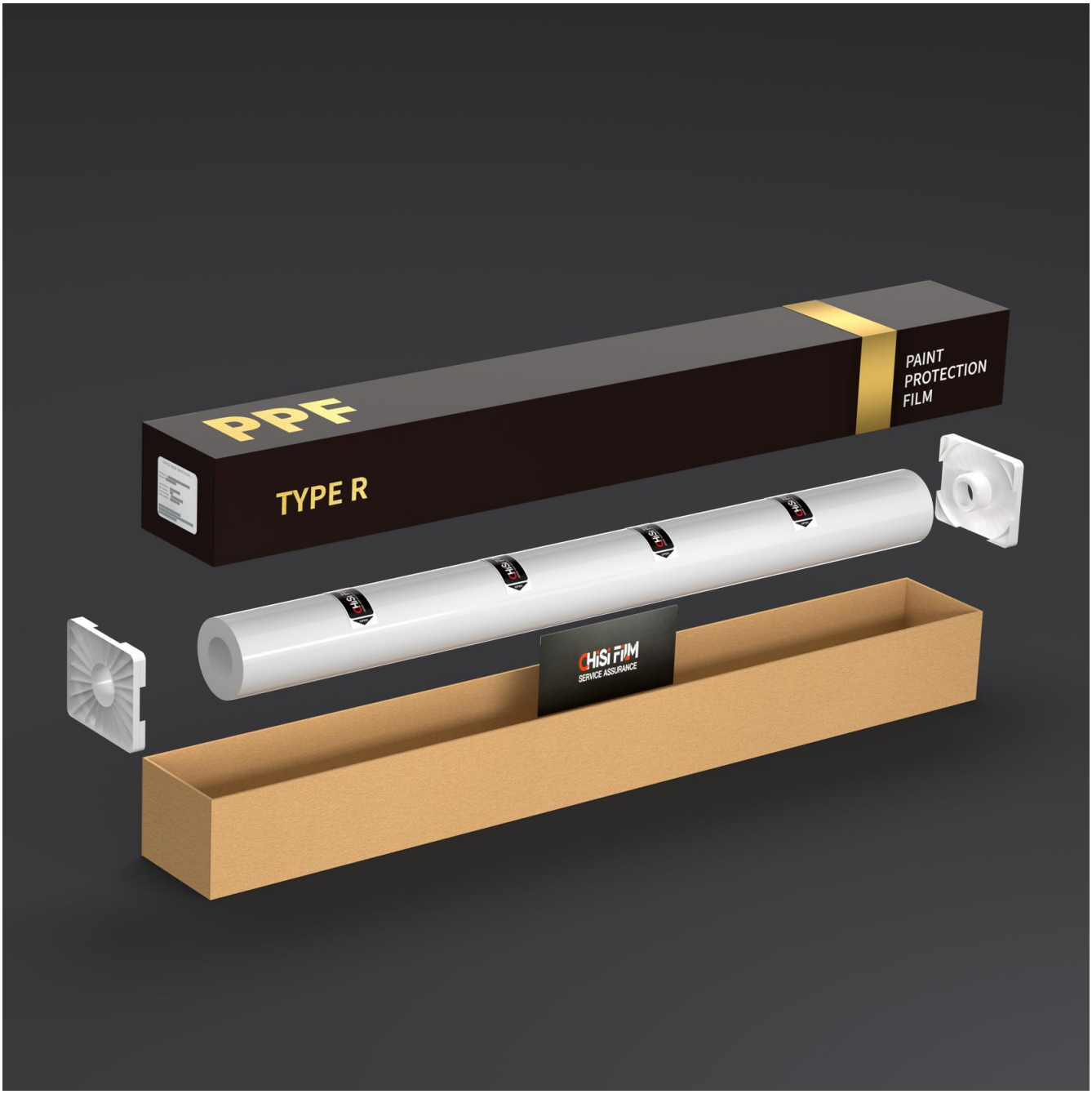
CHISI

TYPE R


PPF
TYPE R
PAINT
PROTECTION
FILM
CHISI FILM
SERVICE ASSURANCE

CHiSi FiLM

TYPE R paint protection film (PPF)

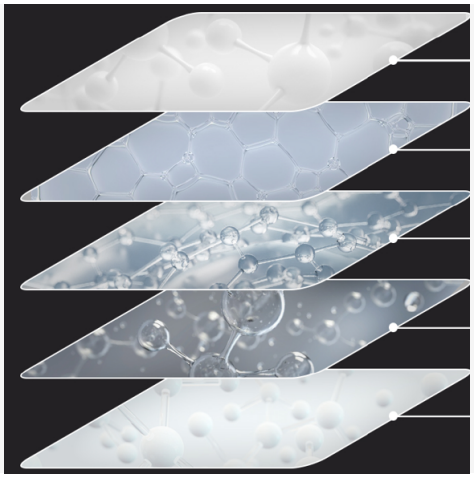
Materials listed in this brochure

TPU resin: Lubrizol 60DV Series, as listed in this brochure.

Topcoat: nanographene hydrophilic double coating, as described in the brochure. Confirm the ordered finish and surface option.

TPU substrate: Argotec 49510-60DV, brochure specification.

Adhesive: Ashland 951059, as listed in this brochure.



TORAY PET protective layer

NANO GRAPHENE Topcoat

LUBRIZOL 60DV TPU substrate

ASHLAND Pressure-sensitive adhesive (PSA)

Release liner

Shipping information

Dimensions labeled “Roll Size” in the source 160Cm X 20.5Cm X 18Cm

Dispatch schedule Stock items: dispatch within 3–7 days; custom items: within 15 days. The source’s “Within 7 days” is not a worldwide delivery promise.

Port	Shenzhen
Estimated weight in the brochure; no net/gross basis specified	11Kg
Payment reference	100% prepaid in the source brochure; confirm the terms for the order.
Samples	Default A4 samples are free worldwide; all logistics costs are excluded. Other sizes: request a quote.
Reference pallet dimensions	160Cm X 162Cm X 125Cm
Trade terms listed in the brochure; confirm applicability	FOB/CIF/CFR/DDP/DAP
Rolls per reference pallet	54 rolls
Reference pallet volume	3.24 m^3
Transport	Air / sea / land, subject to the order arrangements.
Estimated reference-pallet weight; no net/gross basis specified	605Kg

Product features and data — source brochure version

Global electronic warranty service, within the applicable CHISI product scope.

Electronic warranty: consult applicable terms	10 years

Yellowing, hydrolysis and chemical resistance require the actual model and exposure conditions; these brochure slogans are not universal guarantees.

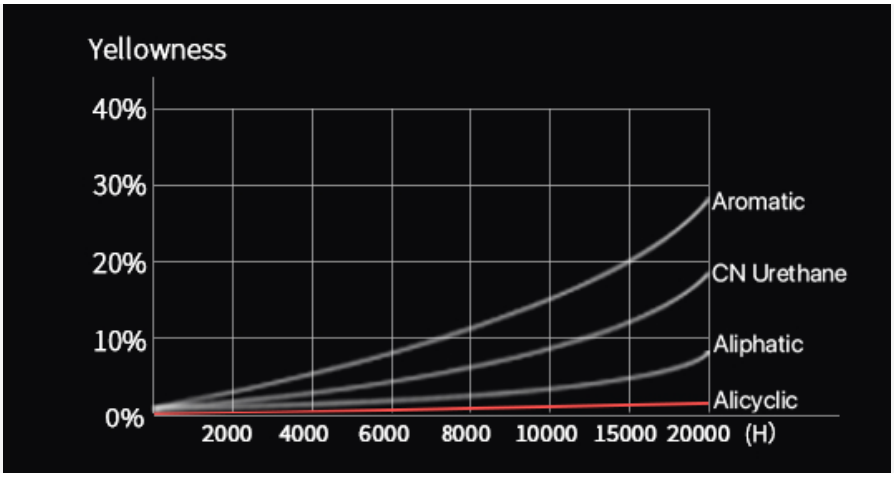
TPU resin listed in the brochure	Lubrizol estane 60dv
TPU substrate listed in the brochure	Argotec 49510 60dv
Polyol type listed	Polycaprolactone

Installation, edge retention and removal: follow the selected model’s procedure and assess the paint condition; no universal no-lift or residue-free guarantee.

Adhesive type listed	Self-crosslinking acrylic

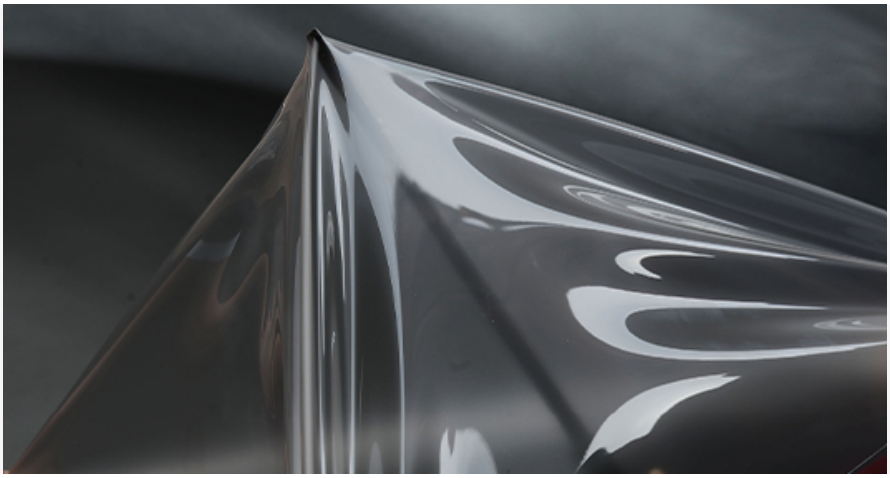
Adhesive model listed	ASHLAND 951059
Gloss appearance, stain resistance and chemical resistance are separate properties; qualify the actual finish and relevant tests.	
Coating technology listed	Nano double coating
Coating material listed	Nano Graphene
Coating properties promoted in the brochure	Gloss, wear and chemical-resistance claims; verify each on the finished film.
Adhesive bond value listed	>1500g/inch
Stain test — yellow mustard	Δb<1.5
Stain test — used oil	Δb<1.5
Stain test — oil-based marker	Δb<1.5
Gloss value listed; geometry not stated	>120gu
Thermal aging — source label “Porsche”	Δb<1.5 ΔGloss<4
Thermal aging — source label “BMW”	Δb<1.5 ΔGloss<4
Xenon-lamp aging, source result	Δb<0.5@1500h
QUV weathering, source result	Δb<1.2@2000h
UV aging, source result	Δb<1.1@2000h
Chemical resistance, source result	Δb<1.5
Alkali resistance — NaOH	NED
Acid resistance — sulfuric acid	NED
Acid resistance — hydrochloric acid	NED

Why consider TYPE-R PPF

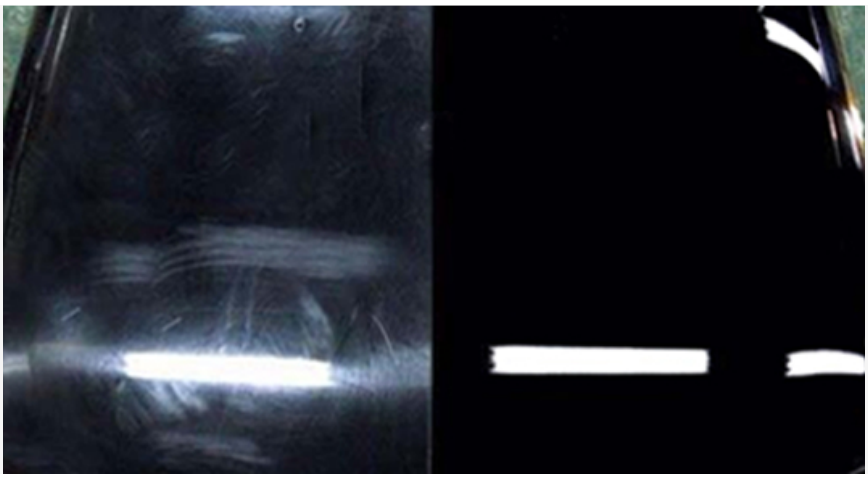


Illustrative chart labels: Yellowness; 0% 10% 20% 30% 40%; 2000 4000 6000 8000 10000 15000 20000 (H); Aromatic / CN Urethane / Aliphatic / Alicyclic. No sample, method or report is identified; this is not TYPE R test data or an outdoor-life forecast.

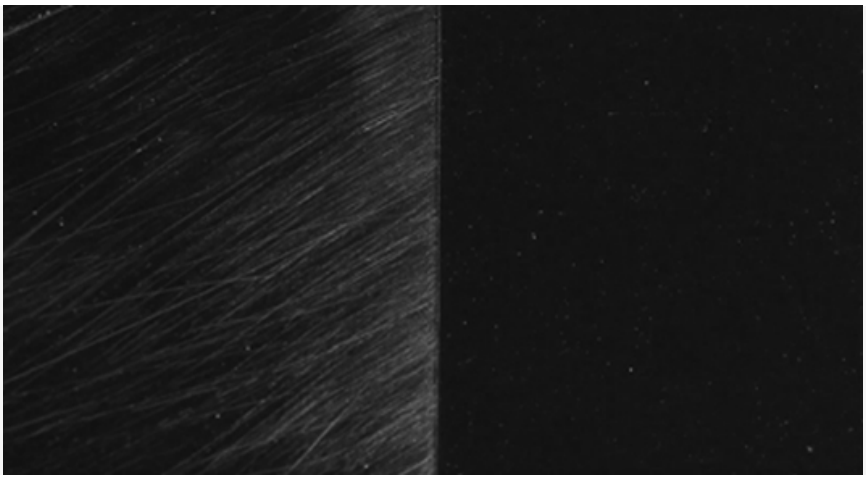
Yellowing-resistance description
The brochure attributes yellowing resistance to an “hmdi alicyclic + pcl polyol” formulation. This does not establish an exact grade or an absolute no-yellowing result.



Wear-resistance description
Nanographene coating is presented as a wear-resistance feature. Assess finished-film wear and hardness using the applicable methods.



Gloss-finish brightening reference
This section reports more than 40% after installation. It provides no measurement procedure; do not apply this reference to Matte or Satin.



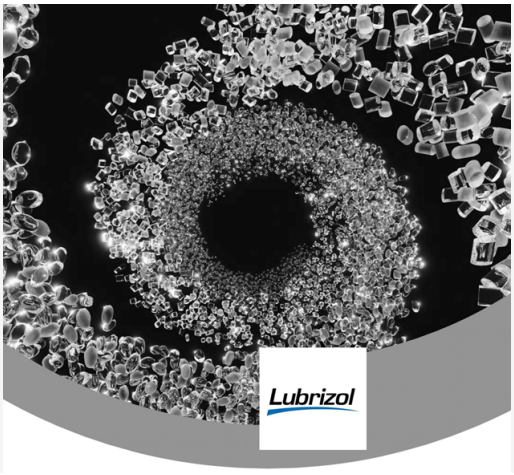
Self-healing topcoat
The brochure describes recovery of surface scratches in sunlight and normal-temperature conditions. Use model-specific scratch, temperature, time and recovery criteria; no all-scratch guarantee is implied.



Hydrolysis-resistance description
The brochure identifies polycaprolactone TPU. Material identity alone does not establish absolute immunity from hydrolysis for every formulation or exposure.



Removal
Use the applicable film and paint procedure. The brochure’s claim is not a guarantee of damage-free removal at any time or on any vehicle.



Materials and formulations

Lubrizol

LUBRIZOL ESTANE® TPU

Material yellowing-resistance claim
The brochure describes a Cycloaliphatic HMDI formulation and more than 10 years of resistance. The chemical designation and duration are source claims, not a finished-film life forecast or an extension of warranty.

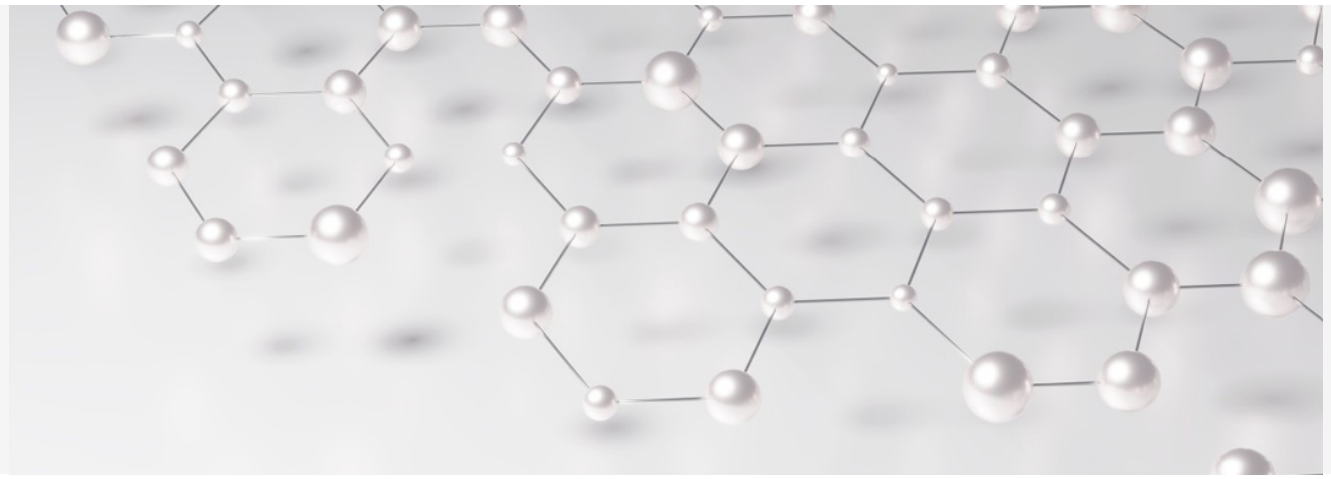
Transparency and appearance
The brochure promotes a clear paint finish. Transparency is not a measurement of adhesion, and “unrivalled” is not a verified comparative result.

Hydrolysis-resistance description
PCL polycaprolactone polyol is named in the source; it does not by itself establish that the finished film never hydrolyzes.

Weathering-resistance description
Evaluate yellowing, UV exposure, chemicals and acid-rain-related contact under their own defined conditions. The brochure does not establish universal prevention of these changes.

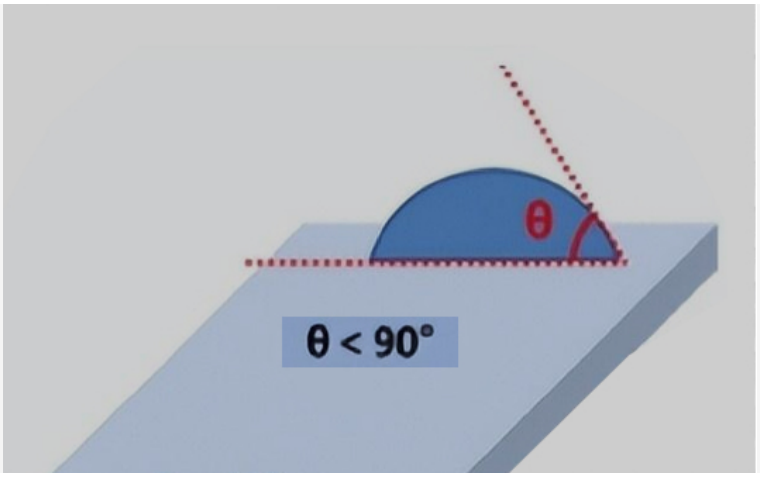
Self-healing description
Assess recovery of suitable surface marks in the actual topcoat. The source’s “paint sealant fills scratches and nicks” does not establish the mechanism or repair of deep cuts or lost material.

Source-only durability paragraph — brand conflict
The paragraph names ELASTOLLAN® TPU and up to 10 years of protection against stone chipping. It is not adopted as confirmation of TYPE R composition, stone-chip performance or complete warranty coverage.

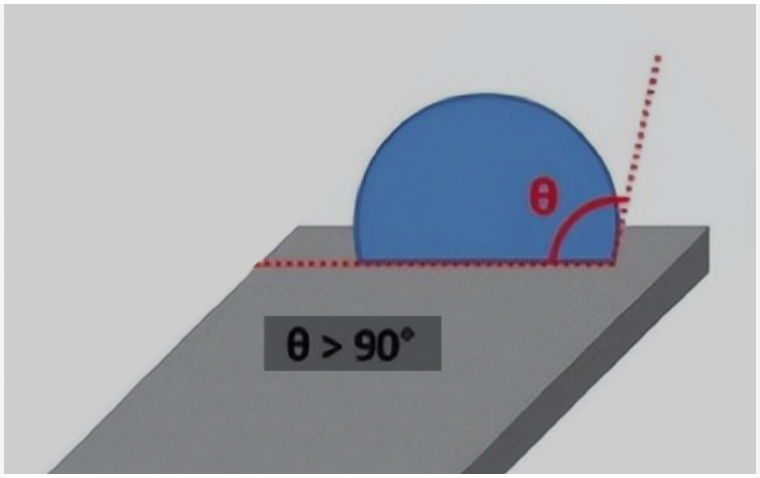


Nanographene coating technology

The brochure presents nanographene coating for hardness, wear, scratch and chemical resistance, with hydrophilic or hydrophobic surface options. Confirm the available option and finished-film evidence for the selected model; coating descriptions are not universal performance limits.



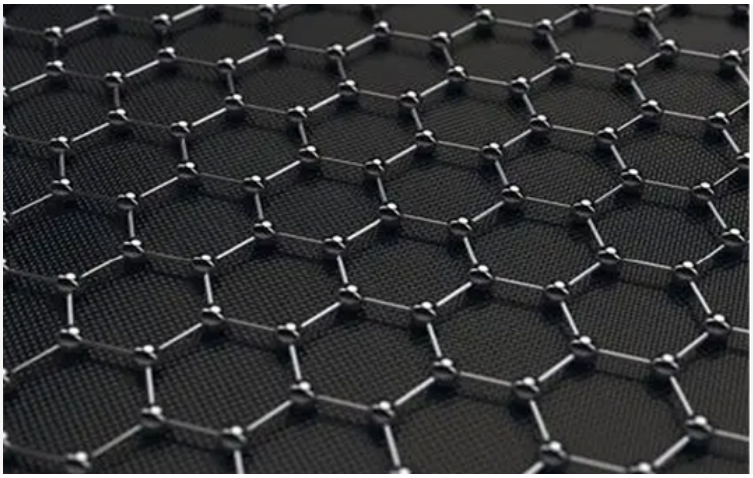
θ
θ < 90°



θ
θ > 90°

Hydrophilic surface illustration
The brochure promotes gloss retention but gives no duration or measured result here.

Hydrophobic surface illustration
The drawing is not a model-specific contact-angle, roll-off or durability test.



Wear-resistance description
Nanographene is presented as a coating feature; actual wear and tear depend on the finished film and exposure.



Surface appearance
The brochure describes color depth and a smooth finish, not a quantified haze, clarity or optical-resolution result.



Environmental-contact resistance
The brochure discusses oxidation, insect residues, chemical attack and contamination. Confirm the actual substances, exposure and model-specific performance.



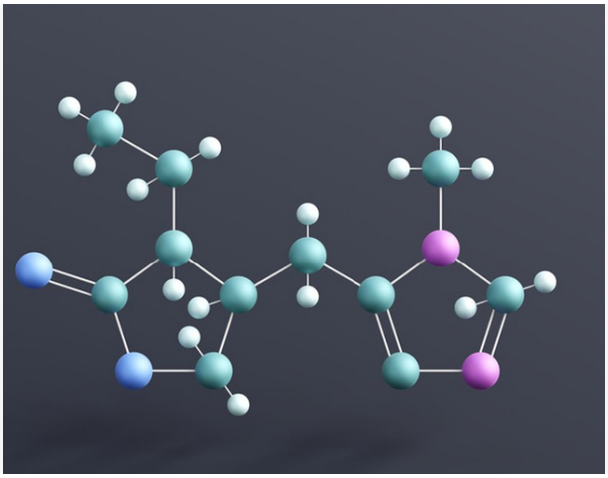
Transparent appearance
The brochure promotes transparency; visibility still depends on finish, substrate and viewing conditions. No transmittance value is stated here.



Gloss-appearance reference
This later section states more than 45%, unlike the earlier more than 40% wording. “Liquid glass” is an analogy; use the selected Gloss model’s evidence, not a whole-vehicle or Matte/Satin guarantee.



Chemical-resistance description
The source’s statement that graphene does not react with any acid or alkali is not adopted as a universal chemical claim. Assess the complete film against identified chemicals and exposure conditions.



ASHLAND AROSET 951059 acrylic adhesive



Initial installation reference
“Low viscosity in the first 20 minutes” is the brochure wording. It does not define a measured viscosity, initial-tack value or peel-force method.



Later adhesion reference
The brochure says “peak viscosity” after 48 hours. This does not establish a rheology result, universal bond-development curve, chemical-curing time or no-edge-lift guarantee.

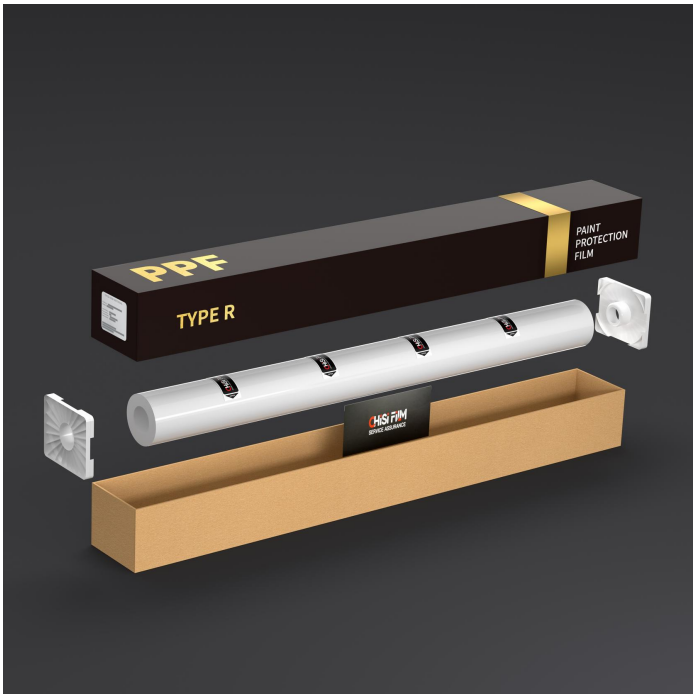


Removal and residue
The brochure associates removal with EZcoat cross-linking stabilization technology. Confirm the actual film, paint condition and procedure; the phrase is not a guarantee of residue-free removal.



Wet installation
Use a solution approved for the selected film and paint. The source mentions professional installation gel or baby bath gel; it is not a universal compatibility approval or mixing recipe.

TYPE R warranty reference: 10 years
Yellowing, delamination, loss of gloss and cracking must be read against the applicable CHISI terms and defect-specific coverage; the headline does not grant every listed issue the full 10 years. Global electronic warranty service is available for CHISI products excluding OEM/ODM. For details, contact your sales representative.



Exploded packaging view with a dark TYPE R box, gold band, white film roll, end supports and black card.



Side view of a dark box with a gold band and printed logos beside a white film roll and end support.

Open

The online electronic warranty service applies to CHISI products supplied outside OEM/ODM projects. The warranty starts at first installation. The main process requires a valid serial number, activation, installation information and a record tied to one identified user in the CHISI product traceability system. Register within one month after installation. Unregistered or late-registered cases cannot proceed through this commercial after-sales process.

The commercial warranty cannot be transferred with the vehicle or product. The purchasing customer, distributor or installer consolidates claims. If the original installer cannot be reached, the original purchaser or distributor can contact the CHISI business contact to check the records and next steps. Confirmed manufacturing defects qualify for replacement free of charge. Repair or replacement does not extend the original warranty period or start a new one. Remedies follow the applicable product terms; there is no blanket promise of cash compensation or reimbursement of installation costs chosen by the customer. Apply the terms for the actual product and order together with the CHISI commercial warranty process described here. Coverage remains specific to the series, product and defect; it is not a promise to cover every defect or situation. Discuss any document discrepancy with the CHISI business contact.

The online electronic warranty service applies to CHISI products supplied outside OEM/ODM projects. The warranty starts at first installation. The main process requires a valid serial number, activation, installation information and a record tied to one identified user in the CHISI product traceability system. Register within one month after installation. Unregistered or late-registered cases cannot proceed through this commercial after-sales process. Follow the selected film’s installation guidance and keep the order, box label, batch code and installation records. An unregistered customer must provide evidence of installation, the user’s payment evidence and the invoice for checking. These documents do not automatically approve an exception, replace the main registration process or move the warranty start date.
