

Adding more to adhesive tape

FLAME RETARDANT RANGE

2024/25



Advance Tapes, a UK
leading manufacturer and
supplier of high quality
adhesive tapes





PROFESSIONAL FLAME RETARDANT TAPES

Choose from a comprehensive range of products for indoor and outdoor applications that have been developed for professionals across various industries that are looking for a flame retardant tape to suit a purpose.

To make it easy to select the right tape for the job, we have consolidated all key technical product information and features into one easy-to-use brochure.

The products included in this brochure are a selection from our extensive range.

More info can be found on our website www.advancetapes.com.

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AT7 - PVC Electrical Tape

Features

-  Flame retardant and self-extinguishing
-  Easy unwind and tear
-  UV resistant
-  Available in colour coding packs

Applications

- Colour coding & general protection and insulation of electrical components and wiring.
- Cable management and bundling.
- Masking off aircraft landing gear when cadmium plating.
- Masking and protection of aircraft portholes.

Adhesive type

Cross-linked solvent based rubber-resin

Technical

Thickness: 0.13 mm
 Breaking load: 26 N/cm
 Elongation: 180%
 Adhesion to Steel: 2.4 N/cm
 Adhesion to Self: 2.1 N/cm
 Service Temperature: -5°C to +70°C
 Breakdown voltage: 8kV
 RoHS Compliant: Yes

Specification

Conforms to BS EN 60454/Type 2







Standard colours



AT10 - PVC Heavy Duty Pipewrap Tape

Features

-  Flame retardant and self-extinguishing
-  Conformable
-  Water and UV resistant
-  Abrasion resistant

Applications

- Corrosion and abrasion protection for pipework above or under ground

Adhesive type

Cross-linked solvent based rubber-resin

Technical

Thickness: 0.25 mm
 Breaking Load: 44 N/cm
 Elongation: 220%
 Adhesion to Steel: 3.3 N/cm
 Adhesion to Self: 3.0 N/cm
 Service Temperature: -5°C to +80°C
 Breakdown Voltage: 10 kV RoHS
 Compliant: Yes

Specification




Conforms to BS EN 60454-3-1 Type 2

Standard colour



AT20 - PVC Extra Heavy Duty Pipewrap Tape

Features

-  Flame retardant and self extinguishing
-  Very high abrasion resistance
-  UV & water resistant

Applications

- Corrosion and abrasion protection for pipework above or under ground

Adhesive Type

Cross - linked solvent based rubber - resin.

Technical







Thickness: 0.44 mm
 Breaking load: 90 N/cm
 Elongation: 200%
 Adhesion to Steel: 3.0 N/cm
 Adhesion to Self: 2.6 N/cm
 Service Temperature: -20°C to +80°C
 Breakdown Voltage: 12 kV

Standard colours



AT44 - Low Tack PVC Protection Tape

Features

-  Low tack
-  Clean peel from most surfaces*
-  Flame retardant
-  Conformable
-  Water and UV resistant
-  Abrasion resistant

Applications

- Outdoor protection and masking, especially where risk of fire is an issue.
- Aluminium extrusions protection.

Adhesive type

Solvent based rubber-resin

Technical








Thickness: 0.13 mm
 Breaking Load: 23 N/cm
 Elongation: 150%
 Adhesion to Steel: 0.3 N/cm
 Service Temperature: 0°C to +60°C
 RoHS Compliant: Yes

Standard colour



AT200 - Advance Gaffa® Ultra Matt Cloth Tape

Features

-  Flame retardant in situ*
-  Cable friendly clean peel adhesive*
-  Very easy tear and conformable
-  Abrasion resistant
-  Water resistant
-  Very low light reflectance
-  Writable surface

Applications

- Securing and bundling of cables.
- Colour coding on lighting and mixing desks.

Adhesive type

Solvent free rubber - resin.

Technical






Thickness: 0.26 mm
 Breaking Load: 40 N/cm
 Elongation: 20%
 Adhesion to Steel: 4.5 N/cm
 Adhesion to Self: 2.6 N/cm
 Service Temperature: -10°C to +80°C
 RoHS Compliant: Yes

Standard colours



AT205 - Advance Gaffa® Matt Black Foil Tape

Features

-  Matt non-reflective finish
-  Flame retardant and self-extinguishing
-  Excellent temperature range
-  Water resistant in situ
-  Conformable

Applications

- For blocking off light leakages on heat generating equipment such as projectors, light cans, barn doors and similar equipment.

Adhesive Type

Dispersion acrylic.
 High temperature and UV resistance.

Technical





Thickness: 0.09 mm
 Breaking Load: 35 N/cm
 Elongation: 11%
 Adhesion to Steel: 4.0 N/cm
 Adhesion to Self: 4.0 N/cm
 Service Temperature: -20°C to +150°C
 RoHS Compliant: Yes

Standard colour



AT501 - Reinforced Aluminium Foil Tape

Features

-  Scrim reinforced for greater strength
-  Flame retardant
-  Resistant to high and low temperatures
-  Water resistant

Applications

- Joining foil faced insulation panels and pipe sections.
- Joining fibre insulation between the internal skin and fuselage of aircraft.
- Sealing joints in metal ducting.

Adhesive type

Dispersion acrylic

Technical

Thickness: 0.14 mm
 Breaking Load: 45 N/cm
 Elongation: 5%
 Adhesion to Steel: 6 N/cm
 Service Temperature: -40°C to +120°C

Specification






BS476 Class 0 can be achieved with this product when used in conjunction with other suitable products.

Standard colour



AT502 / AT500 / AT506 - Aluminium Foil Tapes

Features

-  Flame retardant and self-extinguishing
-  Resistant to high temperatures
-  Easy unwind and tear
-  Excellent water vapour resistance
-  Available in different foil thickness: AT502 (30 micron), AT500 (40 micron) and AT506 (50 micron)

Applications

- Sealing metal or plastic ducting.
- Insulation of heater casings and high pressure steam pipe insulation.
- Sealing cold store insulation.
- Heat reflection.

Adhesive type

Dispersion acrylic

Technical

Service Temperature: -40°C to +110°C

Specification







Conforms to:
 BS476 Part 6 & Part 7 Category 1 - Fire
 Class M1
 Class O

Standard colour



AT510 - Matt Black Foil Tape

Features

-  Matt non-reflective finish
-  Flame retardant and self-extinguishing
-  Excellent temperature range
-  Very easy unwind and tear
-  Water resistant in situ
-  Conformable to awkward shapes

Applications

- Solar panel installation
- Sealing black ducting insulation

Adhesive type

Dispersion acrylic

Technical

Thickness: 0.09 mm
 Breaking Load: 35 N/cm
 Elongation: 11%
 Adhesion to Steel: 4.0 N/cm
 Adhesion After Water Immersion: 4.0 N/cm
 Service Temperature: -20°C to +150°C
 RoHS Compliant: Yes

Standard colour



AT525 - 35 Micron Copper Foil Shielding Tape

Features

- ✓ Non-conductive acrylic adhesive
- ⚠ Resistant to high and low temperatures
- ✓ Can be easily soldered
- ➔ Easy unwind

Applications

- Used for EMI / RFI and static shielding.

Adhesive type

Non conducting thermosetting solvent based acrylic

Technical

Thickness: 0.035 mm
 Breaking Load: 40 N/cm
 Adhesion to Steel: 4.5 N/cm
 Service Temperature: -20°C to +155°C
 RoHS Compliant: Yes

Specification

Relevant BS EN 60454 - Part 2 test method
 Relevant ASTM D - 1000 test method
 In-house tests conforming to the flame retardant requirements of UL 510



AT526 - 35 Micron Copper Foil Shielding Tape

Features

- ➔ Easy unwind
- ✓ Easily soldered
- ✓ High and Low Temperature Resistant
- ➔ Electrically conductive thermosetting acrylic adhesive

Applications

- Used for EMI / RFI and static shielding.

Adhesive type

Conductive thermosetting solvent based acrylic

Technical

Thickness: 0.035 mm
 Breaking Load: 40 N/cm
 Adhesion to Steel: 4.5 N/cm
 Service Temperature: -20°C to +155°C
 RoHS Compliant: Yes

Specification

Military specification MIL-T-47012
 Relevant BS EN 60454 - Part 2 test method
 Relevant ASTM D - 1000 test method
 In-house tests conforming to the flame retardant requirements of UL 510



AT528 - 35 Micron Copper Foil Shielding Tape

Features

- ✓ Conductive acrylic adhesive
- ⚠ Resistant to high and low temperatures
- ✓ Can be easily soldered
- ➔ Easy unwind

Applications

- Used for EMI / RFI and static shielding.

Adhesive type

Conductive thermosetting solvent based acrylic

Technical

Thickness: 0.050 mm
 Breaking Load: 85 N/cm
 Adhesion to Steel: 4.5 N/cm
 Service Temperature: -20°C to +155°C
 RoHS Compliant: Yes

Specification

Military specification MIL-T-47012
 Relevant BS EN 60454 - Part 2 test method
 Relevant ASTM D - 1000 test method
 In-house tests conforming to the flame retardant requirements of UL 510



AT536 - 35 Micron Tin Clad Copper Foil Shielding Tape

Features

- ✔ Electrically conductive acrylic adhesive
- ⚠ High and Low Temperature Resistant
- ✔ Easily soldered
- ➡ Easy unwind
- ✔ Resistant to ozone, oils, chemicals & water due to the tin layer

Applications

- Used for EMI / RFI and static shielding where maximum effectiveness combined with good environment resistance's are required.

Adhesive type

Conductive thermosetting solvent based acrylic

Technical

Thickness: 0.035 mm
 Breaking Load: 40 N/cm
 Adhesion to Steel: 5.0 N/cm
 Service Temperature: -20°C to +155°C
 RoHS Compliant: Yes

Specification

Relevant BS EN 60454 – Part 2 test method
 Relevant ASTM D – 1000 test method In-house tests conforming to the flame retardant requirements of UL 51



AT541 - 40 Micron Aluminium Foil Masking Tape

Features

- ✔ Laminated with a self adhesive removable polyester masking tape
- ➡ Easy unwind
- ✔ Electrically conductive acrylic adhesive
- ✔ Resistant to chemical, heat, acid and alkali
- ⚠ High and Low Temperature Resistant

Applications

- Applied prior to powder coating, the polyester masking tape will withstand powder coat baking temperatures up to +200°C.

Adhesive type

Conductive thermosetting solvent based acrylic

Technical

Thickness: 0.040 mm
 Breaking Load: 25 N/cm
 Elongation: 8%
 Adhesion to Steel: 4.5 N/cm
 Service Temperature: -20°C to +155°C
 RoHS Compliant: Yes

Specification

Military specification MIL-T-47012 Relevant BS EN 60454 – Part 2 test method
 Relevant ASTM D – 1000 test method In-house tests conforming to the flame retardant requirements of UL 51



AT544 - 35 Micron Copper Foil Shielding Tape

Features

- ✔ Conductive acrylic adhesive
- ✔ Removable Polyester Masking Strip
- ⚠ High and Low Temperature Resistant
- ✔ Resistant to ozone, oils, chemicals and water
- ➡ Easy unwind

Applications

- Applied onto the inner door sections of electronic cabinets prior to powder coating or spray painting.

Adhesive type

Conductive solvent based acrylic

Technical

Thickness: 0.035 mm
 Breaking Load: 40 N/cm
 Elongation: 5%
 Adhesion to Steel: 5.0 N/cm
 Service Temperature: -20°C to +155°C
 RoHS Compliant: Yes

Specification

Military specification MIL-T-47012 Relevant BS EN 60454 – Part 2 test method
 Relevant ASTM D – 1000 test method In-house tests conforming to the flame retardant requirements of UL 51



AT712 - Nuclear Tape

Features

- ✓ Low halogen content
- ✓ Clean peel from most surfaces*
- ✓ Water resistant
- ✓ Abrasion resistant
- ✓ Individually labelled rolls indicating PMUC approval
- ✓ Minimal reaction to specialised steel surfaces

Applications

- Joining sheeting, sealing bags and sheeting.
- Protection of stainless steel pipework.
- Supporting temporary curtains.
- Sealing protective overalls.

Adhesive type

Solvent free rubber-resin

Technical

Thickness: 0.27 mm
 Breaking Load: 41 N/cm
 Elongation: 18%
 Adhesion to Steel: 6.0 N/cm
 Adhesion to Self: 3.5 N/cm
 Service Temperature: -35°C to +70°C
 RoHS Compliant: Yes

Specification

AT712 in white conforms to NNC (UK) and EDF (FRANCE) Specifications total Halides 1000PPM Max Total and Sulphur 1000PPM Max
 Conforms to: Fire Class M1

Standard colours



AT2002 - High Specification Flame Retardant Cloth Tape

Features

- ✓ Flame retardant - conforms to FAR 25.853
- ✓ Specification printed onto tape for easy identification
- ✓ Clean peel from most surfaces* up to 4 days at +50°C
- ✓ Excellent adhesion level
- ✓ Water and abrasion resistant

Applications

- Protection and joining during building and/or maintenance of aircraft, ships, submarines and trains.
- Sealing gaps between flame retardant panels.
- Joining hardboard partitions in cargo holds.
- Jointing of FR material on offshore oil rigs.

Adhesive type

Solvent free rubber-resin

Technical

Thickness: 0.23 mm
 Breaking Load: 38 N/cm
 Elongation: 45%
 Adhesion to Steel: 6.0 N/cm
 Adhesion to Self: 4.5 N/cm
 Service Temperature: -10°C to +60°C
 RoHS Compliant: Yes

Specification

Meets Federal Aviation specification FAR 25.853 covering flame retardancy.

Standard colour



AT4001 - Glass Cloth Tape Class B 130°C

Features

- ✓ High mechanical strength
- ✓ High temperature resistance
- ✓ Thermosetting adhesive
- ✓ Conforms to BS EN 60454-3-8 Type 1

Applications

- Electrical insulation of coils.
- Insulation of square conductors in traction motors and generators.
- Tensional strapping of coils and armature windings.
- Termination building to protect the external layer of winding.

Adhesive type

Thermosetting solvent based rubber-resin

Technical

Thickness: 0.18 mm
 Breaking Load: 280 N/cm
 Elongation: 5%
 Adhesion to Steel: 3.0 N/cm
 Breakdown Voltage: 2.5 kV
 RoHS Compliant: Yes

Specification

Recognised by UL. BS EN 60454-3-8 Type 1

Standard colour



AT4002 - Coil Insulation Glass Cloth Tape Class F 155°C

Features

- ✓ High mechanical strength
- ⓘ High temperature resistance

Applications

- Electrical insulation of coils.
- Insulation of square conductors in traction motors and generators.
- Tensional strapping of coils and armature windings.
- Termination building to protect the external layer of winding.

Adhesive type

Solvent based acrylic

Technical

Thickness: 0.18 mm
 Breaking Load: 280 N/cm
 Elongation: 5%
 Adhesion to Steel: 3.0 N/cm
 Breakdown Voltage: 2.5 kV
 RoHS Compliant: Yes

Specification

Recognised by UL. BS EN 60454-3-8 Type 2

Standard colour



AT4003 - Glass Cloth Tape Class H 180°C

Features

- ✓ High mechanical strength
- ⓘ High temperature resistance
- ⓘ Thermosetting adhesive
- ✓ Conforms to BS EN 60454-3-8 Type 3

Applications

- Electrical insulation of coils.
- Insulation of square conductors in traction motors and generators.
- Tensional strapping of coils and armature windings.
- Termination building to protect the external layer of winding.

Adhesive type

Silicone

Technical

Thickness: 0.18 mm
 Breaking Load: 280 N/cm
 Elongation: 5%
 Adhesion to Steel: 3.0 N/cm
 Breakdown Voltage: 2.5 kV
 RoHS Compliant: Yes

Specification

Recognised by UL. BS EN 60454-3-8 Type 3

Standard colour



AT4004 - Coil Insulation Polyester Tape Class B 130°C

Features

- ✓ Rubber Thermosetting Adhesive
- ✓ High Electrical Strength
- ✓ High Breaking Load
- ✓ High Temperature Resistant
- ✓ Solvent Resistant
- ✓ Recognised by UL

Applications

- Electrical insulation of coils electrolytic capacitors and small transformers
- Core and inter layer insulation
- Phase separation of small 3 phase motors
- Screening, termination and binding to protect external layer of winding from dirt and dust

Technical

Thickness: 0.06 mm
 Breaking Load: 45 N/cm
 Elongation: 90%
 Adhesion to Steel: 3.8 N/cm
 Service Temperature: 0°C to +130°C
 RoHS Compliant: Yes

Specification

Recognised by UL (Test method UL.510)

Standard colour



Adhesive Type

Dispersion acrylic.
 High temperature and UV resistance.



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Disclaimer: Tape performance in multiple applications can be affected by various factors. These factors are often not within the control of Advance Tapes. Having better knowledge and control of individual applications and method of use, end users of the product are responsible for evaluating the suitability for a particular application and for identifying that the product is fit for the purpose. Customers should satisfy themselves that the tape is suitable for their requirements in a particular application prior to use.