used as reinforcement in furniture such as sofas and mattresses to enhance durability and stability.
6. **Footwear manufacturing:** Used to reinforce shoe soles to boost wear resistance and support.
7. **Agriculture:** Used as a reinforcing material in agricultural covers to protect crops.

Advantages

Cost-effective: Offers a relatively low cost while providing significant reinforcement benefits, making it an economical choice for various applications^[12].

Customizable: Can be customized in terms of fiber direction, mesh size, weight, and adhesive type to meet specific customer requirements and application needs.

JRS (HangZhou) Performance Material Co, Ltd.

Add: Room 312, 3rd Floor, No. 268 Daguang Road,
Gongshu District, Hangzhou ZHEJIANG PROVINCE, China
<https://www.jrsmaterial.com/>
E-mail: liuqiang@jrsmaterial.com
Tel.: +86 139 6436 0811

⊙ Description

Fiberglass Mat with Mesh is a reinforcing material made of fiberglass and featuring a mesh structure. It is widely used in construction, packaging, and automotive industries due to its high strength, heat resistance, and chemical resistance.



⊙ Characteristic

High Strength and Stability: Its high tensile strength enhances composite materials' mechanical properties, ensuring structural stability under external forces.

Excellent Heat Resistance: It maintains performance in high - temperature environments without deformation.

Good Chemical Resistance: It resists most acids and alkalis, making it suitable for harsh chemical conditions.

Breathability and Water Permeability: The mesh structure allows for liquid and gas filtration and separation.

Easy Processing: It can be cut and shaped to meet various application requirements.

⊙ Technical Datasheet

名称	单位面积质量 (g/m ²)	经纱 (tex fiberglass)	纬纱 (tex fiberglass)	经向强力 (N/50mm)	纬向强力 (N/50mm)	含水率 (%)	厚度 (mm)
3.0 * 5.0mm M35 34 TEX	75(±10%)	34	34	250	150	≤2	0.6 (±5%)
4.0 * 8.0mm M35 34 TEX	75(±10%)	34	34	250	150	≤2	0.6 (±5%)
3.0 * 3.0mm M95 34 TEX	180(±10%)	68	68	752	734	≤2	1(±5%)

⊙ Application

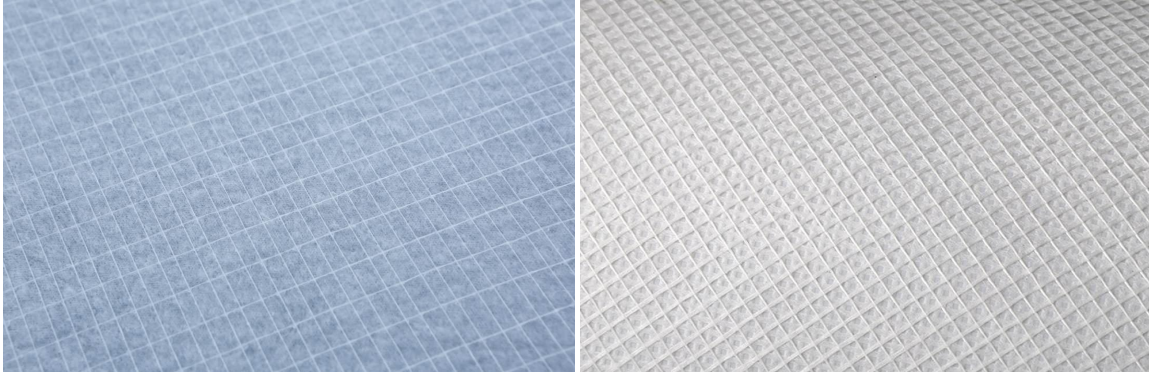
- Construction:** Used in roofing waterproofing and exterior wall insulation to enhance material strength and durability.
- Packaging:** Used for heavy - duty bags like cement bags to provide protection and support.
- Automotive Manufacturing:** Reinforces automotive parts such as body panels and engine components.
- Electronics and Electrical:** Used as insulation materials and printed circuit board substrates.
- Aerospace:** Used in non - critical structural components to reduce weight while ensuring strength.

JRS (HangZhou) Performance Material Co, Ltd.

Add: Room 312, 3rd Floor, No. 268 Daguan Road,
Gongshu District, Hangzhou ZHEJIANG PROVINCE, China
<https://www.jrsmaterial.com/>
E-mail: liuqiang@jrsmaterial.com
Tel.: +86 139 6436 0811

Description

Non - woven Fabric with Mesh is a fabric - like material combining non - woven features and a mesh structure. It's formed by bonding short or long fibers via chemical, mechanical, thermal, or solvent processes, with a mesh structure for added breathability and strength.



Production Process

Fiber Selection: Raw materials include natural fibers (cotton, flax, etc.), regenerated fibers (bamboo fiber, etc.), synthetic polymers (polypropylene, polyethylene, PET, etc.), and high - performance fibers (carbon fiber, aramid fiber, etc.). The choice depends on the product's end use and performance requirements.

Bonding Methods: Common production methods are needle punching, spun - bonding, water jetting, thermal bonding, wet - laying, and melt - blowing. For example, needle punching forms a stable structure by repeatedly刺 with hooked needles, often used in geotextiles and carpet backings. Spun-bonding forms fabric by laying melt - spun and stretched fibers into a web and bonding them via heat or chemicals, suitable for shopping bags and packaging materials.

Characteristic

1. High strength and durability.
2. Breathable and water-permeable.
3. Easy to process and shape.
4. Cost-effective material.
5. Wide application ranges.

Technical Datasheet

名称	成品克重 (g/m ²)	经纱 (tex fiberglass)	纬纱 (tex fiberglass)	经向强力 (N/50mm)	纬向强力 (N/50mm)	无纺布规格 (g/m ²)	厚度 (mm)
4.0 * 6.0mm N25 68 TEX	62(±8%)	68	68	600	400	25±8%	0.6 (±5%)
3.0 * 3.0mm N70 68 TEX	150(±8%)	68	68	883	869	70±8%	0.54 (±5%)

Application

1. **Packaging Industry:** Commonly used for shopping bags. Its breathability and water permeability help ventilate contents while offering protection and support.
2. **Construction Industry:** Used in exterior wall insulation systems to enhance insulation material strength and stability.
3. **Automotive Manufacturing:** As a seat reinforcement in cars, it improves seat comfort and durability. It's also used for interior sound-proofing and heat-insulating materials.
4. **Furniture Manufacturing:** In products like sofas and mattresses, it acts as a reinforcement and stabilizing material, extending product lifespan.
5. **Agriculture:** Serves as crop covers for heat preservation, moisture retention, and pest control, while allowing air and water circulation.
6. **Filter Materials:** Thanks to its breathability and water permeability, it's used in air and liquid filters, such as in air filters and liquid filters.
7. **Medical Industry:** Used for disposable medical protective items like protective suits and masks. Its breathability and filtration properties provide comfort and basic protection.
8. **Civil Engineering:** Functions as geotextiles in road construction and hydraulic projects for reinforcement and stabilization.

JRS (HangZhou) Performance Material Co, Ltd.

Add: Room 312, 3rd Floor, No. 268 Daguan Road,
Gongshu District, Hangzhou ZHEJIANG PROVINCE, China
<https://www.jrsmaterial.com/>
E-mail: liujiang@jrsmaterial.com
Tel: +86 139 6436 0811